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Kelly A. Tirone
kellytirone@live.com

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Development of a Fall Prevention Bundle with Evidence-Based Tools for Hospitalized Adults

Kelly Tirone, BSN, RN

University of San Francisco
School of Nursing and Health Professions
NURS 670 Internship - K10

Dr. Cathy Coleman, DNP, MSN, CPHQ, CNL

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Abstract

Problem
The Agency for Healthcare Research and Quality (AHRQ) considers hospital falls a “never event,” yet estimates one million hospitalized people fall every year in the United States, and up to a third are preventable (2010; 2019).

Context
Data from an acute care hospital show one medical-surgical unit reported eight patient falls in 2021, two causing major harm that reached sentinel event criteria. The care team sought a quality intervention for ineffective communication related to patient falls and fall risk.

Interventions
A Clinical Nurse Leader (CNL) leveraged the unique CNL skill set and characteristics of Human-Centered Leadership to engage in horizontal leadership, injury prevention, and team coordination through authentic human connection. The CNL and interprofessional team leveraged documentation for improved fall risk communication. Unavoidable disruptions hindered other planned interventions.

Measures
The first outcome measure observes the total fall count, seeking a reduction from baseline while acknowledging falls are a “never event” with an ultimate goal of zero. The second outcome measure aims to lower the rate of falls with injury. Three balancing measures monitor for patient mobility, physical restraints, and employee injuries during the effort to reduce patient falls.

Results
Results follow the single intervention of documentation for improved fall risk communication. Since January 2022, the unit has had zero injury falls and achieved eighty-nine consecutive days without a patient fall. The total fall count is constant at both the unit and hospital levels; however, there is a shift
in fall severity. There have been no moderate-harm, major-harm, or sentinel event patient falls since the onset of this quality improvement process. The balancing measures are all favorable.

Conclusions

The increased awareness and focus on fall prevention positively affected safety culture and reduced patient harm. Outcomes endorse leveraging the expertise of the CNL and Human-Centered Leader, inviting participation in change by engaged teams, and a little luck to avoid disruptions at critical times in the project lifespan. Applied interventions are generalizable to other interprofessional teams.
Introduction

Development of a Fall Prevention Bundle with Evidence-Based Tools for Hospitalized Adults

Healthcare is a complex ecosystem that is difficult to evaluate or define. Healthcare delivery systems are constructed of Microsystems (small operational sites that provide most healthcare services), macrosystems (the system’s highest level, led by executive leaders), and mesosystems (the network that connects and interrelates micro and macrosystems together) (American Association of Colleges of Nursing, 2021; Bender et al., 2019). The many Microsystems and mesosystems that comprise the macrosystem share responsibility for its successes and failures; therefore, it is necessary for individuals at every level to share the macrosystem’s common goals (Clarkson et al., 2018).

Quality in the National Healthcare Macrosystem and Hospital Microsystem

Achieving quality improvements across the national healthcare (macro)system is just as necessary. Thus, care systems across the United States must also share common goals, like the Institute for Healthcare Improvement’s (IHI) Quintuple Aim (previously Quadruple Aim) (Nundy et al., 2022). To paraphrase IHI’s president emeritus and senior fellow Don Berwick M.D., teams are weary with “the bankruptcy of win-lose plans,” what is needed instead is a common purpose (the Quintuple Aim), permission to fail, and a camaraderie of “all together or not at all” (Institute for Healthcare Improvement, 2017; MacDonald, 2017). Creating a safe space for teams’ inquiry and discovery lends to developing innovative and effective quality improvement initiatives and safety cultures that can be shared and spread for optimal patient outcomes (Rosen et al., 2018).

The Hospital Quality Gap

Continuous improvement of patient outcomes is the driving force of healthcare (Bender, 2014). In the healthcare microsystem, nurses and their colleagues must unite in such camaraderie as Dr. Berwick advocates to assess the quality of healthcare outcomes and continuously work to improve them (Institute for Excellence in Health and Social Systems, 2021). This author postulates that the work of the
quality mesosystem does not occur in one location, and its efforts are not the responsibility of one team.

In healthcare, “quality” is multidimensional; it is a general descriptor of patient care, a measurable element of outcomes, a consulting service, and a staffed department. Quality Improvement and Safety is also an essential competency for the Clinical Nurse Leader (CNL) (King et al., 2019). Despite purposeful efforts of healthcare systems, Microsystems, teams, and individuals, drastic improvements in quality are still required to eliminate preventable errors and sustain a culture of continuous learning and improvement (AACN, 2021; Bender, 2014).

Goals for Quality Care

Hospitalization is the third leading cause of death in the United States (Makary and Daniel, 2016, as cited in King et al., 2019). Falls by hospitalized patients are considered a “never event,” meaning they should not ever occur. Yet, the Agency for Healthcare Research and Quality (AHRQ) estimates that every year in the United States, upwards of 1,000,000 hospitalized people fall (2021). Patient Safety Net, an arm of AHRQ (2019), further clarifies this as 3-5 falls per 1,000 patient days. Additional research shows that up to a third of these falls are preventable (AHRQ, 2021). The National Database for Nursing Quality Indicators defines a patient fall as “a sudden, unintentional descent, with or without injury to the patient, that results in the patient coming to rest on the floor, on or against some other surface (e.g., a counter), on another person, or on an object (e.g., a trash can)” (2020).

Organizational Priorities

A medical center that is part of an integrated health system focuses on generating quality improvements and excellent patient outcomes. The medical center is compelled to improve outcomes through annual goals and organizational, state, and federal reporting. Moreover, the integrated health system aims to serve its community and values its reputation as a provider of exceptional care and outstanding experience.
**Problem Description**

Fall events in the hospital setting often cause lacerations, fractures, and internal bleeding, requiring further use of the health system. While not all falls cause harm, some end in temporary or permanent injury to patients. The level of harm is confirmed by prognosis at the time of the fall event. *Temporary harm* is bodily or psychological injury, but not likely permanent. In contrast, *permanent harm* is lifelong bodily or psychological injury or increased susceptibility to disease (AHRQ, 2010). Regardless of harm level, all falls are “never events” (AHRQ, 2019).

**Increased Fall Risk**

Nurse Leaders have a duty to protect all patients and prevent “never events” from occurring. The increased risk for falling can be connected to many hospital-related phenomena, including physical deconditioning, poor sleep, and confusion. Fall risks can be constant or dynamic, overt or subtle. Patients with a history of falling during the current hospitalization, prior hospitalizations, or at home, those with communication barriers, persons who lack cognitive capacity, or those who otherwise decline to participate in fall prevention strategies are at a greater risk for falling during hospitalization. Whatever the clinical presentation, it is the responsibility of practitioners in the healthcare setting to identify patients at risk for falling and initiate appropriate interventions to prevent falls.

**Patient Falls in a Hospital Microsystem**

At one medium-sized acute care hospital in a large system, baseline data indicate that hospitalized adult patients experienced higher rates of hospital falls when compared with other hospitals in the system. The medium-sized hospital shares similar features with the system’s other hospitals, and its location is in a similar geographic region. While the medium-sized hospital has periodically improved its fall prevention methods, it did not sustain the improvements over time. The CNL studied the hospital’s five adult care NUs to consider which microsystem is prepared to collaborate and would benefit from a focused improvement effort.
A Shared Mental Model for Quality Improvement

Quality improvement in healthcare requires clear goals. Successful goal setting occurs through established mutual trust between disciplines, a shared mental model, and team thinking (AHRQ, 2019). This prospectus describes one microsystem’s journey to reduce patient falls through interdisciplinary coordination, standardized communication tools, and unit-based subject matter experts serving as champions for fall-reduction efforts. Further, the prospectus will detail adjuvant contributions by the quality mesosystem, including documentation oversight and developing a fall database and alert system. Additionally, the micro and mesosystem partnership is anticipated to develop individualized intervention plans for patients with a history of falling over the next year.

Available Knowledge

The CNL initiated this project within an integrated care delivery system at a medium-sized acute care hospital. Further review of the baseline data indicate hospitalized adult patients in one nursing unit (NU) experienced higher rates of falls causing injury than other adult units during the same timeframe. In 2021, staff in this microsystem reported eight patient falls, and four of those falls caused temporary or permanent harm. Two of those four were major harm fall events that reached sentinel event criteria. Sentinel Events are patient safety events separate from the natural course of illness or condition which cause permanent or severe patient harm or death (The Joint Commission, 2022). While this unit has the second-lowest fall rate in the hospital, it concurrently has one of the highest rates of falls with mild or moderate injury, and the only sentinel event falls among the five medical-surgical units in 2021 (Appendix A).

Identifying the Problem, Intervention, Change, Outcome, and Timeframe (PICOT)

The intervention asks, “does an evidence-based fall prevention program that includes comprehensive assessment, standardized communication, and individualized interventions based on patient-specific risks (I) compared to no practice change (C) reduce the fall rate (O) in hospitalized adult
medical-surgical patients (P) over four weeks (T)? Results may be extrapolated to compare the effects of the intervention against hospital-wide annual fall rates.

**Evidence Search Strategy**

A thorough and comprehensive database search was conducted using PubMed (MEDLINE), UpToDate, and the Cochrane Database of Systematic Reviews CINAHL Complete in late 2021 and early 2022. The search strategy focused on literature published in 2016 or later in a peer-reviewed journal. Searches used keywords and the root words for falls, patient, nurse, safety, prevention, improvement, and strategy. Initial search results focused on single studies that used quasi-experimental, retrospective, and case-study structures with experimental study designs reproducible in similar settings. These search methods revealed five relevant studies.

**Synthesis of Evidence**

The sources offer current and actionable interventions applicable to fall prevention for adult patients in the hospital setting, the problem identified in the PICOT question. The studies’ findings are generalizable, and the interventions are reproducible. The evidence provides exemplars, including the use by Spano-Szekely et al. (2019) of established clinical practice guidelines for a fall prevention bundle and evidence-based communication tool and the process Krakau et al. (2021) detail to validate fall-related nursing documentation.

These sources offer additional opportunities not used in this CNL’s improvement process. These include remote video monitoring of fall-risk patients and “chronoprevention,” or the observation of fluctuating fall risks related to cycles of time (López-Soto et al., 2021; Spano-Szekely et al., 2019). As demonstrated by Opsahl et al. (2017), this CNL will not employ the inclusion of family engagement and education for fall prevention efforts due to the drastic impacts and inconsistency of the hospital visitor policy (a necessary response to the COVID-19 pandemic). The fifth resource details an experimental fall
intervention with control and study groups. The experimental method was not considered for this improvement process (Røyset et al., 2019).

**Level and Quality**

The selected sources were reviewed and appraised using Johns Hopkins Nursing Evidence-Based Practice (JHNEBP) tools for Research and Non-research Evidence and Evidence Level and Quality Guide (Dearholt & Dang, 2018) (see Appendix B, Figures B1, B2, and B3). The CNL evaluated each study for its relation to the practice question, available evidence, and translation of the study’s findings. This process revealed studies of good quality (b) or high quality (a) research that are (types) quasi-experimental (II), nonexperimental (III), and case study (V) using JHNEBP appraisal tool guidelines. These attributes populate an Evaluation Table (see Appendix C). Ideally, significant evidence of an experimental study with control and study groups guides future practice. However, withholding a potentially effective intervention may raise ethical concerns in the fall prevention setting.

**Evidentiary Guidance**

The CNL’s intervention will most closely follow the descriptions provided by Spano-Szekely et al. (2019) and Krakau et al. (2021). The authors described leveraging clinical practice guidelines to improve the fall rate per 1,000 patient days by increasing the number of patients whose fall risk is appropriately assessed and developing an individualized fall prevention program (Spano-Szekely et al., 2019). The CNL’s program will also establish a specific documentation methodology, as detailed in Krakau et al. (2021), to record any fall events in the hospital patient’s electronic health record (EHR). The standard location for documenting individual patient falls data shall be visible or easily retrieved by other disciplines throughout the patient’s hospital stay. A brief staff survey will assess the current knowledge of fall documentation fields in the EHR for practitioners and clinical support staff who may document patient fall events to obtain baseline data on current practice.
Rationale

In a horizontal leadership style, colleagues see the CNL as a trustworthy resource for the patient and the interdisciplinary team (King et al., 2019). In the context of this intervention, the CNL employs competencies of health promotion and injury prevention and interdisciplinary leadership. Through these qualities, combined with continuous self-development, peer mentorship, interprofessional collaboration, and role-modeling of the nursing profession’s standards, the CNL earns respect from colleagues who, in return, value the CNL’s input and commitment (Bender, 2014; Bender et al., 2019). The concept of Human-Centered Leadership similarly reflects the dedication of the CNL to peers in the microsystem.

Human-Centered Leadership Approach in the Role of the CNL

In the Human-Centered approach, the leader embeds in the center of the system rather than hierarchically imposed above (Appendix D). The Human-Centered Leader’s development begins with a reflection on four elements: self-awareness, self-compassion, self-care, and mindfulness, each preparing the leader to re-engineer team engagement. Within, the leader identifies and strengthens the foundational characteristics of the Human-Centered Leader: Upholder, Connector, and Awakener (Leclerc et al., 2020). The model encourages change from the inside out, rippling from the individual to eventually impact the microsystem and system. Such an opportunity exists for the CNL to engender trust and elicit a response to the team’s obligation to patient safety and quality, leading to improved patient outcomes.

Lifelong Learning Benefits Self and the System

The CNL is committed to lifelong learning (King et al., 2019). The Human-Centered Leader understands that “it starts with me, but it’s not about me” (Leclerc et al., 2020, p. 123). The Human-Centered Leader influences others, particularly using the core attributes of Awakener to encourage
individuals’ learning while supporting a learning culture (Appendix D). The CNL and the Human-Centered Leader invest in the growth and development of self, so the system and microsystem can benefit.

**A Conceptual Framework for Change: Barret’s Power Theory**

Nurse theorist Dr. Elizabeth Barrett defines power as our capacity to participate knowingly in change. Having *power* is “being aware of what one is choosing to do, feeling free to do it, and doing it intentionally” (Barrett, 1986, p. 132; Barrett, 2017). Barrett’s Power Theory is a conceptual framework based on this definition. Malinski simplified the concept as “people cannot not participate in change” (2006, p.8). Barrett’s model builds on Rogers’ framework, the Theory of Unitary Human Beings, where Rogers regards the unitary human being and their environment as indivisible and observes nursing is both a science and an art that ultimately is focused on the unitary human, their environment and development, and the process of change (Barrett, 2007; Rogers, 1970).

**Creating Change**

Barrett’s Power Theory pertains to people and the world around us, is observable and measurable, and comprises four inseparable and continuously fluctuating dimensions: awareness, choices, freedom to act intentionally, and involvement in creating change (Barrett, 1986; Barrett, 2009). Barrett eschews the common belief that humans must submit to the natural law of cause and effect, instead embracing the idea that one who participates knowingly in change gains power. Based on Barrett’s theory, a survey was developed in 1984 to measure an individual’s perception of power and powerlessness called Power as Knowing Participation in Change Test (PKPCT). As of 2009, over 25 years of research and more than 80 studies applied Barrett’s Power Theory (Barrett, 2009).

**Specific Project Aim**

The intervention will occur in progressive stages, with the global aim of reducing falls of hospitalized adult patients, aiming boldly for zero. The project specifically aims to reduce all patient falls and eliminate falls resulting in major harm on a selected nursing unit with a history of major harm fall
events through an effective communication toolkit. Interventions will occur in stages, with the first stage occurring over four weeks, aiming to improve the accuracy of recording patient falls in the EHR.

Staff champions will collect survey responses from colleagues regarding using the EHR field “Apparent Fall this Shift” versus other documentation options, gaining insight into the variability of fall event documentation using survey methodology. Then, guided by Barrett’s Power as Knowing Participation in Change Theory, increase the accuracy and use of the EHR’s discrete electronic data field by the individuals working in the NU in disciplines responsible for mobility and fall risk assessment (Barrett, 2010). This phase will employ the facility’s Fall Committee, an interprofessional team that guides and monitors fall prevention efforts. Consistent and reliable data are crucial to monitor growth during improvement efforts, which requires those documenting in the EHR to have an updated understanding of the EHR functions and features.

**Future Stages**

Futures stages will address other areas of ineffective communication, including sharing mobility and fall risk assessments among clinicians and patient falls or fall-related information through medical chart documentation. In addition, the fall committee, care team, and quality mesosystem can apply individualized fall prevention interventions to reduce hospital falls in at-risk patients. Through these methods, this program will aid the adult medical-surgical NU in reducing all falls, reducing falls with harm, and eliminating sentinel event falls.

**Adherence to Organizational Goals**

This effort supports the organizational aim to reduce patient harm and increase high-quality patient outcomes. This intervention is expected to influence the reduction of all patient falls, and thereby, the patient falls resulting in injury. The current facility rate of falls with harm is 0.5 per 1,000 patient days, above the organizational goal for a rate of fewer than 0.41. Over time, the effort will also establish uniformity of communication methods of mobility assessments and fall risks performed by
registered nurses and physical therapy practitioners (PT), and reliable EHR fall data, and by applying individualized fall prevention methods for patients in a select adult medical-surgical NU.

**Methods**

The NU selected for this intervention has experienced fewer total falls yet a higher number of falls with harm than similar units in the same hospital. In preparation for this improvement project, the CNL conducted a microsystem assessment of this NU in February 2022. The NU is a twenty-four-bed hospital ward that provides care for adults receiving medical, surgical, telemetry, and acute stroke care. Daily, the team provides care for an average of thirty-one patients, and the average length of stay is slightly less than four days. Non-clinical unit assistants, patient care technicians (PCT), licensed nurses (RN), assistant nurse managers (ANM), and a nurse manager (NM) comprise the NU microsystem team. The RN and PCT are the primary direct caregivers for NU patients.

Physicians, other clinicians, and consultative service providers work in multiple hospital units and departments and care for NU patients. This group includes PTs employed by the medical center and providing care to patients in all hospital locations. Some physicians and PTs work in both the hospital and clinic settings. However, that is not the same for RNs and PCTs.

The acute care hospital carefully adheres to state-mandated staffing ratios while remaining cognizant of financial constraints and affordability, one effort of the Quintuple Aim (Nundy et al., 2022). The NU observed pandemic impacts in 2021, with a loss of many core nursing staff. Staffing was a struggle, and the team felt burnt out. The NU consistently upheld RN staffing ratios, though often only by having the ANM and even the NM enter staffing for patient care.

Staff on the NU are familiar with the performance improvement projects, often using the IHI plan, do, study, act cycle to drive these efforts (Hilton & Anderson, 2018). Unfortunately, like many care units, this NU declined focused improvement work during the pandemic. However, with the various impacts and hardships of the pandemic, the NU benefits from now activating improvement cycles with
the coordination of the CNL, the kindness of Human-Centered Leadership, and the awareness of the Power as Knowing Participation in Change Theory.

Fall prevention strategies will be limited to patients within specific clinical guidelines, including those receiving care from the hospitalist team and 18 years of age or older. In addition, this study excludes pregnant, non-pregnant, and pediatric patients cared for under maternal-child services, patients under care in the perioperative setting, and patients in the Emergency Department. Detailed specifications are in the project charter (Appendix E).

**Interventions**

Creating a fall prevention bundle to reduce patient falls is a significant effort requiring time, focus, and personnel resources. It is reasonable to consider that this work will take months, if not years, to fully implement and then spread through the medical center and beyond. Therefore, the interprofessional improvement team, led by the CNL, approaches this project in phases.

**Phase One: “Now”**

The first phase includes two components, the first is recruitment and self-nomination to identify unit champions of differing disciplines to represent each shift (night, day, and evening), and the second is to survey the unit staff (RN, PCT, ANM, NM, and PT) on the methods used for documenting and communicating patient fall risk and patient falls. After determining the documentation baseline, the improvement team will confirm the preferred documentation method. Champions and interdisciplinary team members will then utilize huddles, team meetings, and just-in-time communications to educate peers and colleagues on the selected technique. Finally, the CNL and regional data consultant will obtain documentation data for pre- and post-implementation use of the preferred documentation method.
Phase Two: “Next”

Early observation and practice verification steps during the documentation implementation phase will increase overall unit awareness of fall documentation and communication practices and open pathways to improvement. In the “Next” stage, unit champions will lead NU staff to develop expectations for a standard fall-risk communication that includes patient fall risks and fall history during handoffs. These will consist of every transfer of care (RN to PCT, break/relief RN to RN, etc.), PT mobilization, patient visits by ANM and NM, and physician rounds. The team may consider merging clinician findings, specifically the PT mobility assessment and RN fall risk assessment, to inform the standard fall-risk communication. With the CNL’s guidance, the team will select an evidence-based communication tool to support the effort for improved standardization communication and ensure concerns are considered and mitigated. The team may consider an evidence-based tool like the TeamSTEPPS I PASS the BATON communication tool (AHRQ, 2019).

Phase Three: “Future”

Future phases will see the implementation of a comprehensive fall-risk bundle that includes an interventions picklist and decision tree for specialized interventions and an advanced screening tool for those at the highest risk for falls with injury. Patients who do not fit the standard fall-risk archetype require particular caution. In addition, it remains important to consider patients who have recently transferred to the NU, including patients repatriated from another medical center, those who are post-operative, or simply a step down from the ICU.

Study of the Interventions

Measurement of the first phase of identifying unit champions is in terms of the percent self-identified for fulfilling the role, to identify two employees to represent each of the three NU shifts. During documentation implementation, the CNL will observe for trends in practice, and unit champions will collect anecdotal feedback from colleagues. Champions will be encouraged to contribute innovative
ideas throughout the change process. Members of the interdisciplinary team provide support to unit champions and physical therapists (who are not unit-based) through the improvement phases.

**Measures**

Quantifying the impacts of these interventions requires outcome, process, and balancing measures. Successful outcomes demonstrate a decrease in fall count from a baseline of eight falls in 2021 and a reduction in fall rate from the current rate of 0.5 falls per patient day. The phase one process measures are the percent of recruitment for the unit champions and the completion rate of the NU survey to determine current documentation practices. To ensure this intervention does not cause unexpected consequences, the team will observe three balancing measures: no reduction in patient mobility, no increase in patient restraints, and no increase in employee injury.

**Ethical Considerations**

The CNL’s work described herein reflects several guiding principles of ethics and values. The fundamental Jesuit value of *Educating the Whole Person* was revealed by St. Ignatius, believing that God is present in every human experience, growth opportunity, and endeavor. In this spirit, the CNL works to promote all aspects of each individual’s development. This CNL author, who is also a Human-Centered Leader, focuses on creating opportunities to support individuals and build trust in their journey as a whole person and as it pertains to colleagues, patients, and systems of care delivery.

Quality improvement efforts are guided and approved by trained faculty. This project has been approved as a quality improvement project by faculty using QI review guidelines and does not require IRB approval (Appendix F). Further, the CNL adheres to the profession’s guiding body, the American Nurses Association’s Code of Ethics, as the resource for a shared vision of professional values. The first provision of the Code of Ethics is fundamental and reveres the whole person stating, “the nurse practices with compassion and respect for the inherent dignity, worth, and unique attributes of every person” (American Nurses Association, 2015).
Results

Barriers to Pursing Outcomes

Disruptions in the community, at the facility level, in the microsystem, and for the CNL contributed to the first project phase not progressing, postponing the second and third phases. A number of severe and unrelenting issues prevented the “Now” project phase from commencing as planned. Specifically, staffing issues in the NU and quality department have impacted improvement efforts, including this project. In late spring of 2022, the hospital’s local community experienced a resurgence of COVID-19, increasing the hospital’s average daily census well above what is typical for this time of year. As part of the community, staff members are not immune to the ongoing pandemic, leading to unpredictable illnesses and short-term leaves of absence. A more alarming issue is the extreme gap in staffing, as many employees have left the medical center and have not yet been replaced; this reflects national trends as well (https://www.nursingworld.org/practice-policy/nurse-staffing/nurse-staffing-crisis/). The NU currently has twelve unfilled staff positions and feels the impact of this staffing crisis during each shift. Simultaneously, the seven-person quality department has recently lost three employees, and a fourth will retire mid-summer.

In the same timeframe, the Joint Commission arrived for the triennial survey, an unannounced, three-day on-site reaccreditation process, and an “all-hands-on-deck” scenario. The quality department members are crucial for supporting clinical teams by monitoring the patient census and providing data, policies, and regulatory reports. In addition, the leaders, staff, and teams from every care unit work tirelessly to display their fantastic work, including their outstanding clinical and quality improvement efforts while continuing to care for hospitalized patients. A Joint Commission survey is a proud occasion; however, it also disrupts the continuity of many of the hospital’s ongoing quality improvement efforts.
Burgeoning Efforts

Members of the Fall Committee met monthly in early 2022 and last convened in April just before the onset of the phase “Now” efforts. In these meetings, the team reviewed the year-to-date fall data and the prior year’s comparative data and confirmed that the proposed interventions were supported and would go forward. Fall Committee members agreed to introduce the small test of change at the selected microsystem. Despite broader disruptions, some Fall Committee team members completed individual segments of the project, including the addition of educating all new staff and at annual skills day (a requirement for staff RNs) about the “Apparent Fall this Shift” field in the EHR. Fall Committee members also volunteered to assist with identifying and recruiting unit champions.

The CNL and Fall Committee continued to assess the circumstances and realized that considering the previously described barriers, moving forward with elements of phase “Now” – recruitment of staff champions and a survey of the entire NU staff – was not appropriate in the immediate moment. Therefore, the CNL and fall committee decided to move forward with an informal survey of a sample of staff from the previously designated roles of RN, PCT, ANM, NM, and PT. The survey was helpful, revealing a lack of consistency in the EHR location used to document patient falls and related inconsistency regarding where individuals go to learn whether a patient has experienced a fall during the present hospitalization. For example, respondents report using the “Apparent Fall this Shift” field in the EHR; however, just as frequently, respondents said they complete narrative documentation in the notes section or add a comment into another discrete field in the EHR. Finding the notes and addended comment options during data abstraction isn’t easy and, anecdotally, may be challenging to find by colleagues who are providing care to the patient. This anecdotal feedback and key finding confirms the need to collectively utilize a consistent locale for data entry regarding fall documentation in the EHR.
One element that could move forward as planned is the data collection and review showing the use of the “Apparent Fall this Shift” EHR documentation field. While the NU champions were not selected and did not educate their NU peers on this preferred documentation field, educators introduced newly hired RNs to this field during onboarding. It is also currently used for the annual RN skills days education fair. Therefore, the data comparison of the location of fall events can be cross-walked with documentation in the “Apparent Fall this Shift.” Unfortunately, the result of this comparison was inconclusive, as there have been zero falls on the NU since March, coinciding with the beginning of the education for using the “Apparent Fall this Shift” field in the EHR.

Since January 2022, the NU has had zero injury falls, and from the onset of this quality improvement process, the NU has achieved eighty-nine consecutive days without a patient fall (Appendix G, Appendix H). Compared with baseline data, the total fall count is constant at both the unit and hospital levels; however, there is a shift in fall severity. Of the hospital’s thirty falls in the first sixth months of 2021, one fall (3%) caused major injury, two (7%) caused moderate injury, nine (30%) caused minor injury, and eighteen (60%) caused no injury (Appendix A). In contrast, the twenty-eight falls in 2022’s first six months are mostly no injury falls (93%), and only two (7%) caused minor injury (Appendix G). There have been no moderate-harm, major-harm, or sentinel event patient falls since the onset of this quality improvement process. The early intervention, selecting NU champions, was unable to take place, so there is no result to indicate the success of this process measure. During the change process, the balancing measures are all favorable, indicating a reduction in patient restraints and employee injury and the favorable adjustment of an increase in overall patient mobility.

Summary

Despite disruptions at the onset of the project’s implementation, the methods hold promise. The microsystem remains suitable for a quality improvement intervention, which may commence when the CNL, NM, and Fall Committee team determine the proper timing. Equipped with the skills of Human-
Centered Leadership’s four elements of self-awareness, self-compassion, self-care, and mindfulness, the CNL will monitor the microsystem team’s readiness and engage when appropriate.

Conclusions

Unfortunately, this phased quality initiative did not progress as planned. However, it was thoughtfully reviewed and carefully selected for this focused CNL quality improvement project. Although the timing and circumstances did not prove beneficial or align with the prepared project timeline, this project is replicable. It will advance patient safety efforts in the microsystem and hospital. Developing a fall prevention bundle with evidence-based tools for hospitalized adults requires an excellent working knowledge of individual, organizational, discipline-based behaviors and best practices to recognize gaps and introduce improvements to reduce all falls by standardization. In conclusion, utilizing current evidence and the principles of systems-based practice (AACN, 2021) in collaboration with other interprofessional teams, interventions are generalizable to other NUs caring for adult patients at risk for falls.
References


http://www.ihi.org/resources/Pages/IHIWhitePapers/IHI-Psychology-of-Change-Framework.aspx


https://doi.org/10.1186/s12912-021-00618-y


https://members.nursingquality.org/NDNQIPortal/Documents/General/Guidelines%20-%20PatientFalls.pdf?linkid=s0_f776_m73_m230_a0_m236_a0_m242_a0


[https://doi.org/10.1097/NCQ.0000000000000344](https://doi.org/10.1097/NCQ.0000000000000344)
Appendices

Appendix A

Hospital Baseline Fall Data by Nursing Unit, 2021


The graph depicts baseline data of all falls (injury and non-injury) among six Adult Services Nursing Units at a medium-sized acute care hospital in 2021. Adult Unit C, the only unit with patient falls resulting in major harm, was selected for a quality improvement intervention.
## Appendix B

**Figure B1: Johns Hopkins Nursing Evidence-Based Practice (JHNEBP) Research Evidence Appraisal Tool**

### Appendix E
**Research Evidence Appraisal Tool**

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<td>Sample (composition and size):</td>
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Does this evidence address my EBP question?
- [ ] Yes
- [ ] No-Do not proceed with appraisal of this evidence

**Is this study:**
- [ ] *QuaNtitative* (collection, analysis, and reporting of numerical data)
  
  Measurable data (how many; how much; or how often) used to formulate facts, uncover patterns in research, and generalize results from a larger sample population; provides observed effects of a program, problem, or condition, measured precisely, rather than through researcher interpretation of data. Common methods are surveys, face-to-face structured interviews, observations, and reviews of records or documents. Statistical tests are used in data analysis.

  Go to Section I: QuaNtitative

- [ ] *QuaLitative* (collection, analysis, and reporting of narrative data)
  
  Rich narrative documents are used for uncovering themes; describes a problem or condition from the point of view of those experiencing it. Common methods are focus groups, individual interviews (unstructured or semi structured), and participation/observations. Sample sizes are small and are determined when data saturation is achieved. Data saturation is reached when the researcher identifies that no new themes emerge and redundancy is occurring. Synthesis is used in data analysis. Often a starting point for studies when little research exists; may use results to design empirical studies. The researcher describes, analyzes, and interprets reports, descriptions, and observations from participants.

  Go to Section II: QuaLitative

- [ ] *Mixed methods* (results reported both numerically and narratively)

  Both quaNtitative and quaLitative methods are used in the study design. Using both approaches, in combination, provides a better understanding of research problems than using either approach alone. Sample sizes vary based on methods used. Data collection involves collecting and analyzing both quaNtitative and quaLitative data in a single study or series of studies. Interpretation is continual and can influence stages in the research process.

  Go to Section III: Mixed Methods

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Figure B2: Johns Hopkins Nursing Evidence-Based Practice (JHNEBP) Non-Research Evidence Appraisal Tool

Johns Hopkins Nursing Evidence-Based Practice

### Appendix F

**Non-Research Evidence Appraisal**

<table>
<thead>
<tr>
<th>Evidence level and quality rating:</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Article title:</td>
<td>Number:</td>
</tr>
<tr>
<td>Author(s):</td>
<td>Publication date:</td>
</tr>
<tr>
<td>Journal:</td>
<td></td>
</tr>
<tr>
<td>Setting:</td>
<td>Sample (composition and size):</td>
</tr>
<tr>
<td>Does this evidence address my EBP question?</td>
<td>□ Yes □ No</td>
</tr>
<tr>
<td></td>
<td>□ No - Do not proceed with appraisal of this evidence</td>
</tr>
</tbody>
</table>

- **Clinical Practice Guidelines LEVEL IV**
  Systematically developed recommendations from nationally recognized experts based on research evidence or expert consensus panel

- **Consensus or Position Statement LEVEL IV**
  Systematically developed recommendations, based on research and nationally recognized expert opinion, that guide members of a professional organization in decision-making for an issue of concern

- Are the types of evidence included identified? □ Yes □ No
- Were appropriate stakeholders involved in the development of recommendations? □ Yes □ No
- Are groups to which recommendations apply and do not apply clearly stated? □ Yes □ No
- Have potential biases been eliminated? □ Yes □ No
- Does each recommendation have an identified level of evidence stated? □ Yes □ No
- Are recommendations clear? □ Yes □ No

Findings That Help Answer the EBP Question

Complete the corresponding quality rating section.
**Figure B3: Johns Hopkins Nursing Evidence-Based Practice (JHNEBP) Evidence Level and Quality Guide**

**Appendix D**  
Evidence Level and Quality Guide

<table>
<thead>
<tr>
<th>Evidence Levels</th>
<th>Quality Ratings</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Level I</strong></td>
<td></td>
</tr>
<tr>
<td>Experimental study, randomized controlled trial (RCT)</td>
<td>Qualitative Studies</td>
</tr>
<tr>
<td>Explanatory mixed method design that includes only a level I qualitative study</td>
<td><strong>A High quality</strong>: Consistent, generalizable results; sufficient sample size for the study design; adequate control; definitive conclusions; consistent recommendations based on comprehensive literature review that includes thorough reference to scientific evidence.</td>
</tr>
<tr>
<td>Systematic review of RCTs, with or without meta-analysis</td>
<td><strong>B Good quality</strong>: Reasonably consistent results; sufficient sample size for the study design; some control, fairly definitive conclusions; reasonably consistent recommendations based on fairly comprehensive literature review that includes some reference to scientific evidence.</td>
</tr>
</tbody>
</table>

| **Level II**     |                |
| Quasi-experimental study | Qualitative Studies |
| Explanatory mixed method design that includes only a level II qualitative study | **C Low quality or major flaws**: Little evidence with inconsistent results; insufficient sample size for the study design; conclusions cannot be drawn. |
| Systematic review of a combination of RCTs and quasi-experimental studies, or quasi-experimental studies only, with or without meta-analysis | |

| **Level III**    |                |
| Nonexperimental study | Qualitative Studies |
| Systematic review of a combination of RCTs, quasi-experimental and nonexperimental studies, or nonexperimental studies only, with or without meta-analysis | No commonly agreed-on principles exist for judging the quality of qualitative studies. It is a subjective process based on the extent to which study data contributes to synthesis and how much information is known about the researchers’ efforts to meet the appraisal criteria. For meta-synthesis, there is preliminary agreement that quality assessments of individual studies should be made before synthesis to screen out poor-quality studies. |
| Exploratory, convergent, or multiphase mixed methods studies | **A/B High/Good quality** is used for single studies and meta-syntheses. |
| Qualitative study Meta-synthesis | The report discusses efforts to enhance or evaluate the quality of the data and the overall inquiry in sufficient detail; and it describes the specific techniques used to enhance the quality of the inquiry. Evidence of some or all of the following is found in the report: |
| - Transparency: Describes how information was documented to justify decisions, how data were reviewed by others, and how themes and categories were formulated. | - Dilligence: Reads and rereads data to check interpretations; seeks opportunity to find multiple sources to corroborate evidence. |
| - Verification: The process of checking, confirming, and ensuring methodologic coherence. | - Self-reflection and scrutiny: Being continuously aware of how a researcher’s experiences, background, or prejudices might shape and bias analysis and interpretations. |
| - Participant-driven inquiry: Participants shape the scope and breadth of questions; analysis and interpretation give voice to those who participated. | - Insightful interpretation: Data and knowledge are linked in meaningful ways to relevant literature. |
| - Insufficient interpretation: No studies contribute little to the overall review of findings and have few, if any, of the features listed for high/good quality. | |

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**Appendix C**

**Evidence Evaluation Table**

**PICOT Question:** “does an evidence-based fall prevention program that includes comprehensive assessment, standardized communication, and individualized interventions based on patient-specific risks (I) compared to no practice change (C) reduce the fall rate (O) in hospitalized adult medical-surgical patients (P) over four weeks (T)?

<table>
<thead>
<tr>
<th>Study</th>
<th>Study Design</th>
<th>Sample</th>
<th>Outcome/Feasibility</th>
<th>Evidence rating</th>
</tr>
</thead>
<tbody>
<tr>
<td>Krakau et al. (2021). Validation of nursing documentation regarding in-hospital falls: A cohort study. <em>BMC Nursing.</em></td>
<td>Retrospective cohort, Quasi-experimental</td>
<td>Stratified sample: reviewed EHR representing 714 fall events out of nearly 32,000 patient admissions</td>
<td>Describes a process for indicating patient falls through specific terminology in nurses’ discharge notes for valid and reliable measurement of falls in inpatient care.</td>
<td>L IV B</td>
</tr>
<tr>
<td>López-Soto et al. (2021). Chronoprevention in hospital falls of older people: Protocol for a mixed-method study. <em>BMC Nursing.</em></td>
<td>Protocolized for mixed-methods: prospective longitudinal study, retrospective study, and descriptive exploratory study</td>
<td>Protocolized for patients aged 65 or older who experience ≥1 fall during hospitalization in a given time frame</td>
<td>Describes a process to study time as a factor in hospital patient falls, and provides guidelines for fall reduction in hospital settings, and settings with similar characteristics. Authors introduce the idea that temporal factors (time of day, day of the week, and the month of the year) are key factors in fall occurrence of hospitalized patients.</td>
<td>L IV B</td>
</tr>
<tr>
<td>Authors</td>
<td>Title</td>
<td>Study Design</td>
<td>Setting</td>
<td>Findings</td>
</tr>
<tr>
<td>-------------------------</td>
<td>----------------------------------------------------------------------</td>
<td>-------------------------------</td>
<td>---------------------------------------</td>
<td>----------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Opsahl et al. (2017)</td>
<td>Outcomes of adding patient and family engagement education to fall prevention bundled interventions. <em>Journal of Nursing Care Quality.</em></td>
<td>Qualitative descriptive design, Quasi-experimental</td>
<td>Convenience sample in a medical-surgical unit setting</td>
<td>Findings suggest a fall prevention program can benefit from an educational video for patients and their families to decrease fall rates. The study also suggests utilizing video technology in a fall prevention program</td>
</tr>
<tr>
<td>Røyset et al. (2019)</td>
<td>Effects of a fall prevention program in elderly: A pragmatic observational study in two orthopedic departments. <em>Clinical Interventions in Aging.</em></td>
<td>Quasi-experimental</td>
<td>Adults &gt;65 admitted to two similar units over a 2-year period</td>
<td>The intervention of a fall prevention program on the study group revealed no significant effect on the rate of fallers, the patient safety culture, or patient-perceived safety, compared to the control group.</td>
</tr>
</tbody>
</table>
References


Appendix D

Human-Centered Leadership Model

Figure. Human-Centered Leadership model: the framework reflects an innovative approach to leadership in health care that starts with the leader’s mind, body, and spirit as the locus of influence within local and larger complex systems. The Human-Centered Leader realizes success in nurturing cultures of Excellence, Trust, and Caring by being an Awakener, a Connector, and an Upholder.

Leclerc et al. (2020)
Appendix E

Project Charter

**Title:** Development of a Fall Prevention Bundle with Evidence-Based Tools for Hospitalized Adults

**Global Aim:** To develop a reliable system to eliminate patient fall events on an Adult Services Nursing Unit (NU) through the utilization of a fall prevention bundle that includes evidence-based tools.

**Specific Aim:** To reduce the rate of falls that result in patient harm from 0.5 to < 0.41 and eliminate sentinel event falls for patients in a select adult medical-surgical NU by introducing an evidence-based fall prevention bundle that includes comprehensive assessment, standardized communication, and documentation, and individualized interventions based on patient-specific risks.

**Background:** Hospitalized patient falls are considered a “never event.” Yet, the Agency for Healthcare Research and Quality (AHRQ) estimates that every year in the United States, up to one million hospitalized people fall, a rate of 3-5 falls per 1,000 patient days, as further clarified by the Patient Safety Net, an arm of AHRQ (AHRQ, 2019; AHRQ, 2021). Research shows that up to a third of hospital falls are preventable (AHRQ, 2021). Hospital falls can cause lacerations, fractures, and internal bleeding, causing temporary or permanent injury, requiring further dependence on the health system and incurred costs.

In 2021, data show one medical-surgical unit at an acute care hospital reported eight patient falls, four of which were falls with injury, causing temporary or permanent harm. Two falls with injury were major harm fall events that reached sentinel event criteria. While this unit has the second-lowest all-falls rate in the hospital, it simultaneously has the highest rate of falls with injury. It is the only unit among the hospital’s five medical-surgical units to have sentinel event falls in 2021.

**Sponsors:** Chief Nursing Officer/Chief Operating Officer, Area Quality Leader, Assistant Physician in Chief for Hospital Operations, and Clinical Quality Director.

**Goals:** To provide effective fall prevention for hospitalized adult patients in a medical-surgical unit by implementing a sustainable fall prevention program that includes:

1. Fall assessment methods standardized between disciplines
2. Fall prevention strategies individualized for each fall-risk patient
3. Fall event documentation consistent between shifts and disciplines
4. Assessments and interventions clearly communicated between various staff, shifts, and disciplines interacting with the patient.
5. Any near-miss or fall events clearly communicated between various staff, shifts, and disciplines interacting with the patient.
### Project Charter Measures

<table>
<thead>
<tr>
<th>Measure</th>
<th>Communicating the Data</th>
<th>Data Source</th>
<th>Target</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Outcome Measure</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Falls with injury count</td>
<td>Run Chart: formulate as data over time.</td>
<td>Reported through the electronic responsible reporting form (eRRF), the internal reporting system, verified with chart abstraction</td>
<td>0</td>
</tr>
<tr>
<td>Falls with injury rate</td>
<td>Run Chart: formulate as aggregate data over time.</td>
<td>Organizational data report – Crossing the Quality Chasm (CQC)</td>
<td>&lt;0.41</td>
</tr>
<tr>
<td></td>
<td>Falls with injury data are available in real-time. Will be maintained manually in a run chart</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Falls with injury rates are a late indicator and are not available in real-time. These become available after the month is closed and data compiled. Then the rate is in context with the results of other regional hospitals.</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Process Measure</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fall assessment techniques survey completion rate by unit RN and PT staff (includes break/relief RN and ADL-assist RN)</td>
<td>Visual display of completion rates, such as a “thermometer” image or similar.</td>
<td>Manual tally</td>
<td>≤36/40 (90%)</td>
</tr>
<tr>
<td><strong>Balancing Measure</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>No increase in restraint days</td>
<td>Compare current rate and future results.</td>
<td>Info-view report</td>
<td>No change</td>
</tr>
<tr>
<td>No reduction of the patient mobility rate</td>
<td>Observe daily mobility results during project implementation.</td>
<td>Tableau report</td>
<td>No reduction</td>
</tr>
</tbody>
</table>

### Team

<table>
<thead>
<tr>
<th>Role</th>
<th>Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medical Director for Quality</td>
<td>MD Leader</td>
</tr>
<tr>
<td>RN Manager of a select medical-surgical unit</td>
<td>RN Leader</td>
</tr>
<tr>
<td>Adult Services CNS</td>
<td>Educator</td>
</tr>
<tr>
<td>Quality RN, CNL</td>
<td>Project Lead</td>
</tr>
<tr>
<td>Medical-Surgical unit staff RN</td>
<td>RN Champion</td>
</tr>
<tr>
<td>Hospital Physical Therapist</td>
<td>PT Champion</td>
</tr>
<tr>
<td>eRRF Repository Administrator</td>
<td>Quality/data support</td>
</tr>
</tbody>
</table>
Aim: Reduce patient falls with injury by July 2022

Primary Drivers:
- Consistently identify patient fall risk
- Prevent falls in at-risk patients
- Communicate assessment & related information

Secondary Drivers:
- Standardize mobility assessment among disciplines
- Develop individualized fall prevention plans
- Apply patient-specific interventions
- Record assessments and interventions
- Share falls and near-miss fall events among disciplines

Change Ideas:
- Survey disciplines to assess for variation in practice
- Use eRRF and chart abstraction to identify intervention
- Use data from patient history to develop a fall-prevention plan
- Consider the ideal location for documenting in EMR
- Develop a communication strategy suitable for all disciplines
Project Charter Timeline
## CNL Project: Statement of Non-Research Determination Form

**Student Name:** Kelly Tirone

<table>
<thead>
<tr>
<th><strong>Title of Project:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Development of a Fall Prevention Bundle with Evidence-Based Tools for Hospitalized Adults</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Brief Description of Project:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Reduce hospital patient falls and falls that cause injury through collaborative efforts of improved documentation and increased interdisciplinary communication in a medical-surgical unit in a medium-sized community hospital.</td>
</tr>
</tbody>
</table>

**A) Aim Statement:**

Through improved documentation and communication of patient fall risk (by registered nurses) and mobility assessment (by physical therapists), as well as actual patient fall events, to reduce falls that result in patient harm from a rate of 0.5 to < 0.41 per 1,000 patient days in a select adult medical-surgical nursing unit over four weeks.

**B) Description of Intervention:**

The clinical team will provide effective fall prevention efforts for hospitalized adult patients in a medical-surgical unit by implementing a fall prevention program with active intervention. The program components include standardized communication of assessments and interventions that are clearly communicated between the diverse staff, shifts, and disciplines interacting with the patient, and consistent EHR documentation of fall and near-fall events to inform all providers prior to interacting with the patient and for data abstraction purposes.

**C) How will this intervention change practice?**

This intervention will change practice by increasing patient safety through proactive measures to reduce fall events completed through interdisciplinary collaboration and
D) Outcome measurements:

Monitoring of several measures will indicate the success of this intervention, including a reduction of the fall with injury count (early indicator), and a reduction of the fall with injury rate (late indicator).

To qualify as an Evidence-based Change in Practice Project, rather than a Research Project, the criteria outlined in federal guidelines will be used:
(http://answers.hhs.gov/ohrp/categories/1569)

☐ This project meets the guidelines for an Evidence-based Change in Practice Project as outlined in the Project Checklist (attached). Student may proceed with implementation.

☐ This project involves research with human subjects and must be submitted for IRB approval before project activity can commence.

Comments:

EVIDENCE-BASED CHANGE OF PRACTICE PROJECT CHECKLIST *

Instructions: Answer YES or NO to each of the following statements:

<table>
<thead>
<tr>
<th>Project Title: Development of a Fall Prevention Bundle with Evidence-Based Tools for Hospitalized Adults</th>
<th>YES</th>
<th>NO</th>
</tr>
</thead>
<tbody>
<tr>
<td>The aim of the project is to improve the process or delivery of care with established/accepted standards, or to implement evidence-based change. There is no intention of using the data for research purposes.</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>The specific aim is to improve performance on a specific service or program and is a part of usual care. ALL participants will receive standard of care.</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>The project is NOT designed to follow a research design, e.g., hypothesis testing or group comparison, randomization, control groups, prospective comparison groups, cross-sectional, case control). The project does NOT follow a protocol that overrides clinical decision-making.</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>The project involves implementation of established and tested quality standards and/or systematic monitoring, assessment or evaluation of the organization to ensure that existing quality standards are being met. The project does NOT develop paradigms or untested methods or new untested standards.</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>The project involves implementation of care practices and interventions that are consensus-based or evidence-based. The project does NOT seek to test a</td>
<td>Yes</td>
<td></td>
</tr>
</tbody>
</table>
**Department of**

**School of Nursing and Health Professions**

| intervention that is beyond current science and experience. | Yes |
| The project is conducted by staff where the project will take place and involves staff who are working at an agency that has an agreement with USF SONHP. | Yes |
| The project has NO funding from federal agencies or research-focused organizations and is not receiving funding for implementation research. | Yes |
| The agency or clinical practice unit agrees that this is a project that will be implemented to improve the process or delivery of care, i.e., not a personal research project that is dependent upon the voluntary participation of colleagues, students and/or patients. | Yes |
| If there is an intent to, or possibility of publishing your work, you and supervising faculty and the agency oversight committee are comfortable with the following statement in your methods section: "This project was undertaken as an Evidence-based change of practice project at Kaiser Permanente Santa Rosa hospital or agency and as such was not formally supervised by the Institutional Review Board." | Yes |

**ANSWER KEY:** If the answer to ALL of these items is yes, the project can be considered an Evidence-based activity that does NOT meet the definition of research. **IRB review is not required. Keep a copy of this checklist in your files.** If the answer to ANY of these questions is NO, you must submit for IRB approval.

*Adapted with permission of Elizabeth L. Hohmann, MD, Director and Chair, Partners Human Research Committee, Partners Health System, Boston, MA.*

**STUDENT NAME (Please print):**  Kelly Tirone  

Signature of Student: ___________________________  DATE: 1 April 2022  

**SUPERVISING FACULTY MEMBER NAME (Please print):**  

Signature of Supervising Faculty Member: ___________________________  DATE: 5/4/22
Appendix G

Hospital Fall Data by Nursing Unit, Jan 2022 – Jun 2022

2022 (Jan - Jun) Patient Falls by Nursing Unit (NU)


The graph depicts year-to-date data of all falls (injury and non-injury) among six Adult Services Nursing Units at a medium-sized acute care hospital in the first six months of 2022.

Year-to-date data show no patient falls resulting in major harm as of June 30, 2022.
Appendix H

Adult Unit C Baseline Falls Data, 2021 and Adult Unit C Outcome Falls Data, PYTD 2022

Hospital Baseline Falls Data, 2021 and Hospital Outcome Falls Data, PYTD 2022

Data Source: Hospital Data Repository for Electronic Event Reporting.

Retrieved January 28, 2022 (Baseline Falls Data, 2021) and July 2, 2022 (Outcomes Falls Data, 2021)

The graphs depict baseline data of all falls (injury and non-injury) among six Adult Services Nursing Units and the single selected Nursing Unit C at a medium-sized acute care hospital in 2021 and PYTD 2022.