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Can the implementation of interprofessional rounds improve hospital throughput efficiency?

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Can the Implementation of Interprofessional Rounds Improve Hospital Throughput
Efficiency?

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Abstract

Efficient throughput processes are a vital part of providing cost effective, safe, quality patient care. Research has shown interprofessional rounds can have success at improving throughput processes. A rural, not-for-profit, 255 bed hospital in a Mid-Atlantic State was experiencing issues with throughput/patient flow. The aims of this quality improvement project were 1). to implement Interprofessional Rounds on the Progressive Care Unit (PCU); 2). To design and build a working Interprofessional Rounds template into meditech to guide Interprofessional Rounds and streamline discharge documentation; 3). to increase the amount of discharge orders entered between 0700 and 1300 by ten percent; and 4). to decrease the average length of time between discharge order and actual discharge of the patient by ten percent.

The setting for this Quality Improvement project was the Progressive Care Unit (PCU). Using the Institution for Healthcare Improvement (IHI) Model of Improvement Framework, and Interprofessional Project Team completed six cycles of Rapid Cycle Quality Improvement (RCQI). Participants in the Interprofessional Rounds intervention were: Case Management, Scribe, Hospitalist, Pharmacy (on a limited schedule), Charge Nurse, and Unit Director.

A retrospective chart review was used to gather data from June 2017 to June 2018. The sample included patients under the hospitalist's care, with an inpatient status, being discharged home. A total of 1643 charts were included in the project. Run charts were used. Results showed an increase in the amount of discharge orders entered between 0700 and 1300. The average length of time from discharge order entry to actual

discharge showed some varying degrees of improvement but did not meet the ten percent goal set by the project team.

Introduction

Health care reform is an important topic in today's world. In comparison to the rest of the world, the United States has the most expensive health care system. Currently 17% of the gross domestic product is used for health care. By 2020 the percentage used for health care is expected to rise to twenty percent. In an effort to help fix some of the issues with health care, the Institute for Healthcare Improvement (IHI) has proposed the use of the Triple Aim Framework (IHI Triple Aim, n.d.).

The Triple Aim Framework involves improving health care performance by focusing on three specific areas: improving the quality of healthcare including overall patient satisfaction and experience, improving the health of the overall population, and reducing the cost of health care. The IHI has recommended focusing on all three of the aims simultaneously to make successful improvements in health care (IHI Triple Aim, n.d.). The implementation of Interprofessional Rounds in the acute hospital setting can address issues in all three of the Triple Aims.

Interprofessional rounds on inpatient hospital units has been shown to improve communication among health care providers from all disciplines. Improving communication has been a long-standing goal of hospitals. Organizations such as the Joint Commission and the Institute of Medicine have issued statements about the need to improve communication in health care (Cornell & Townsend-Gervis, 2014). Poor communication has been linked to patient safety concerns and poor patient satisfaction (Cornell & Townsend-Gervis, 2014). In 2005 the Joint Commission highlighted the need to improve the efficiency of throughput processes in hospitals (Walker, Kappus, & Hall, 2016). Inefficient throughput processes, including delayed discharge times, can also have

a negative impact on patient safety. According to an American Hospital Association survey published in 2012, poor patient throughput is often caused by issues with communication and poor or no discharge planning within 24 hours of admission (Walker, Kappus, & Hall, 2016).

Interprofessional rounds have been shown to be beneficial in the hospital setting to improve communication. The aims of this quality improvement project were to 1). to implement interprofessional rounds on the Progressive Care Unit (PCU); 2). To design and build a working interprofessional rounds template into meditech to guide interprofessional rounds and streamline discharge documentation 3). to increase the amount of discharge orders entered between 0700 and 1300 by ten percent, and 4). to decrease the average length of time between discharge order and actual discharge out of the patient by ten percent.

Problem Description

Slow throughput is an important problem in hospitals throughout the US. Throughput is defined as the movement of patients through the physical hospital building ("Patient Throughput", 2007). At this healthcare facility, frequent delays occur moving patients through the system because of late discharges especially during times of high census. With the peak number of discharges and admissions occurring simultaneously, nurses and doctors report feeling overwhelmed leading to job dissatisfaction.

Environmental services reported feelings of being overwhelmed with the amount of late discharges. During the late afternoon and evening hours housekeeping staff was reduced. Late discharges during lower staffing levels for housekeeping caused further

delays getting patients from the Emergency Department (ED) to the room due to lack of staff to terminally clean rooms.

The patients also get frustrated with the delays in the discharge process and lengthy ED stays resulting in lower patient satisfaction scores (Walker, Kappus, & Hall, 2016). When patients are not moved through the hospital efficiently patients are susceptible to poor care and a higher risk of harm ("Patient flow," 2018). Patients often are required to wait on tests and/or procedures that need to be completed prior to discharge due to lack of communication and discharge planning.

Nurses have also verbalized frustration with the lack of communication about discharge planning. There were no formal rounding processes at this rural, not-for-profit, 255 bed community hospital in a Mid-Atlantic state. Case Managers documented on the discharge plan, but the plans did not get communicated to the nursing staff.

Documentation was often buried under different areas making finding the information in the Electronic Health Record (EHR) time consuming. The lack of communication between disciplines led to delays in discharges. Patients often were required to wait on tests and/or procedures that needed to be completed prior to discharge. Effective interprofessional communication can reduce the amount of delays caused by overlooked tests and procedures. Interprofessional rounds have been shown to increase effective communication and teamwork among health care professionals (Menefee, 2014).

On the Progressive Care Unit (PCU) for example, most of the discharges were written between the hours of 1100 and 2000. Unfortunately, many of admissions also occurred starting at 1100 and 2300. Figure 1 is a run chart that demonstrates the overlapping times of discharge and admissions on PCU in 2016.

Available Knowledge

A literature search was performed using the CINAHL and PubMed databases. Key words used to search research were: throughput, hospital throughput, interdisciplinary rounds, interprofessional rounds, patient flow, and communication. A summary of the most recent research articles on the topic of interprofessional rounds can be found in Table 1. A synthesis of those articles appears below.

Interprofessional Collaboration

The World Health Organization stated interprofessional collaboration was an essential part of successful healthcare in 1978 (Menefee, 2014). The Joint Commission has estimated approximately 65% of sentinel events are caused by issues with communication (Cornell & Townsend-Gervis, 2014). Interprofessional rounds have resulted in improved communication and collaboration between disciplines ("How-to-guide IHI," 2015).

The idea of interprofessional rounds is not a new concept. Over the years, the name of the rounds has included interdisciplinary rounds, multidisciplinary rounds, bed huddles, and patient safety rounds. Rounds can be held at the patient bedside or in a central location on the nursing unit. If the meeting is held without the patient, plans must be made to convey the information discussed in the meeting to the patient. Patient care goals, care plan, and discharge plans should be addressed at each meeting. Effective interprofessional rounds can improve patient outcomes, staff and patient satisfaction, communication, and decrease length of stay ("How-to-guide IHI," 2015).

Menefee proposed a new model for Patient-focused Interdisciplinary Team Collaboration in 2014. In her research she stated evidence-based care is not effective

without interdisciplinary team collaboration. The Menefee Model promotes the use of patient stated goals as the center of the interdisciplinary plan of care. Nurse led rounds were carried out daily on the pilot unit using a predetermined guideline for structure and timing. All team members were expected to participate in rounds. Menefee's research found a reduction of 30-day readmission rates and an increase in patient satisfaction scores after implementation of the Menefee Model (Menefee, 2014).

Throughput Processes

Efficient throughput processes are a vital part of providing cost effective, safe, quality patient care. The Joint Commission requires hospitals to develop and implement efficient throughput processes (Walker et al., 2016). The American Hospital Association surveyed 75 health care systems and hospitals about patient throughput in 2012. The results of the survey concluded inefficient patient throughput are caused by poor communication and/or lack of discharge planning within 24 hours of admission (Walker et al., 2016).

Research has shown interprofessional rounds and care plans can have success at improving throughput processes (Kane, Weinacker, Arthofer, Seay-Morrison, & Elfman, 2016). Wild et al., (2004), studied the effects of interdisciplinary rounds on length of stay in a telemetry unit. The findings did not show a significant difference on length of stay after interdisciplinary rounds were implemented (Wild, Nawaz, Chan, & Katz, 2004). However, research showing a direct tie between interprofessional rounds and the length of time between discharge order and the patient leaving the hospital is limited. Further research will be required. The results of this quality improvement project may provide evidence of Interprofessional Rounds improving hospital throughput efficiency.

Rationale

Interprofessional rounds have been used in varying forms and effectiveness over the years at the hospital in this study. During the time of the team nursing model, attending nurses would be present and round with physicians. The attending nurse would then pass the information onto the floor nurse. After the nursing model changed to primary nursing, attending nurses were phased out and case managers were then utilized. Unfortunately work load caused less time for collaboration and increased communication silos between disciplines.

In the past four years, interprofessional rounds were attempted again on the medical/oncology unit of the hospital in this study. The meeting consisted of the unit's mid-level provider, the charge nurse, the director of the unit, and case management. This form of rounds had some success with increasing the amount of discharges before noon. However, a leadership change and lack of physician support led to the dismantling of the rounds. Throughput issues continued to cause problems on other areas of the hospital. Hospital Leadership requested a form of interprofessional rounds be started to see if throughput issues would be improved. With encouragement from hospital leadership, physician involvement was added to the rounds.

After hospital leadership requested interprofessional rounds be attempted again on the inpatient units, a group was gathered to discuss the formation of Interprofessional Rounds. A review of literature was completed using CINAHL, PubMed, and Cochrane databases. The evidence was analyzed and used to guide the formation of Interprofessional Rounds.

Theoretical Framework

The team used the Institute for Health Care Improvement (IHI) Model of Improvement to guide, evaluate, and improve on the initial Interprofessional Rounds model based on objectives set by the project team (See Appendix A). The Model of Improvement uses the Plan-Do-Study-Act (PDSA) to test changes on a small scale. This model results in a faster improvement in QI projects ("IHI Model of Improvement," 2018). The Plan-Do-Study-Act (PDSA) cycle allows for adjustments and improvement to the original model (White, Dudley-Brown, & Terhaar, 2016). The original project team met and improved upon the model with each PDSA cycle.

The first step of the Model for Improvement was to form a team for the project. After the team was formed three questions needed to be addressed: (a) What are we trying to accomplish?; (b) How will we know if a change is an improvement?; and (c) What change can we make that will result in an improvement?. During this process the team also set aims, established measures, and selected changes that will result in improvement ("IHI Model of Improvement," 2018).

The next step in the Model for Improvement was using the Plan-Do-Study-Act Cycle to test changes for improvement. Several cycles of the PDSA cycle were required to achieve the improvements required by the team. After the improvements needed are achieved, the team can move forward with implementing changes onto other units ("IHI Model of Improvement," 2018). In this project, six PDSA cycles were used.

Specific Aims

The purpose of this quality improvement project was to study the effect of interprofessional rounds on throughput efficiency and processes at a rural, not-for-profit, 255 bed hospital in a Mid-Atlantic state.

The aims of this project included:

- To implement interprofessional rounds on the Progressive Care Unit (PCU)
- To design and build a working interprofessional rounds template into meditech to guide interprofessional rounds and streamline discharge documentation
- To increase the amount of discharge orders entered between the hours of 0700 and 1300 by ten percent.
- Decrease the average length of time between discharge order entry and actual discharge of the patient by ten percent.

Methods

Context

The setting of the project was a rural, not-for-profit, 255 bed hospital in a Mid-Atlantic State. The hospital sees on average 11,000 + admissions a year. This project was piloted on the Progressive Care Unit (PCU) at the hospital. PCU is a 52-bed medical/surgical/telemetry unit. PCU is the largest unit in the hospital. PCU averaged 4356 admissions a year in 2015 and 2016.

Currently most patients on PCU are under the care of the hospitalist group at the hospital. The hospitalist group consists eight full time physicians, four part-time physicians, ten locum physicians, and four mid-level providers. The hospitalist service is assigned patients at random. They are not geographically placed. PCU has one Physician's Assistant who assists in seeing half of the patients on PCU under the supervision of the hospitalist. The interprofessional rounds intervention was carried out on every patient admitted to PCU by the hospitalist group.

Intervention

The interprofessional rounding team met regularly to form and improve the rounding process. The team completed a total of six PDSA cycles during this project (Appendix B).

PDSA Cycle 1 May 2017-October 2017. Early in 2017, the hospital's leadership team suggested a form of Interprofessional Rounds to be started at the hospital to improve throughput and overall hospital flow. A project group was formed May of 2017 to discuss the formation and implementation of interprofessional rounds. The first meeting of the project group was held May 30, 2017. The project group consisted of representatives from case management, physical/occupational/speech therapy, pharmacy, IT, process management, nursing leadership, a floor/charge nurse, and respiratory therapy. Evidence-based research was presented and discussed. After discussion, the group decided on the following goals: increase communication between the disciplines, increase the amount of discharges prior to 12 noon, improve patient satisfaction with discharge process, and improve overall patient outcomes.

During PDSA cycle 1 education of the staff was carried out. Educating the adult learner can be difficult especially on a busy hospital unit. Knowles Adult Learning Theory was used to guide the groups education efforts (Kaufman, 2003). The Adult Learning Theory was designed to help teach adult learners. This Theory is based on five assumptions. First the students involved must be independent and self-directed. Adult learners have had more experience in life and practice. This experience should be used to encourage learning. Adult learners are busy. They respond well to education plans designed around their demanding life. Adult learners are more interested in education designed around solving problems. The motivation to learn comes from within the adult

learner (Kaufman, 2003). Using these assumptions as a guide, the education team designed a plan for teaching staff about Interprofessional Rounds during PDSA cycle 1.

Most adult learners prefer visual, auditory, and kinesthetic learning styles (Russell, 2006). The education team designed an educational flyer to email out to staff. The flyer was also placed on bulletin boards on the unit. Members of the education group also attended morning and evening huddles on the unit to provide more education and support to staff. In addition, members of the education group had roving in-services on the unit. These in-services provided one on one instruction about rounds and allowed time for any questions staff may have. The education for interprofessional rounds was an ongoing process. Members of the educational group provided support and additional education to staff as needed throughout this project.

Education for the Hospitalists was designed and provided by the physicians on the project group. A template for issues to be discussed during rounds was provided to the hospitalists (See Appendix C). Education was carried out during the hospitalist's meetings. The flyers were also provided to the Chief Hospitalist to distribute among her staff.

The educational flyer was also emailed out to other departments in the hospital that may be affected by interprofessional rounds. The departments included in the education email were: dietary, wound center, resource clinician, pharmacy, diabetic education, and physical, occupational, and recreational therapies.

The documentation template was also designed during the first PDSA cycle. The first version of the documentation template was designed in the summer of 2017 (See Appendix D). The project group had preliminary goals in the formation of the template.

Discharge documentation was fragmented and difficult to find in Meditech. The first goal was to make the documentation comprehensive and easy to find in one assessment. The Project Group also wanted to avoid double documentation and to make the template “work”. Many areas of the template, when checked, sent notifications to the intended department. For example, when the wound center follow-up box was checked a notification was sent to the wound center office allowing clerical staff to schedule follow up appointments for the patient. To reduce double documentation, many areas of the template pre-populated with data already collected by case management, nursing, and/or respiratory therapy. Documentation on the IR template was restricted to members of case management and nursing. All other staff in the hospital could view the documentation in Meditech but were unable to document on the template.

The first implementation of interprofessional rounds (IR) on PCU was October 4, 2017. Rounds were held Monday through Friday at 1100 in a conference room on PCU. The conference room had a large television with access to Meditech which allowed everyone to view the template and documentation. The IR team included Case Management, Hospitalist, Scribe, Charge Nurse, Pharmacy and Director of PCU. A Scribe documented on the template and navigated through patient records in Meditech. One Hospitalist was chosen each week to discuss his/her patients. The goal was to limit discussion to 1.5 to 2 minutes per patient. Only information pertinent to discharge were discussed in rounds.

Discussion was led by the Case Manager following the template. The scribe documented the discussion and served as a time keeper to keep the team on schedule. All

members of the team were allowed time for input into discussion on each patient. After a month a second Hospitalist was added to IR.

PDSA 2 November 2018. In late October of 2017, the IR team met to discuss the process. Discussions included what the team felt was working with rounds and what was not working with rounds. During this meeting the case managers and scribe discussed the difficulty they were having documenting in the template. The team felt the order of the template needed to be changed to improve the flow of discussion in rounds. The template was redesigned and put into use (See Appendix E). Obtaining buy in of staff was also discussed. Even members of the team were not fully behind the rounding process. The Chief Hospitalist had issues getting the other hospitalists to participate in rounds. The Case Managers felt like rounds increased their work load and did not feel the need to participate.

PDSA 3 December 2017-January 2018. During this cycle the hospitalists requested the location of rounds change from the conference room to the nurse's station. The reasoning behind the location change was to encourage physician and nurse involvement. January 2, 2018 was the first day of full hospitalist involvement. The hospitalists were assigned times by the Chief Hospitalist to complete discussion of their patients.

PDSA 4 February 2018. During this cycle the team discussed the problems with documentation of rounds using the revised template. Upon review the template was not being used consistently by the case managers. The case managers felt the template caused double documentation and added work. Attempts to improve the use of the template failed. Therefore, the team decided to stop the use of the template and to

improve the existing documentation from case managers. To increase communication of Interprofessional Rounds to nurses, case management documentation flowed over to the nurse's status board for easy viewing by other disciplines.

PDSA 5 March 2018. During PDSA cycle 5 the team decided to reduce the total time of rounds to 30 minutes. Some hospitalists were spending too much time discussing other topics instead of focusing on their patients on PCU. Some of the hospitalists also complained about receiving reminder pages prior to interprofessional rounds. Therefore, the decision was made to stop sending reminder pages. The Chief Hospitalist also re-enforced at staff meetings the need to discuss patients on PCU only.

PDSA 6 April 2018-May 2018. During the final PDSA cycle, the group discussed problems with physician involvement, including purposeful delays in rounding due to assigned times. During the past month the group also noticed a decline in nursing involvement in rounds. The group decided to remove the assigned times for the hospitalists to report on their patients during rounds. Hospitalists were told interprofessional rounds would be held starting at 1100 and ending at 1130. This allowed the hospitalists to participate with rounds when they were available in the timeframe of 1100 and 1130. The Director of PCU provided education and expectations to the charge nurses on PCU. The Director also made attending rounds a requirement of the charge nurse.

Data Collection/Analysis

A retrospective chart review was used for this project. A total of 1643 charts were included in the sample. Only patients with inpatient status being cared for by

hospitalists on PCU were included. Data was collected from June 2017 to June 2018. No patient identifiers were used in this project. Data collected included demographic information including age, time of discharge order entry, and time elapsed between discharge order entry and actual discharge. The data was collected into an excel spreadsheet. Run charts were used to compare pre and post intervention data.

Ethical Considerations

IRB approval was obtained through the project site hospital and the author's academic institution. No competing interests were present in this quality improvement project.

Results

Demographic Data. The census for patients with an inpatient status on the telemetry unit varied slightly from October 2017 to June 2018 (see Figure 2). The lowest census was during the month of October in 2017 at 293 patients. The highest census was 353 patients in March of 2018. The average age of the patients included in the study ranged from 64 to 71 years of age (see Figure 3).

Total Number of Discharge Orders entered from 0700 to 1300 (Figure 4).

The total number of discharge orders entered into Meditech from 0700 to 1300 were tallied monthly from June 1, 2017 to June 30, 2018. Pre-intervention data from June 1, 2017 to September 1, 2017 was used to set a 10 percent goal for improvement. The goal set was 103.4 discharge orders entered between 0700 and 1300. Interprofessional rounds started on October 2, 2017. In October 2017 only eighty discharge orders were entered between 0700 and 1300. The number gradually increased over the next several months.

The ten percent improvement goal was met in March, April, and May of 2018. However, in June 2018 the number of orders entered fell off sharply to seventy-nine.

Average (minutes) Elapsed Time from Discharge Order to Actual Discharge (Figure 5). The amount of time elapsed between discharge order entry and actual discharge was calculated then averaged monthly from June 1, 2017 to June 30, 2018. The 10 percent goal for improvement was set by averaging the numbers from June 1, 2017 to September 30, 2017. The ten percent goal was 136.8 minutes. In October 2017, the average elapsed time was 155. In November 2017 the average time reduced to 139 minutes. In December 2017 and January 2018, the average time leveled to 156 minutes. The average time decreased in February and March of 2018 to 149 and 146 minutes respectively. In April 2018 the average elapsed time increased to 158. The average elapsed time also increased to 164 minutes in May of 2018. In June 2018, the elapsed time fell to 132 meeting the ten percent goal.

Discussion

Prior to the implementation of interprofessional rounds there was little communication between the disciplines. The lack of communication between disciplines caused delays in the discharge process at the hospital. The delays in discharges caused a delay in ER patients getting moved to floor. In turn patients were put in danger of receiving care in inappropriate areas, delayed tests and procedures, and poor outcomes. The issues with throughput process also caused poor patient and staff satisfaction and increased workload and stress on staff. In addition, the case managers were having issues with people interrupting their work flow seeking information about patients. Any documentation on discharge planning was buried in the EHR difficult to access.

The purpose of this quality improvement project was to implement interprofessional rounds on the telemetry unit, increase the number of discharge orders entered by the physician between the hours of 0700 and 1300, and to decrease the length of time between discharge order entry and actual discharge. After implementing rounds communication between the disciplines improved. Unfortunately, consistent involvement of nursing and physicians were not fully realized. The lack of consistent involvement in IR could have negatively affected the length of time between discharge order entry and actual discharge. Future involvement of nursing and hospitalists in Interprofessional Rounds may benefit throughput processes if attendance is made mandatory.

Most of the hospitalists fully participated in interprofessional rounds. However, two hospitalists refused to participate in the rounding process. The patients taken care of by these two hospitalists were still included in the number for this project. If all the hospitalist participated in rounds the amount of early discharges could have been higher. Future mandatory attendance by hospitalists may benefit interprofessional communication, collaboration, and throughput processes.

Overall the results of this quality improvement project improved communication at the hospital and increased early discharge order entry. The length of time between discharge order entry and actual discharge showed some degree of improvement. The results of this quality improvement project showed a possible link between the use of interprofessional rounds in increasing communication and improvement in early discharge order entry.

Limitations

During the implementation of this quality improvement project several limitations were noted that should be discussed. In October of 2017, the Chief Nursing Officer and the Executive Director of Medical Services left the hospital. Other leadership changes occurred on the telemetry unit. The Director of the unit changed two times. Finally, in February of 2018 the Clinical Coordinator of the telemetry unit transferred to different unit. The changes in leadership may have caused a reduction in involvement of the nurses on the unit. Involvement of the charge nurse in IR was not consistent because of high census and need to be included in staffing. A more stable leadership may have increased the accountability and involvement of nursing staff thus improving overall results of this project.

The process to start interprofessional rounds on the telemetry unit was challenging. Forms of interprofessional rounds had been tried multiple times with somewhat poor results. Because of this history and an overall reluctance for any change many members of the team did not have positive thoughts about implementing IR. The failure to obtain full staff buy in may have reduced the effectiveness of IR.

When interprofessional rounds started a template was designed and used for documentation and to increase communication with floor staff. During PDSA cycle 4 the use of the template was terminated due to lack of use by the case managers. Case Management documentation was streamlined to incorporate important parts of the template. The documentation then populated to the nurse's status board for easy viewing. Unfortunately, a delay occurred in starting the new case management documentation. The documentation update never happened during this project. This delay could have

caused a decrease in the amount of communication available to floor staff causing delays in the discharge process.

Finally, the hospital where the project was implemented went out of contract with a major insurance company in the area. From January 2018 to June 30, 2018 many people in the community were not covered for any medical care at this hospital. People with Medicare as a primary insurance were not affected by this problem. Therefore, the census remained stable throughout the project time frame.

Implications

Practice

The practice of interprofessional rounds is becoming a standard in patient care in the hospital setting. Interprofessional Rounds benefits the health care team and the patient by providing a place to share important information, concerns, and plans for discharge (Adams & Feudale, 2018). Implementing interprofessional rounds can be challenging and must be customized for each setting. The results of this project show the benefits of interprofessional rounds in increasing communication and increasing the amount of earlier discharge times.

Education

Interprofessional communication should be a requirement in nursing education. Nurses need to learn effective communication skills to be an advocate for their patients. Effective interprofessional communication/collaboration is key improving patient outcomes, overall patient satisfaction, and throughput efficiency (Behan & Like, 2017).

Research

Although the results of this project showed an increase in earlier discharge order entry, further research is needed to fully evaluate the effects of IR on other areas of throughput processes. Further research is also required to determine the causes of delay in the length of time between discharge order entry and actual discharge.

Sustainability

Interprofessional rounds have continued the telemetry unit. The interprofessional team will continue to meet as needed to improve the rounding process. The process has started to expand interprofessional rounds to the medical floor of the site hospital.

Conclusion

After the implementation of interprofessional rounds, an increase in the amount of discharges entered between the hours of 0700 and 1300 occurred. However, the average length of time from discharge order to actual discharge only improved slightly. Case management reported a reduction in traffic and interruptions in their office during the day. Overall staff have reported increased communications because of interprofessional rounds.

Interprofessional rounds held on hospital units have shown many benefits including increased communication, patient satisfaction and length of stay (Cornell et.al., 2014). The findings of this quality improvement project support implementing interprofessional rounds as a standard in patient care to improve throughput efficiency, communication, and patient safety.

Table 1. Summary of Research Articles

Citation	Participants/Setting	Purpose, Background	Methods/Design and Limitation	Findings/Summary Strengths/Weaknesses	Applicability to Own Research
(Cornell & Townsend -Gervis, 2014)	<ul style="list-style-type: none"> • Observations completed on 3 med/surg units, each unit contained 48 beds • 339 bed Suburban acute care hospital 	<ul style="list-style-type: none"> • To evaluate the effectiveness of the use of Daily Interdisciplinary Rounds using the SBAR communication tool on improving communication clarity between disciplines • Data collected included length of stay, Press Ganey, and HCAHPS data 	<ul style="list-style-type: none"> • Over 9 months 4 types of patient review conditions were observed • Baseline- interdisciplinary rounds only held in conference room • Mobile- IDR- rounds help on the unit • Paper SBAR report tool, no rounds • Electronic SBAR and mobile rounds • Interdisciplinary rounds led by charge nurse participants floor nurse, dieticians, pharmacists, and case managers • Observers recorded the duration of patient reviews and the tools and documentation used for 960 reviews • Data collected included length of review, length of stay, and patient satisfaction scores • T-tests were performed compare results and to test for significance 	<ul style="list-style-type: none"> • Findings: Mobile Interdisciplinary rounds took less time when compared to baseline interdisciplinary rounds (baseline 102.2 min vs mobile 69.2 min $p < .001$) • Finding: the addition of the SBAR communication tools, paper and/or electronic slowed the time of IDR by 3-10 minutes • Finding: Patient satisfaction and HCAHPS scores trended upward in scores however were not shown to be significant • Finding: Length of stay fluctuated across the units but did not improve • Weakness: the amount of patient reviewed varied greatly between the types of review • Weakness: lack of training of SBAR and/or equivalent for all staff 	<ul style="list-style-type: none"> • The interdisciplinary rounds format used in this study is similar to proposed Interprofessional Rounds • Throughput was not measured however length of stay was considered

(Goldman et al., 2016)	<ul style="list-style-type: none"> • General Medical Unit at an academic teaching hospital in Canada • Average about 350 patients a month 	<ul style="list-style-type: none"> • Project based on the Sociological theories of medical dominance and negotiated order • Research was completed to gain a better understanding of interprofessional interactions in the discharge process 	<ul style="list-style-type: none"> • Methods: ethnographic approach, interviews were conducted, observations were made, and documents examined over an 18-month period • Daily structured interprofessional rounds held M-F concentrating on discharge planning. Meeting held in meeting room, all patients reviewed within 15 minutes • Limitations: information gathered on one unit only and small sample size 	<ul style="list-style-type: none"> • Medical dominance shaped discharge on the unit leading to staff not feeling comfortable or able to communicate dissention or issues with the physician's discharge plan • Rounds did not have adequate input from all disciplines involved due to the strict timeframe and structure of the rounds. Lack of nursing input can lead to discharge issues 	<ul style="list-style-type: none"> • The research in this article will help guide the interprofessional rounds process. The findings helped pinpoint issues that may arise in the interprofessional rounds at Augusta.
(Gurses & Xiao, 2006)	<ul style="list-style-type: none"> • Systematic review of literature 	<ul style="list-style-type: none"> • To help guide the design of tools supporting multidisciplinary rounds (MDR) 	<ul style="list-style-type: none"> • Medline, CINAHL, American Informatics Association were searched for literature published between 1990 and 2005 • Inclusion criteria: English language and full-length papers • The Donabedian structure-process-outcome model was used for literature anal 	<ul style="list-style-type: none"> • Patient-centric information tools: The use of up to date patient information is essential in effective MDR. Tools used include EHR, flowsheets, progress notes, medication lists • Process-orientated tools are necessary to have consistent communication and information sharing. Tools include rounding templates, checklists • Computer platforms for MDR varies from PDA's, I pads, computer 	<ul style="list-style-type: none"> • This systematic review is helpful to gain insight into possible measurables. The article also summarized suggestions on tools and various communication needs for successful MDR

				<p>on wheels. This tool allows for quick and easy access to patient information</p> <ul style="list-style-type: none"> • Information needed to be discussed in MDR include: lab results, medications used, radiology results, vital signs, patient's socioeconomic status, housing, family related problems • A note taker was found to be helpful to record information during MDR • Barriers to communication in MDR include interruptions and noise • Outcomes of MDR include clinical outcomes: mortality rate, length of stay, prevention of complications and readmissions Efficiency: discharge rates, patient volume, and costs Patient, family satisfaction, and care provider satisfaction have also been used to measure outcomes of MDR 	
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<p>(Hendricks, LaMothe, Kara, & Miller, 2017)</p>	<ul style="list-style-type: none"> • 4 accountable care team units in an academic health center in the Midwest US • Each of the four units specialized in specific areas including: a 31-bed diabetic/renal, a 24-bed general med, a 24-bed medical progressive care, and a 51-bed cardiovascular unit • 2 units held interprofessional rounds at the bedside, the other 2 units held interprofessional rounds not at the bedside 	<ul style="list-style-type: none"> • Purpose of the study was to describe barriers and facilitators for interprofessional rounds in a large urban hospital 	<ul style="list-style-type: none"> • Design was a qualitative descriptive research study. Data was collected over an 18-month time frame. • Sources for data include: participant observation of rounding activities, focused meetings on interprofessional rounds, exit interviews. • Limitations: professional point of view, patient and family opinions were not sought out, data was only collected in 1 hospital 	<ul style="list-style-type: none"> • Team Members’ Facilitators: low team member turnover, structured rounding, facility value interprofessional rounding, confidence in communication skills Barriers: High turnover, inconsistent rounding approach, feelings of skepticism about rounding, unsure of communication skills • Healthcare Environment Facilitators: Rounds in concurrence with organizational objectives, geographic cohorting of teams, consistent daily schedules, staff readiness for change Barriers: not aligning with objectives of organization, geographic distributing of teams, conflicting schedules, too much change 	<ul style="list-style-type: none"> • This research was very recent and helped to point out what helps make interprofessional rounds successful.
<p>(Mosher, Lose, Leslie, Pennathur</p>	<ul style="list-style-type: none"> • Research was held at two inpatient 	<ul style="list-style-type: none"> • Describe IDR processes and improvement of 	<ul style="list-style-type: none"> • Structured observations and measurement of 	<ul style="list-style-type: none"> • The use of a structured template for documenting IDR 	<ul style="list-style-type: none"> • This research details the importance of

<p>, & Kaboli, 2015)</p>	<p>medical units at Iowa City VA Hospital, max census 42 pts</p> <ul style="list-style-type: none"> • Interdisciplinary care team consisted of: resident physicians, charge nurse, nurse manager, social workers, palliative care, utilization review, pharmacy, home health, diabetes education, dietary, respiratory therapy, occupational therapy, and physical therapy 	<p>IDR documentation rates</p> <ul style="list-style-type: none"> • IDR was held in a designated room between 1115 and 1215, senior resident led discussion, charge nurses completed interdisciplinary documentation 	<p>interdisciplinary rounds (IDR)</p> <ul style="list-style-type: none"> • QI project using PDSA cycles to change workspace, education, and IDR documentation and format • Data collected included: IDR team satisfaction, participation, discussion time, excess bed days of care, length of stay, and 30-day readmissions • Limitation of study: does not study team function, bedside nurses not included in rounding 	<p>increased completion rates from 27% to 69%</p> <ul style="list-style-type: none"> • During the PDSA cycles team satisfaction increased and length of report increased slightly from 64 sec/patient to 72 sec/patient 	<p>having a structured template to record IDR.</p>
<p>(O’Leary et al., 2011)</p>	<ul style="list-style-type: none"> • Study held at Northwestern Memorial Hospital, 920 bed tertiary 	<ul style="list-style-type: none"> • The researchers state there is a need to learn more about teamwork during 	<ul style="list-style-type: none"> • Cross sectional observational study • The Observational Teamwork Assessment for Surgery tool was adapted for use for this study. 5 	<ul style="list-style-type: none"> • Interrater reliability was excellent at the unit level ($\rho=0,75$), good across the domains ($\rho= 0.53-0.68$) and sub teams ($0.53-0.76$), poor in the 	<ul style="list-style-type: none"> • This research stresses the need for effective teamwork in successful

	<p>care teaching hospital</p> <ul style="list-style-type: none"> • Research was carried out on 6 medical units with telemetry, 5 of the units held 30 patients, the remaining unit held 23 pts 	<p>Interdisciplinary Rounds (IDR)</p> <ul style="list-style-type: none"> • The objective of this study was to evaluate and characterize teamwork during IDR • Structured Interdisciplinary Rounds were held weekday mornings in a unit conference room lasting 30-40 minutes • SIDR was co led by unit nurse manager and medical director • Participants were all nurses, physicians, pharmacist, social worker, case manager assigned to the unit 	<p>domains were rated with a scale of 0 to 6. (0=problematic behavior, 6 exemplary behavior)</p> <ul style="list-style-type: none"> • Only 44 total observations were completed for this study • Limitations of study: research only held in 1 hospital, SIDR did not include families and/or caregivers 	<p>physician sub team (rho = 0.35)</p> <ul style="list-style-type: none"> • SIDR lasted a mean of 41.4 +/- 11.1 minutes with a mean of 1.5 +/- 0.4 minutes per patient • Teamwork scores were high however there were some variance across units, domains, and sub teams • A consistent format for SIDR was used including timing, duration, frequency and location 	<p>IDR. The design of the team is very similar to the proposed team at Augusta.</p>
<p>(O’Leary, Boudreau, Creden, Slade, & Williams, 2012)</p>	<ul style="list-style-type: none"> • Study conducted at an 897-bed tertiary care hospital in Chicago Illinois 	<ul style="list-style-type: none"> • The purpose of this study was to assess the effect of SIDR using a structured communication tool on the rate of adverse events 	<ul style="list-style-type: none"> • Controlled trial of the intervention • Retrospective medical record review of 370 randomly selected patients admitted to the control and intervention unit 	<ul style="list-style-type: none"> • Intervention unit: rate of AE was 3.9 per 100 patient days; preventable AE rate 0.9 per 100 patient days • Concurrent control unit: 7.2 per 100 patient days; 	<ul style="list-style-type: none"> • This research is important because it shows a positive result to Interprofession al Rounds.

	<ul style="list-style-type: none"> Two teaching units similar in size were used for the study, one served as the control unit, the other unit used the intervention 	<ul style="list-style-type: none"> Structured Interdisciplinary Rounds were held weekday mornings in a unit conference room lasting 30-40 minutes SIDR was co led by unit nurse manager and medical director, a structured communication tool was used for SIDR Participants were all nurses, physicians, pharmacist, social worker, case manager assigned to the unit 	<ul style="list-style-type: none"> Medical records were screened for adverse events, two hospitalists then confirmed an adverse event and assessed for preventability and severity of each event Limitations: historic and concurrent controls used to minimize confounding, lack of masking during data extraction from EHR, low number of adverse events in the study 	<p>preventable AE rate 2.8 per 100 patient days</p> <ul style="list-style-type: none"> Historic control unit: 7.7 per 100 patient days; Preventable AE rate 2.1 per 100 patient days 	<p>The intervention used is like the one proposed for Augusta.</p>
<p>(Prystajec ky, Lee, Abonyi, Perry, & Ward, 2017)</p>	<ul style="list-style-type: none"> Study held in an academic medical center Three clinical teaching teams were used 	<ul style="list-style-type: none"> Purpose of the study was to determine the goals of healthcare providers attending rounds then discover the challenges encountered while pursuing the goals 	<ul style="list-style-type: none"> Exploratory case-study design The case consisted of healthcare providers regularly participating in rounds Focus groups were conducted with providers with diverse professional backgrounds Focus groups consisted of 26 CTU staff members 	<ul style="list-style-type: none"> Researchers found a lack of consensus goals among the interprofessional group Competing goals among disciplines were found primarily the relevance of discharge planning vs care delivery Shared goals included: IPR allowed for increased face to face 	<ul style="list-style-type: none"> I found this article helpful because of the emphasis on having clear shared goals among the rounding group.

		<ul style="list-style-type: none"> • Interprofessional rounds were held M-F from 1100-1200, rounds were held at the nurse's station • Attendees to rounds include: clinical coordinators, community care workers, CTU coordinator, social workers, unit manager, OT, PT, attending physicians, dieticians, pharmacists, and speech language pathologists 	<ul style="list-style-type: none"> • Limitations: small sample size, poor generalizability, purposeful sampling was used 	<p>communication with other professions, care coordination, promotion of shared decision making, strengthening of interprofessional relationships</p>	
(Sharma & Klocke, 2014)	<ul style="list-style-type: none"> • Research took place at a 152- bed tertiary care community hospital averaging 8000 admissions per year 	<ul style="list-style-type: none"> • Historically physician- nurse relationships have been one sided with physicians monopolizing knowledge based practice of medical care thus impeding interprofessional collaboration • This study examined the 	<ul style="list-style-type: none"> • Pilot study • 90 nurses were asked to complete a survey prior to rounds implementation and 4 months after rounds implementation • Data was analyzed using a chi square test • Limitations: only 61 nurses completed both surveys 	<ul style="list-style-type: none"> • Nurses found rounds to be interactive, educational, and encouraged collaboration • Improvement was noted in: Nursing staff satisfaction related to improved communication increased (7%-54%, p<0.001), positive impact on nursing workflow (5%-56%, p<0.001), nurses value as team member 	<ul style="list-style-type: none"> • Although this research did not include other disciplines, it was important in highlighting the effects of improved communication and collaboration among professions.

		<p>attitudes of nursing staff prior to interprofessional rounding and after the implementation of rounds</p> <ul style="list-style-type: none"> • Rounds consisted of the nurse, physician, patient and family. During rounds patient condition was discussed and a care plan for the day was mutually agreed upon by all parties 		<p>(26%-56%, p=0.018), and job satisfaction (43%-59%, p=0.018)</p>	
<p>(Townsend-Gervis, Cornell, & Vardaman, 2014)</p>	<ul style="list-style-type: none"> • Research completed at a 339- bed acute care suburban hospital in the mid-south • 3 medical surgical units were observed, each unit had 48 beds • Nurse patient ratio 1/6 	<ul style="list-style-type: none"> • Achieving situation awareness (knowledge of patient's condition and care plan) is a challenge in the hospital setting. Improving communication with IDR and SBAR communication may help patient 	<ul style="list-style-type: none"> • Patient satisfaction scores, Foley catheter removal compliance, and patient readmission rates were assessed over a 3-year period • Chi square tests were used to test for significance 	<ul style="list-style-type: none"> • Foley catheter removal compliance improved from 78% to 94% (p<0.001) • Readmissions decreased from 14.5% to 2.1% (p<0.001) • Patient satisfaction improved but was not significant 	<ul style="list-style-type: none"> • The data in this study showed improvement in two important areas Foley catheter removal compliance and readmission rates. This data will be help gain leadership support for rounds.

		<p>satisfaction and patient outcomes</p> <ul style="list-style-type: none"> • Structured communication and IDR will improve situation awareness among nurses leading to higher patient satisfaction scores in nurse communication • Improved situation awareness will lead to more Foley catheters being removed timely • Improved situation awareness will lead to lower re-admission rates. • IDR were led by charge nurse and included the floor nurse, dietician, pharmacy, social work, and case manager • IDR were held in a conference room, nurses presented their 			
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		<p>patients and case management monitored adherence to care plan, SBAR was used during the rounds, risk factors for readmission also discussed</p>			
<p>(Wild, Nawaz, Chan, & Katz, 2004)</p>	<ul style="list-style-type: none"> • Research held at Griffin Hospital in Derby, CT, a 160-bed community hospital • The telemetry floor was used for this research 	<ul style="list-style-type: none"> • The researchers have found a lack of research on the effects of Interdisciplinary Rounds on telemetry units of hospitals. The research found have had equivocal results. • Interdisciplinary rounds are resource intensive and may not be as effective as more simple interventions. • Hypothesis: IR's decrease the length of stay on a telemetry ward. • Daily work rounds were held consisting of 	<ul style="list-style-type: none"> • Randomized control trial • 84 Patients randomly assigned to the intervention group and the control group • Data was analyzed using linear regression using SAS Version 8.0 • Bivariate analysis was completed using chi-square and t-test 	<ul style="list-style-type: none"> • IR did improve staff satisfaction • IR did not have a statistically significant effect on length of stay. • Strengths: randomized design, study performed in community hospital making interventions more generalizable to other practice settings 	<ul style="list-style-type: none"> • Although this study did not have positive results with the use of IR, I think the research is valuable to show areas to improve research and data quality.

		<p>resident physicians, nurses, case manager, pharmacist, dietician, and physical therapist. Patients were discussed and possible issues with discharge were identified and addressed,</p> <ul style="list-style-type: none">• Time was limited to 2-5 minutes per patient			
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Figure 1. Admission/Discharge on PCU in 2016

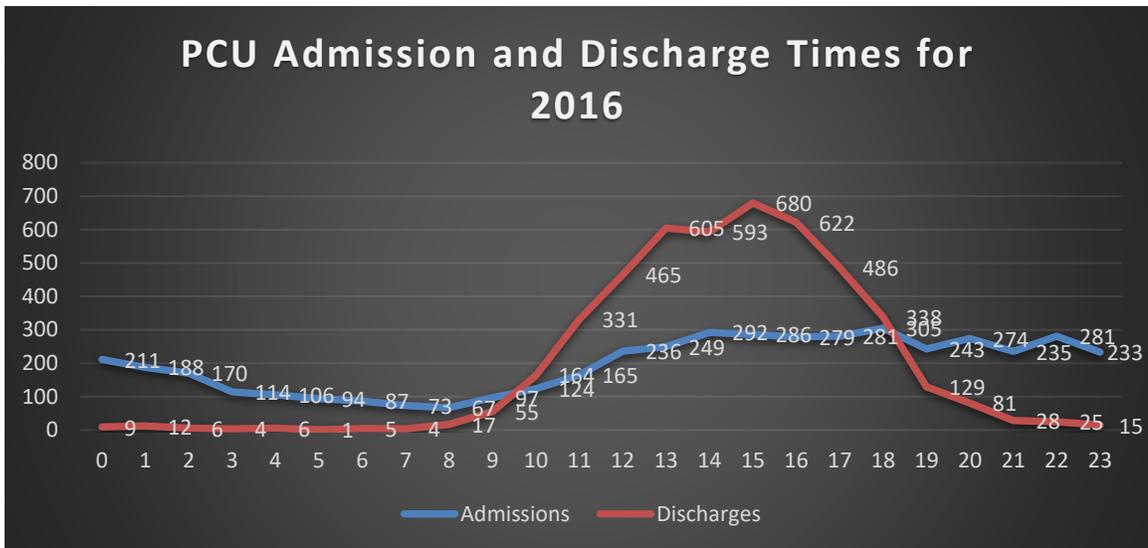


Figure 2. Demographic Data: Census on PCU

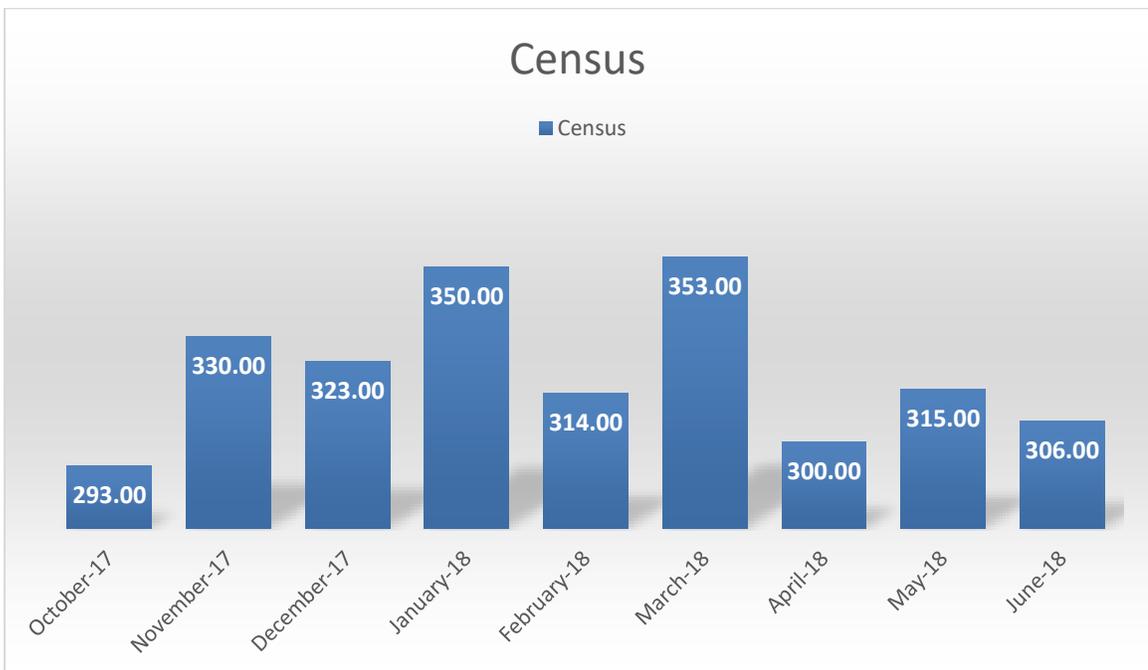


Figure 3. Demographic Data: Average Age of Patients on PCU

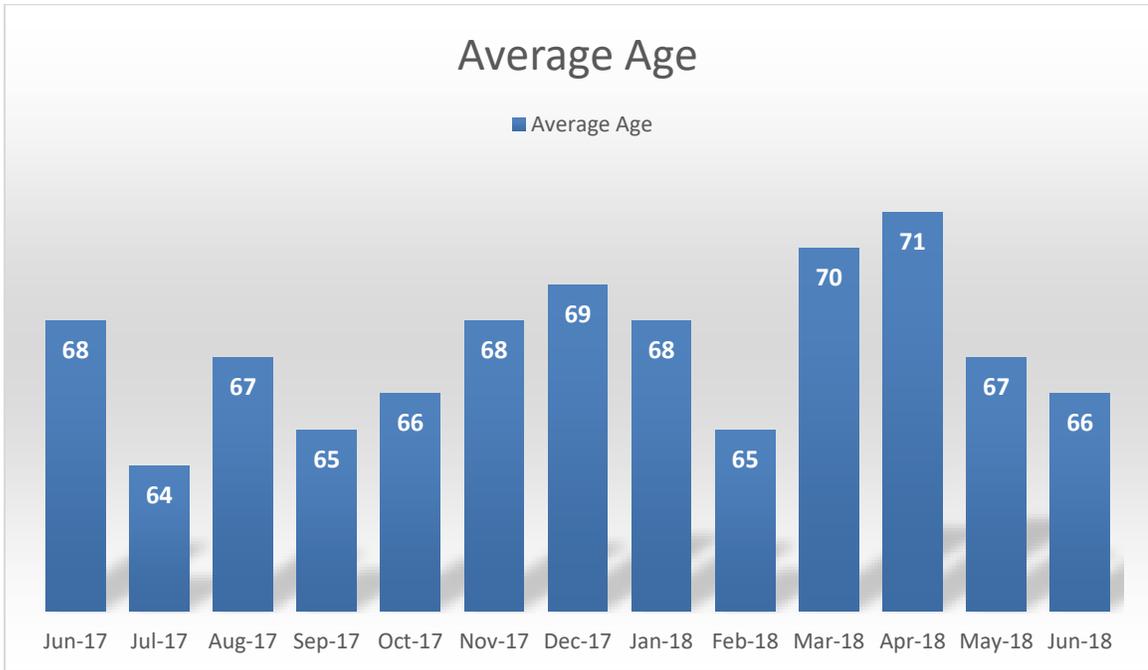


Figure 4. Total Number of Discharge Orders Entered from 0700 to 1300

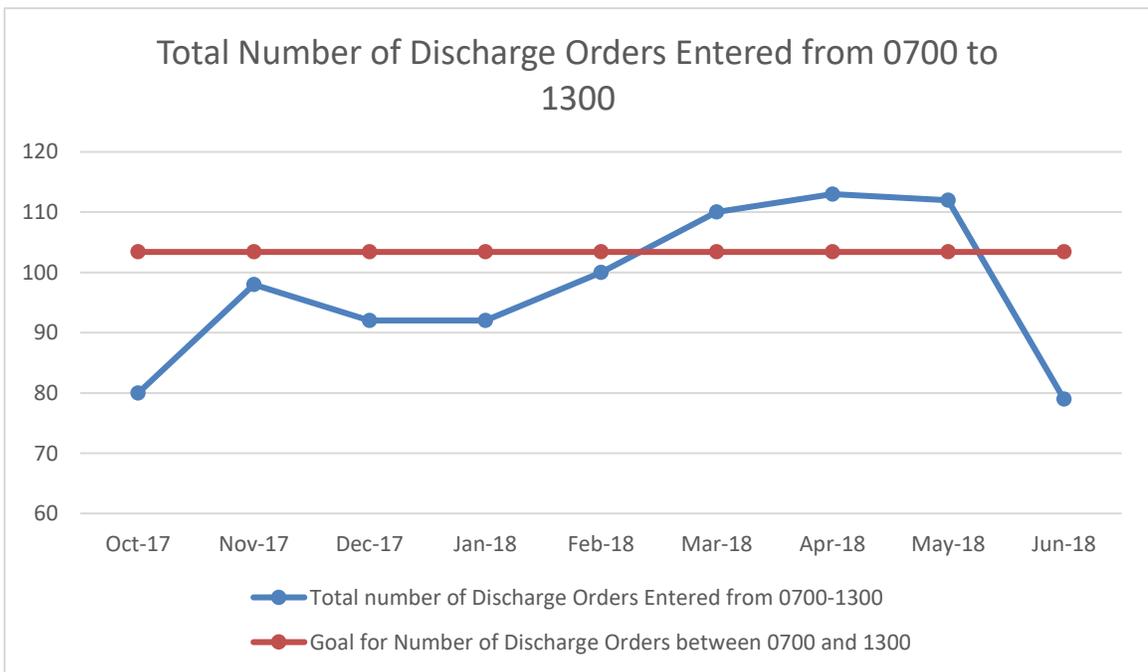
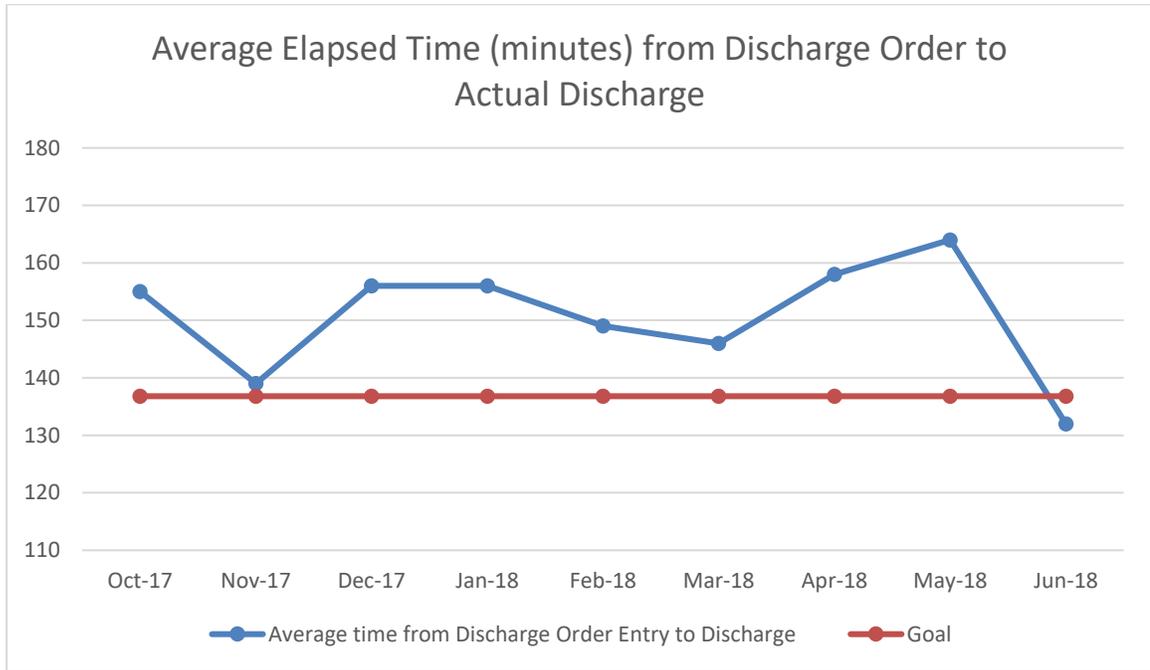
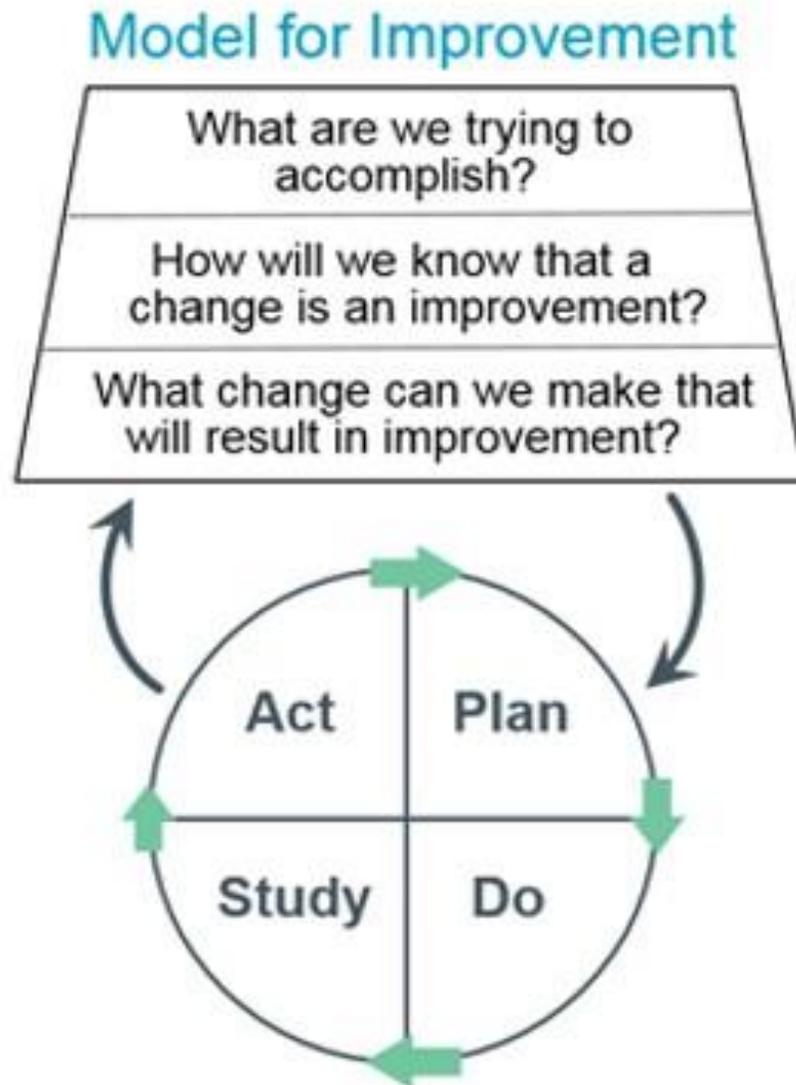


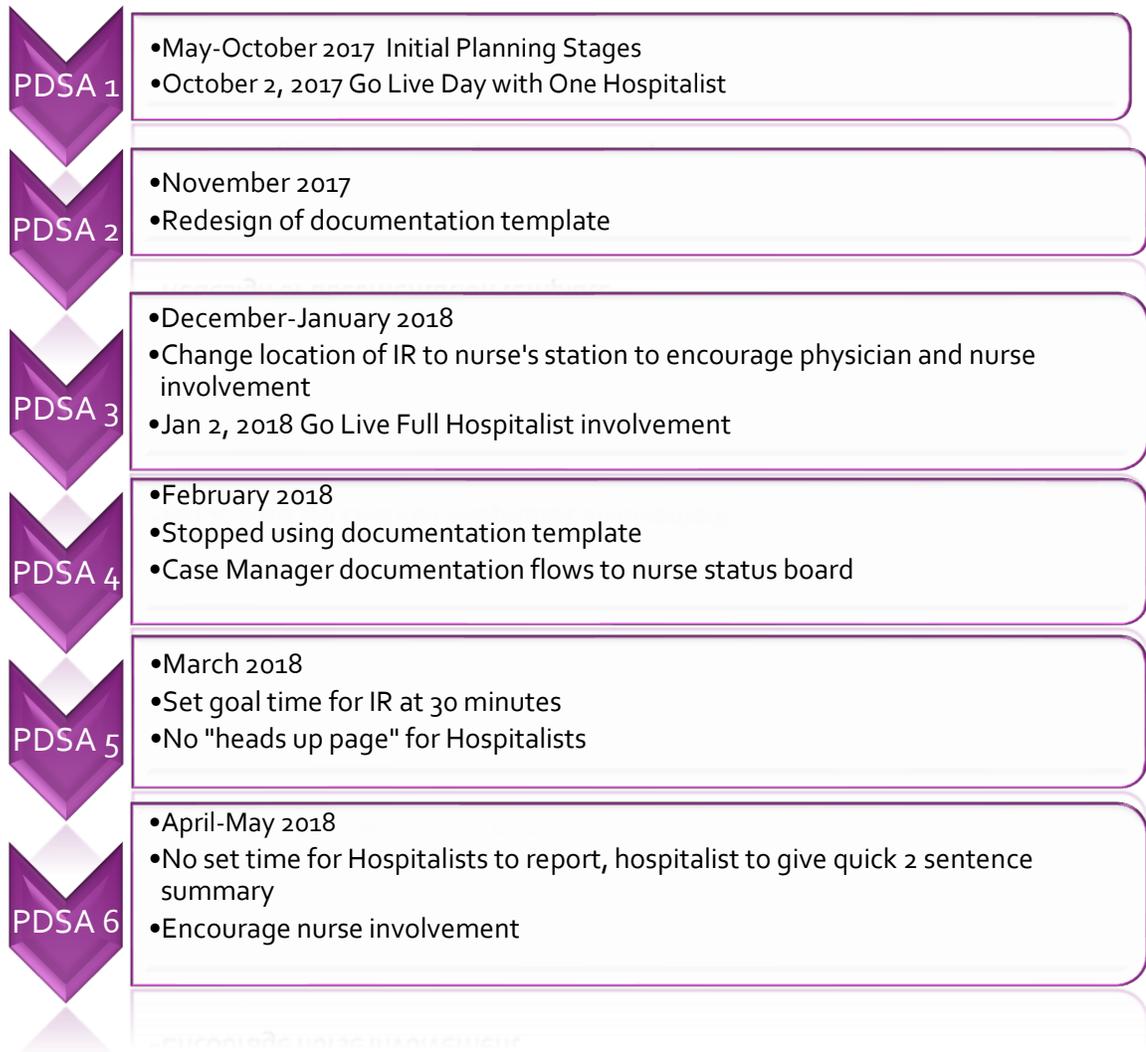
Figure 5. Average Elapsed Time (minutes) from Discharge Order to Actual Discharge



Appendix A. IHI Model for Improvement Conceptual Model



Appendix B. PDSA Timeline



Appendix C. Guideline for Interprofessional Rounds

Interprofessional Rounds Guidelines

Rounds will consist of Attending physician, charge RN, Unit manager, Case manager, scribe, Pharmacy (Monday, Wednesday, & Friday), and Palliative care. If palliative care shows up, the team will try to cover their patients first.

Attending physician

A quick 15 sec introductions.

Case Manager

Leads rounds using inter-professional template.

- ✓ Admission date
- ✓ Readmission yes or no
- ✓ Insurance status
- ✓ Living situation
- ✓ Home environment
- ✓ Discharge plans to include level of care, nursing facility

Attending physician, Case manager, Charge Nurse, Pharmacy (if present)

1. Discuss each patient's problem by problem
2. Review of status and plan of care
 - ✓ Foley
 - ✓ Tele
 - ✓ Central line
 - ✓ Advance diet
 - ✓ Change IV meds to PO
 - ✓ Increase activity
 - ✓ VTE prophylaxis
 - ✓ Code status
3. Discharge plan
 - ✓ Discuss important requests and concerns.
 - ✓ Discharge date

Appendix D. Documentation Template Version 1

Interprofessional Rounds
*****USE RECALL VALUES*****

Admission Information	
Admission Date	<input type="text"/>
Readmission	<input type="radio"/> Yes <input type="radio"/> No
Living Situation Prior to Admission	
Living Situation	<input type="checkbox"/> Alone <input type="checkbox"/> Family <input type="checkbox"/> Significant Other <input type="checkbox"/> Spouse
Home Environment	<input type="radio"/> Acute Rehab <input type="radio"/> Home <input type="radio"/> Nursing Home <input type="radio"/> Apartment <input type="radio"/> Homeless <input type="radio"/> SNF <input type="radio"/> Assisted Living <input type="radio"/> LTAC <input type="radio"/> Other <input type="text"/>
Facility Name	<input type="text"/>
Discharge Plan	
Expected Discharge Date:	<input type="text"/>
Level of Care	<input type="checkbox"/> Acute Care Facility <input type="checkbox"/> Home Alone <input type="checkbox"/> Intermediate Care Facility <input type="checkbox"/> AMA <input type="checkbox"/> Home Health <input type="checkbox"/> Long Term Acute Care <input type="checkbox"/> Assisted Living <input type="checkbox"/> Home w/Family-Caregiver <input type="checkbox"/> Shelter <input type="checkbox"/> CBC/CD-PAS(Medicaid Aide) <input type="checkbox"/> Hospice <input type="checkbox"/> Skilled Nursing Facility <input type="checkbox"/> Correctional Facility <input type="checkbox"/> Inpatient Rehab
Nursing Facility	<input type="radio"/> AH Skilled <input type="radio"/> Bridgewater <input type="radio"/> Kendall <input type="radio"/> Summit Square <input type="radio"/> Augusta Nursing & Rehab <input type="radio"/> Envoy <input type="radio"/> Kings Daughters <input type="radio"/> Trinity Mission-Ch'ville <input type="radio"/> Avante-Harrisonburg <input type="radio"/> Golden Living- Allegany <input type="radio"/> Lifecare <input type="radio"/> Trinity Mission-Fm'ville <input type="radio"/> Avante-Waynesboro <input type="radio"/> Golden Living- Buena Vista <input type="radio"/> Shenandoah <input type="radio"/> VMRC <input type="radio"/> Brian Center <input type="radio"/> Harrisonburg Health&Rehab <input type="radio"/> Other <input type="text"/>

Acute Care Facility	<input type="radio"/> AH Rehab <input type="radio"/> Martha Jefferson <input type="radio"/> UVA Healthsouth <input type="radio"/> VA-Richmond <input type="radio"/> Carilion <input type="radio"/> RMH <input type="radio"/> VCU <input type="radio"/> VA-Salem <input type="radio"/> Catawba <input type="radio"/> Tranistional Care <input type="radio"/> VA-Martinsburg <input type="radio"/> Western State <input type="radio"/> Kindred <input type="radio"/> UVA <input type="radio"/> Other <input type="text"/>
Insurance	<input type="checkbox"/> Commercial <input type="checkbox"/> Humana <input type="checkbox"/> Medicaid <input type="checkbox"/> Medicare <input type="checkbox"/> Self Pay
Discharge Needs	
Issues to be Resolved	<input type="checkbox"/> Central Line <input type="checkbox"/> Core Measures <input type="checkbox"/> Foley Catheter <input type="checkbox"/> Med Rec <input type="checkbox"/> Tests needed prior to discharge <input type="text"/> <input type="checkbox"/> Other <input type="text"/>
DME Ordered at Discharge	<input type="checkbox"/> None <input type="checkbox"/> Hospital Bed <input type="checkbox"/> Prosthetic <input type="checkbox"/> Stair Lift <input type="checkbox"/> Bedside Commode <input type="checkbox"/> Hoyer Lift <input type="checkbox"/> Ramp <input type="checkbox"/> Walker-Rolling <input type="checkbox"/> Bipap/Cpap <input type="checkbox"/> Lift Chair <input type="checkbox"/> Rollator <input type="checkbox"/> Walker-Standard <input type="checkbox"/> Cane <input type="checkbox"/> Nebs <input type="checkbox"/> Scooter <input type="checkbox"/> Wheelchair <input type="checkbox"/> CPM <input type="checkbox"/> Oxygen <input type="checkbox"/> Shower Seat/Chair <input type="checkbox"/> Wound Vac <input type="checkbox"/> Elevated Toilet Seat
Respiratory	
On Home O2?	<input type="radio"/> Yes <input type="radio"/> No
Need Qualified for Home O2?	<input type="radio"/> Yes
Home O2 Concentration	<input type="text"/>
Dietary	
Nutrition Needs	<input type="checkbox"/> Dietary Education <input type="checkbox"/> New Diabetic <input type="checkbox"/> New Insulin Start
Pharmacy	
Medications	<input type="checkbox"/> Anticoagulants <input type="checkbox"/> High Risk Meds <input type="checkbox"/> Home IV Antibiotics <input type="checkbox"/> Therapeutic Interchange

Wound	
Wound Vac Needed?	<input checked="" type="radio"/> Yes
Follow Up with Wound Clinic?	<input type="radio"/> Yes
Home Health Needs	
Home Health Providers	<input type="radio"/> Amedysis <input type="radio"/> Continuing <input type="radio"/> Interim <input type="radio"/> Medi HH <input type="radio"/> Augusta Health <input type="radio"/> Continuum <input type="radio"/> Intrepid <input type="radio"/> Sentara <input type="radio"/> Carilion <input type="radio"/> Gentiva <input type="radio"/> Maxim <input type="radio"/> Other <input style="width: 200px; height: 15px;" type="text"/>
Home Health Ordered Services	<input type="checkbox"/> Aide <input type="checkbox"/> Psychiatric Nurse <input type="checkbox"/> Social Worker <input type="checkbox"/> Occupational Therapy <input type="checkbox"/> Skilled Nursing <input type="checkbox"/> Speech Therapy <input type="checkbox"/> Physical Therapy
Hospice Needs	
Hospice Providers	<input type="radio"/> Legacy <input type="radio"/> Rockbridge <input type="radio"/> Southern Care <input type="radio"/> Piedmont <input type="radio"/> Shenandoah <input type="radio"/> Other <input style="width: 200px; height: 15px;" type="text"/>
Resource Clinician Needs	
Resource Clinician Consult	<input checked="" type="radio"/> Yes
Needs Prior to Discharge	
Forms to be Signed	<input style="width: 400px; height: 25px;" type="text"/>
Necessary Follow Up Appointments	<input style="width: 400px; height: 25px;" type="text"/>
Patient Knowledge Deficits	<input style="width: 600px; height: 150px;" type="text"/>

Other	<div data-bbox="493 488 1444 782" style="border: 1px solid blue; height: 181px; width: 453px;"></div>

Notification sent to the department

Documentation pulls over from already documented data

Appendix E. Documentation Template Version 2

Interprofessional Rounds

Physician Information	
Admission Date	<input type="text"/>
Needs Prior to Discharge	<input type="text"/>
Post Discharge Needs	<input type="text"/>
Consult Hospice	<input type="radio"/> Yes
Consult Palliative Care	<input type="radio"/> Yes
Consult Resource Clinician	<input type="radio"/> Yes
Discharge Needs	
D/C Needs to be Resolved	<input type="checkbox"/> Central Line in place <input type="checkbox"/> Foley Catheter in place <input type="checkbox"/> Home Med List Incomplete
On Home O2?	<input type="radio"/> Yes <input type="radio"/> No
Home O2 Concentration	<input type="text"/>
On Hospital O2?	<input type="radio"/> Yes <input type="radio"/> No
Hospital O2 Concentration	<input type="text"/>
Follow up w. Respiratory Therapy	<input type="checkbox"/> Home Oxygen Eval <input type="checkbox"/> Home Nebulizer Eval <input type="checkbox"/> Wean O2
Medication Needs	<input type="checkbox"/> New Antithrombotic <input type="checkbox"/> Home IV Antibiotics <input type="checkbox"/> Other
Follow up w Pharmacy	<input type="radio"/> Yes
Additional Medication Needs	<input type="text"/>

Follow Up with Wound Clinic?	<input type="radio"/> Yes
Readmission within 30 days	<input type="radio"/> Yes <input type="radio"/> No
Living Situation	
Living Situation	<input type="checkbox"/> Alone <input type="checkbox"/> Family <input type="checkbox"/> Significant Other <input checked="" type="checkbox"/> Spouse
Home Environment	<input type="radio"/> Acute Rehab <input type="radio"/> Home <input type="radio"/> Nursing Home <input type="radio"/> Apartment <input type="radio"/> Homeless <input type="radio"/> SNF <input type="radio"/> Assisted Living <input type="radio"/> LTAC <input type="radio"/> Other <input type="text"/>
Facility Name	<input type="text"/>
Progress Note	<input type="text"/>
Insurance	<input type="checkbox"/> Self Pay
Expected Discharge Date:	<input type="text"/>

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