IMPLEMENTING PROVIDER ORDERS FOR LIFE-SUSTAINING TREATMENTS
INTO BEMIDJI DIALYSIS

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ABSTRACT

Provider Orders for Life-Sustaining Treatments (POLST) is changing the way we approach the end of life. POLST is a tool used to have conversations about end-of-life planning that includes patients, patient’s families, and healthcare professionals. Patients who are chronically ill, and whom a healthcare professional feels has 12-18 months or less to live, should be considered for this conversation. Regardless of the high mortality rates among dialysis patients, little research has been done to examine patients with end-stage renal disease (ESRD) and their preferences for end-of-life care (Davison, 2010). The planning, development, and implementation of a POLST program for the Bemidji dialysis unit was completed. All staff and patients were educated about the POLST program, a screening tool and process flow chart were developed, and POLST facilitators were adequately trained. Implementing the POLST program for the Bemidji dialysis unit was successful with identifying patients who meet the specific criteria for a POLST conversation using the developed screening tool. Educating the dialysis staff about the benefits of the POLST program along with training the appropriate stakeholders for successful implementation of the POLST program was completed. Development of a POLST-process flow chart to fit the Bemidji dialysis unit was successfully completed. Implementing a POLST program is a lengthy process because many POLST conversations take over an hour to complete. Due to the time and space barriers, implementing the POLST conversations at the Bemidji dialysis unit is still in progress. Hopefully, once the barriers are addressed and resolved, successful implementation of the POLST program for Bemidji dialysis will follow.
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DEDICATION

To my amazing family: Cody and Elizabeth
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CHAPTER 1. INTRODUCTION

Provider Orders for Life-Sustaining Treatments (POLST) is a tool that was developed in the early 1990’s as an alternative form of the traditional advanced directive. POLST is a national approach to end-of-life planning that is based on a conversation among patients, loved ones, and medical providers (POLST, 2012). The conversation consists of education and discussion about end-of-life treatment options. The POLST paradigm was designed to ensure that seriously ill patients could decide what treatments they wanted and have their end-of-life wishes honored. The POLST document is both a holistic method of planning for end-of-life care and a specific set of medical orders, which ensure that patient wishes are honored. The POLST Paradigm is not for everyone; the program is designed for patients with serious, progressive, or chronic illnesses (POLST, 2012). Many states have developed POLST programs and are in the implementation process. Minnesota developed its own POLST form that is actively being used throughout the state. A POLST organization has been formed in the Bemidji area, and the group has implemented POLST at various healthcare settings in the region. There is a need to implement the POLST program at different areas in Bemidji, and one of the identified areas is dialysis. Many dialysis patients have a variety of comorbidities, and many people fit the criteria for a POLST program.

Statement of the Problem

The Patient Self-Determination Act (PSDA) was enacted in 1990 to increase the power of individual decisions regarding life-sustaining treatments and to improve the use of advance directives (Ascension Health, 2013). The PSDA also states that, when being admitted to a hospital or nursing home, patients have to be informed about their rights, including the right to accept or refuse treatment (Ascension Health, 2013). However, the current system of
communicating wishes about end-of-life care that only uses traditional advance directives, such as a living will, has proven insufficient (Bomba, Kemp, & Black, 2012). Bomba et al., (2012) found that traditional advance directives are general statements about patients’ preferences and need to be carried out through specifications in medical orders. Another concern with traditional advance directives is that these studies showed that only 20-30% of U.S. adults have an advance directive (Bomba et al., 2012). Some limitations for advance directives have been identified in previous studies; advance directives are not available when needed, are not transferred with the patient, may not be specific enough, may be overridden by the treating physician, and do not immediately translate into a physician order (Evans, 2011). However, a newer program, POLST, which includes a portable document containing specific information about the patients’ wishes that accompanies them as they move through the healthcare system, was developed in Oregon in 1991 (Robley, 2009).

The form consists of six sections that address various life-sustaining treatment options. The patient’s resuscitation status, treatment goals, specific preferences for the use of antibiotics, and nutrition/hydration treatment are included on the form. The individuals with whom the POLST form was discussed and whether the patient’s preferences are current or previously stated, along with the patient’s contact information, are documented on the form (Vawter & Ratner, 2010). Research from many different states has suggested that the POLST form has had positive outcomes with patient preferences being honored at the end of life. However, little is known about POLST use among dialysis patients. Therefore, whether end-of-life wishes are being honored for Bemidji dialysis patients is not known. The suffering and economic consequences for dialysis patients can be overwhelming at the end of life. However, both patient suffering and economic consequences are predicted to improve with the implementation of the
POLST program. Advanced-care planning programs, such as POLST, can help reduce unwanted and expensive treatment (Benson & Aldrich, 2012).

**Project Description**

A process for the successful implementation of the POLST program at the Sanford Bemidji Dialysis Unit, in Bemidji, Minnesota, was developed. Program stakeholders were first educated about the POLST program and the goal of implementing this program at the dialysis unit so that it could be offered to the patients. A flow chart was developed to help guide the appropriate stakeholders with implementing the POLST program. A screening tool was then developed to help assist the dialysis provider and staff to determine which Bemidji dialysis patients met the criteria for a POLST conversation. The dialysis staff was educated about POLST and the process flow chart. The appropriate stakeholders were trained as POLST facilitators in order to have conversations with dialysis patients. The POLST facilitators were evaluated on their ability to have these POLST conversations under the guidance of the Bemidji POLST coordinator. The process has been developed and the staff is appropriately educated and trained in order to start the POLST implementation process at the Bemidji Dialysis Unit.

The dialysis providers screened all patients during the patients’ monthly assessment. Patients whom the provider felt are good candidates for the POLST conversation were be approached and given the choice to participate in a POLST conversation. Patients who decided to have a POLST conversation were allowed to ask any family members or healthcare agents to participate. Then, a meeting was scheduled. The meeting was conducted in a private room so that all of the patient’s information was protected from outside sources. At any time, patients can choose not to participate in the POLST conversation or the development of a POLST form.
Creating the POLST form presents a number of potential benefits for dialysis patients. Benefits of a POLST form include providing patients with an opportunity to choose and individualize their end-of-life care along with providing clear instructions to family and providers about their wishes. Common fears that can be reduced for dialysis patient with the use of POLST include reducing unwanted medical treatments, family stress to make end-of-life decisions for dialysis patients, and patients’ stress knowing that they will not leave the burden of making end-of-life decisions on their families. Reducing medical costs by minimizing unwanted medical treatments at the end of life is a further benefit for dialysis patients.

Potential benefits for the dialysis staff include reducing the stress of watching patients suffer near the end of life with unwanted medical interventions as well as having satisfaction knowing that patient wishes are being honored near and at the end of life. A potential benefit for dialysis providers is providing guidance to help determine what patients have a greater need to have a POLST conversation. A potential benefit for the healthcare system would be cost savings from unwanted or unnecessary medical interventions.

Dialysis patients are chronically ill and, many times, are affected by numerous co-morbidities that can affect the quality of life and prognosis. Patients and family members expect providers to initiate the conversation about end-of-life treatments. Many physicians are reluctant and uncomfortable discussing end-of-life treatment preferences with their patients. The POLST screening tool should provide knowledge about what criteria can best help providers to make a prognosis and to determine the need for advanced-care planning or the POLST conversation.

At the completion of this project, dialysis staff was educated about the POLST program and benefits; a process flow chart was developed to help guide staff with implementing the POLST program; and facilitators were trained to have POLST conversations. The development
of the flow chart and screening tool, along with education about the POLST program, provided support for implementation at the dialysis unit. Implementing the POLST program should lead to an increase in patient outcomes.

**Project Purpose**

Implementing POLST at Bemidji dialysis is one of Sanford Bemidji and the POLST organization’s goals. The plan for implementing POLST within the dialysis unit fit nicely into the POLST organizations strategic plan for future growth. In Bemidji, the dialysis unit is the fourth Sanford Health department with a POLST program. Sanford’s homecare and long-term care departments have implemented the POLST program using a similar plan/process as the one developed for the dialysis unit. The POLST organization has implemented the POLST program at various assisted-living and long-term care facilities in Bemidji that are not Sanford owned or managed. Chronic kidney disease stage 5 patients are at increased risk for many co-morbid conditions; some of these illnesses are considered life threatening. Chronic kidney disease stage five is a complicated, life altering, and life-threatening illness, which makes dialysis patients an ideal population for using the POLST program.

Discussion with the nephrologist, other local providers, and the Bemidji POLST coordinator indicates a need for advanced-care planning and for the POLST program to improve patient outcomes with end-of-life preferences. Area providers lack the education and training to have these detailed conversations about the end of life; therefore, the conversation often does not happen. Implementing the POLST program to fit within the dialysis process by developing a flow chart for staff to follow helped to ensure that the POLST program had a successful transition into the dialysis unit. A screening tool for providers and dialysis staff to help determine which patients fit the specific criteria necessary to have a POLST conversation
improved compliance with the POLST program. The POLST organization’s overall goal was to transition POLST into the dialysis unit so that POLST become part of the process for each patient. This goal was obtained with the guidance of a process flow chart and screening tool to ensure that staff understood and complied with the process.

**Objectives**

1. Dialysis patients and staff will be educated about the POLST program and its benefits.

2. Dialysis staff will understand the POLST process to ensure that all patients who fit the POLST criteria are given the choice to have a POLST conversation.

3. Dialysis providers and staff will use the POLST screening tool as a guide to help them determine which patients meet the criteria for a POLST conversation.

4. POLST will be successfully implemented at the Bemidji Dialysis Unit to improve carrying out patients’ wishes.
CHAPTER 2. LITERATURE REVIEW

Provider Orders for Life-Sustaining Treatments

Despite the hope that traditional advance directives would ensure that patient preferences are always honored, studies have found that only a minority of American adults have an advance directive of any kind (Evans, 2011). Of those individuals who do have one, many times, the documents cannot be found when they are needed. In some cases, families are not even aware of them. Even if advance directives are found, they are often not followed because families are reluctant to do so or because the form does not address important treatment decisions, such as whether to administer IV fluids, artificial nutrition, or antibiotics (Bell, 2011). Lois Robley (2009) pointed out, "As an antidote to the difficulties encountered with advance directives, a relatively new and simple tool—the POLST form—has been devised to augment advance directives. It is becoming a model for state assurance that the wish of the patient will be honored near the end of life (p. 1)."

Along with these findings, Bomba et al. (2012) argued that failures and opportunities for improvement with current advance-care planning processes highlight the need for change. Bomba et al. (2012) further stated, “POLST is an outcome-neutral form that may be used to limit medical interventions or to clarify requests for medically indicated treatments” (p. 1). In comparison, The National Quality Forum (2006) recommended using the POLST program as a preferred practice for quality palliative care, noting that “compared with other advance directive programs, POLST more accurately conveys end-of-life preferences and yields higher adherence by medical professionals” (p. 43).
The National POLST Paradigm originated in Oregon in 1991 as medical ethicists discovered that patient preferences for end-of-life care were not consistently honored (POLST, 2012). A group of stakeholders realized that traditional advanced directives were inadequate for patients with serious illnesses. They developed a new tool for honoring patient’s wishes for end-of-life treatments. The National POLST Paradigm Task Force (NPPTF) was created in September 2004 to establish quality standards for POLST Paradigm forms and programs and to assist states in developing such programs (POLST, 2012). By 2010, 12 states had approved statewide POLST programs and numerous other states were at various stages of development (Sabatino & Karp, 2011).

Funding for most POLST program funding comes from state and community grants along with healthcare organizations willingness to fund POLST programs. There is some funding available through the POLST NPPTF that can be awarded through grants for implementation of POLST programs (POLST, 2012).

According to a retrospective review of the POLST program use and outcomes in a community where advance directives are prevalent, 67% of decedents had a POLST program compared to 22% who had a power of attorney for healthcare (POAH; Hammes, Rooney, Gundrum, Hickman, & Hager, 2012). In comparison with decedents who only had a POAH, patients with a POLST form were more likely to pass away in nursing homes than hospitals. In only two cases was there evidence that treatment was discrepant with the POLST orders (Hammes et al., 2012). The outcome correlated with a telephone survey that revealed how preferences for treatment limitations were respected 98% of the time for hospice patients who had a POLST form. The POLST program also allowed 78% of these hospice patients who had do-not-resuscitate orders and who wanted more than the lowest level of treatment in at least one
category to be provided antibiotics or hospitalization per their wishes (Hickman, Sabatino, Moss, & Nester, 2009). The POLST program let patients decide to restrict end-of-life interventions along with choosing interventions that are more specific. Evidence from numerous states using the POLST program supported the significant impact on chronically ill patients: helping provide patients with end-of-life treatment wishes (Hickman et al., 2008).

Studies conducted by Hammes et al. (2012) and Hickman et al. (2008) on the current outcomes of the POLST program provided strong support for the program’s effectiveness to provide patient preferences with end-of-life care. Hammes et al. (2012) found that “the POLST program can be a highly effective program to ensure that patient preferences are known and honored in all settings” (p. 8). Along with these findings Hickman et al. (2009) explained,

“The POLST is viewed by hospice personal as useful, helpful, and reliable. POLST is effective at ensuring preferences for limitations are honored. When given the choice, most hospice patients want the option to choose whether or not they want more aggressive treatments in selected situations” (p. 119).

The POLST form is now used in several states, with program names and guidelines varying by state. All programs based on the POLST form share the same key elements (Hickman et al., 2008). A survey was conducted by Hickman et al. (2009) using interviews with emergency medical services (EMS) and long-term care (LTC) expert informants to gain information regarding state laws. Potential legal barriers for implementing a POLST program in many states were discovered. The barriers included statutory out-of-hospital do-not-resuscitate (DNR) form specifications, identifiers (such as a bracelet or necklace), medical preconditions, witnessing requirements, and limitations on substituted consent for withholding life-sustaining treatment (Hickman et al., 2009). These potential barriers had a significant impact on the
complexity of implementing a POLST program. Out-of-hospital protocols were developed to ensure that a patient’s wishes regarding resuscitation were translated into medical orders that would be recognized and complied with across healthcare settings. These protocols may inadvertently constrain a similar process that would apply to a greater range of decisions about life-sustaining treatment (Hickman et al., 2009). The nature of the barrier and the ease of modifiability depended on the state-specific details about the protocols. The barriers included whether the laws are written as a statute, a regulation, or mere guidelines. Upon reviewing the data, it was found that Minnesota lacks default surrogate provisions, making it more accessible for Minnesota to implement a POLST program (Hickman et al., 2009).

The Minnesota Medical Association (MMA) Ethics Committee completed work on a Minnesota POLST form in 2009, and the organization changed the terminology to reflect the fact that nurse practitioners and physician assistants, as well as physicians, would be signing the form (Vawter & Ratner, 2010). It is crucial to note that, although a POLST form has been created for Minnesota, this is only the first step towards making sure that patients’ end-of-life wishes are honored. Based on previous states’ experiences, full statewide implementation of the POLST initiative will take years because both patients and providers must become familiar with the benefits of a POLST (Vawter & Ratner, 2010). The next step for implementing the POLST form in Minnesota is to educate communities about the POLST form and its many benefits. Once patients and healthcare personnel are more familiar with the POLST, the program can be successfully implemented. More research needs to be conducted throughout Minnesota communities to assess the needs for implementing the POLST program and making it successful at fulfilling the patient’s end-of-life preferences.
In the Bemidji area, a POLST organization was created in 2010, and the process is now in the implementation stage. Research conducted with patients residing in an assisted-living facility in Bemidji, Minnesota, proved those residents and their healthcare agents who had POLST conversations were satisfied with the experience (Hall, 2014). Hall (2014) also found that more specific orders were developed that will guide these residents across healthcare settings. The more specific orders include details about resuscitation, antibiotic use, and feeding tubes at the end-of-life.

**Chronic Kidney Disease**

Chronic Kidney Disease is categorized into five stages. In each stage, the kidney function has decreased from the previous stage. The stage is determined by the level of kidney function as measured by a glomerular filtration rate (GFR) (National Kidney Foundation, 2010). GFR is a reflection of how well the glomeruli are filtering waste and extra fluid from the body. The five stages of kidney disease according to the National Kidney Foundation (2010) are listed below.

- Stage 1 kidney disease is early kidney damage with normal kidney function, GFR of 90 or higher.
- Stage 2 kidney disease is kidney damage with mildly decreased kidney function, GFR ranging from 60-89.
- Stage 3 kidney disease is a moderate loss of kidney function, GFR ranging from 30-59.
- Stage 4 kidney disease reflects severe loss of kidney function, GFR ranging from 15-29.
- Stage 5 kidney disease is kidney failure; the GFR is less than 15.

(National Kidney Foundation, 2010)
Hemodialysis

Hemodialysis is a method used to remove waste products from the blood of patients who can no longer excrete these products through their kidneys (Mayo Clinic, 2012). Patients who develop Stage 5 kidney disease need dialysis for life support. Patients receiving hemodialysis are chronically ill and typically suffer from one or more comorbid disease processes. With the aging population and decreasing functional status, the rise in both palliative medicine and end-stage renal disease (ESRD) as specialties has served to promote the importance of end-of-life care for ESRD patients. Keeping individuals alive primarily with dialysis has become a controversial topic. One study stated, “Despite high mortality rates, surprisingly little research has been done to study chronic kidney disease (CKD) patients’ preferences for end of life care” (Davison, 2010, p. 195). The study further concluded that current end-of-life clinical practices do not meet the needs of patients with advanced CKD. An increased effort to focus on end-of-life care for dialysis patients may help to reduce some of these difficult cases. The need for additional considerations about end-of-life care for ESRD patients included a poor functional status, increasingly aged, and disabled ESRD population, along with the palliative management of chronic kidney disease without dialysis. Despite the advantages of end-of-life care for ESRD patients, nearly every nurse, social worker, mid-level provider, technician, or nephrologist working in an acute or chronic dialysis unit has a story to tell about a patient who continued dialysis despite severe dementia or an expected poor prognosis (Holley, 2011).

Dialysis units and dialysis staff may be able to avoid some of these situations with advanced-care planning and advance directives such as the POLST. Each individual has different values, goals, and an acceptable quality of life; therefore, making sure patients are part of decision-making regarding their end-of-life treatment options is essential. Only by providing
patients and their families with the information needed to make such decisions can healthcare staff can be satisfied with the ethical responsibilities and the promotion of shared decision-making.

The POLST form is an excellent tool for advanced-care planning that provides patients with the opportunity to make an informed choice about end-of-life care. There is little evidence about the link between dialysis-patient preferences and the POLST program. Specific preferences could be connected with the use of the POLST program, when it comes to medical treatment for highly specialized dialysis outcomes.

**Theoretical Framework**

“Ethical behavior is not the display of one’s moral rectitude in times of crisis. It is the day-to-day expression of one’s commitment to other persons and the ways in which human beings relate to one another in their daily interactions” (Nursing Theories, 2009, p. 1).

Levine’s Conservation Theory helps to link the use of Provider Orders for Life-Sustaining Treatments with the knowledge of nursing. By providing commitment to others and ensuring that their end-of-life wishes are honored, nursing is engaging in human interaction along with promoting wholeness.

Nursing Theories (2009) discussed Levine’s Conservation Theory, which promotes the following goals that are linked to the nursing care provided with the use of POLST.

1. Realize that every individual requires a unique and separate cluster of activities. 2. Assist the person to defend and seek its realization. 3. Make decisions through prioritizing course of action. 4. Be aware and able to
contemplate objects, conditions, and situations. 5. Involve the whole individual.”


These goals give rise to nursing knowledge and the study of POLST by guiding human interaction to promote the patients’ well-being. Nursing knowledge is needed to understand that every situation will need unique direction to help individuals make decisions based on their own priorities. The implementation of the POLST program at the Bemidji Dialysis Unit promotes the entire individual because people are given the opportunity to be educated about end-of-life options and to make their own, well-informed decisions. The goal then remains for the individual to conserve, integrate, and balance wholeness while establishing a POLST form.

Integrating the POLST program for Bemidji dialysis will follow the framework goals. The detailed POLST conversation will give chronically ill dialysis patients the opportunity to identify individual preferences and will help them to make decisions about end-of-life wishes. The patients, along with their families, will learn about the POLST and how this conversation can help answer questions about end-of-life treatment options and what best fits the patient’s needs.
CHAPTER 3. ORGANIZATION AND PROJECT DESIGN

Many patients receiving hemodialysis treatments have an increased need for end-of-life discussions. While working as a dialysis nurse, the author noted on numerous occasions that most dialysis patients have never been offered education or the chance to discuss end-of-life treatment options. Talking with the dialysis social worker and the current POLST organization leaders determined that dialysis would be a great place to implement a POLST program. Many dialysis patients meet the criteria necessary for a POLST conversation. The Bemidji POLST organization has been in the process of implementing advanced-care planning and POLST programs with various departments for end-of-life discussions. After a discussion with the POLST organization and the dialysis management, those involved decided that the project implementing a POLST program to fit the Bemidji Dialysis Unit would benefit dialysis patients and staff.

When implementing POLST for Bemidji dialysis a Plan, Study, Do, Act (PDSA) project framework was used, which consists of a four-stage, quality-improvement approach. The four stages were Plan, Do, Study, and Act. While applying this framework to the POLST project, what we were trying to accomplish, how we knew that a change was an improvement, and what further changes could be made to make an improvement were considered. In the first stage, plan, an opportunity, along with a plan to make improvement, was identified. For this project, the opportunity was to implement the POLST program for Bemidji outpatient dialysis to improve compliance with the patient’s end-of-life wishes. A team was assembled; roles and responsibilities were given to each team member in order for this project to work. A timeline for each step of the project was set along with regular meetings for all team members. Upon completion of the implementation process for the POLST program within the dialysis unit, the
goal was to have patients who met the criteria for a POLST conversation complete a POLST conversation and form so that their wishes were both known and honored near and at the end of life. Before the project began, the Bemidji POLST organization determined what percentage of Bemidji dialysis patients already had an advance directive of any kind. The plan was to compare the number of patients who had an advanced directive prior to POLST with the number of patients who had an advanced directive or a completed POLST form after project implementation. In the second stage, implementing POLST into dialysis occurred by following the process that was developed. By following this process, the likelihood of successful transition into dialysis was improved. In the third stage, examining the process that was being used to implement POLST helped to determine the success. In the fourth stage, acting upon the process and making any necessary changes to continue this process, to implement POLST with dialysis improved the likelihood for patients’ wishes to be honored.

Three one-on-one meetings with the Bemidji POLST coordinator, the project coordinator, and this author were held to discuss the necessary steps to start the process of implementing POLST within the Bemidji Dialysis Unit. A number of things were determined before we could start the project. First, we needed to have discussions with the dialysis management to approve the implementation and funding for this project. Permission and support from the dialysis director for the funding of wages to cover all POLST meetings and the time to have conversations were necessary. Support was needed from the Bemidji dialysis clinical manager to implement this project. Next, we needed to find dialysis staff members who were willing to become trained facilitators and were willing to have these POLST conversations with patients. Once these facilitators were identified, we were able to move forward with the designated POLST meetings to start planning the implementation process.
The project to implement POLST with dialysis was started by having discussions between the POLST organization and dialysis management. A Lync meeting was set up with the dialysis director, all Sanford dialysis clinical managers, and the Bemidji POLST coordinator who provided education about POLST and its benefits for dialysis patients. Dialysis management agreed that POLST is a good idea to bring into dialysis and gave permission to move forward with training dialysis staff to implement the POLST program. Dialysis management also gave permission for funding the project’s needs, including staff wages for meetings and implementation of the POLST program.

A team that consisted of stakeholders was assembled. Stakeholders who were identified for the implementation process included the Sanford Bemidji POLST coordinator, the director of Sanford outpatient dialysis, the project coordinator, dialysis providers, the dialysis social worker, the dialysis manager, two dialysis nurses, dialysis charge nurses, and the POLST organization.

The stakeholders were first educated about the POLST program by having two meetings with the Sanford Bemidji POLST coordinator. The meeting goals were that the POLST coordinator could discuss what the POLST program includes and how the program works. During these two meetings, the Respecting Choices Model (Gunderson, 2015), developed by the Respecting Choices Organization from La Crosse, Wisconsin, was used as the guide to educate dialysis stakeholders about the POLST program. Dialysis stakeholders were sent home with educational materials to continue POLST program education. A one-hour venue meeting was held, and the dialysis stakeholders who wanted to participate in this process were asked to give input about how the POLST program would best fit into the current dialysis process. Making sure that the POLST program fit into the dialysis process was important before starting the implementation process. Two more one-hour venue meetings with the stakeholders took place to
determine the most appropriate way to incorporate the POLST program with dialysis. When a plan was decided upon, the POLST organization and project coordinator created a process flow chart with all steps to follow when implementing POLST into dialysis.

At the venue meetings, it was determined that, in order to successfully implement a POLST program at the Bemidji dialysis unit, a number of things needed to be completed. First, all dialysis staff and patients would need to be given education about the POLST program and its benefits for dialysis patients. The Bemidji POLST coordinator provided two educational sessions for all dialysis staff, and all dialysis patients were given written material provided by the Respecting Choices Organization. Dialysis patients also had the opportunity to ask any questions about the POLST program. This phase was expected to be completed by March 2014. Next, the identified dialysis staff members who agreed to become trained facilitators needed to be trained using the Respecting Choices Model training course that included six hours of online training and eight hours of classroom training. This project phase was expected to be completed by April 2014. Last, it was decided that the project coordinator would develop a POLST screening tool to help guide dialysis staff members with identifying which dialysis patients met the necessary criteria for a POLST conversation. Once the screening tool was created, all dialysis staff members were educated about how to use the tool in order to help them identify patients for the POLST conversations. This project phase was expected to be completed by April 2014.

Upon determining the steps necessary for successful implementation of the POLST program at the Bemidji dialysis unit, the project implementation began. These steps included creating a process flow chart that incorporated implementing the POLST program into the Bemidji dialysis unit, educating all dialysis staff and patients about the POLST program and
benefits, training the identified dialysis staff members who became POLST trained facilitators, and creating a screening tool to help guide dialysis staff members with identifying patients for a POLST conversation.

**Project Implementation**

During the venue meetings, the stakeholders had a discussion and came to an agreement about a plan to create a flow chart with all steps to follow when implementing POLST into dialysis. See Appendix A.

Upon completion of the plan to implement POLST at the Bemidji dialysis unit, the project coordinator, the dialysis social worker, and dialysis nurses were trained to become facilitators for the POLST program. They completed 14 hours of training, six online hours, and eight class hours, about how to have a POLST conversation. The POLST conversations conducted with patients and their families discuss end-of-life preferences and achieve the outcome of creating a POLST form. The POLST organization members who were trained by the La Crosse, Wisconsin, Respecting Choices Organization provided the training.

Trained facilitators needed to understand the POLST program. The most important component was determining precisely what the patient’s wishes consisted of and translating those wishes to the POLST document. Each trained facilitator was provided with a booklet of information that included practice material for the conversations along with handouts that could be used to help guide conversations. These booklets gave all trained facilitators the ability to continue to practice their POLST conversation skills along with handouts that could be provided to patients during a conversation.

During the same weeks that the trained facilitators were learning the POLST process along with how to have the POLST conversations, other Bemidji dialysis staff, patients, and
patients’ families were given education about POLST. Educational sessions were held to provide staff with education about POLST and its importance for dialysis patients. The Bemidji POLST coordinator taught these educational sessions. Along with the educational sessions, handouts that provided information about the POLST program and benefits were given to staff, patients, and patients’ families. The handouts were purchased from the La Crosse, Wisconsin, Respecting Choices Organization by the POLST organization. The Bemidji POLST coordinator was always available for any questions or more education for all staff, patients, and patients’ families.

Trained facilitators were invited by the POLST organization to a number of meetings in September through December of 2014, to continue to discuss the implementation process for dialysis along with practicing their POLST conversation skills. A Bemidji POLST organization member held these meetings and helped the dialysis staff to set timelines and future goals in the implementation process.

A screening tool for the dialysis providers and staff was created to use as a guide to help determine which dialysis patients met the necessary criteria to have a POLST conversation. The dialysis providers and staff were educated about the screening tool along with how to utilize it to screen dialysis patients for POLST conversations. The hope was that this screening tool would become part of the admission process for all new patients once the POLST program was successfully integrated into dialysis. The dialysis staff that were trained on how to utilize the screening tool used the tool initially. The screening tool was used as a guide for all current dialysis patients in order to help dialysis staff members consider certain measures that might make a dialysis patient more suitable for a POLST conversation. See Appendix B.
The necessary resources for the project’s success include stakeholders, education, and training, along with the budget. Stakeholders who were included in the process consisted of the Sanford POLST coordinator, dialysis providers, the dialysis social worker, the dialysis manager, two dialysis nurses, the POLST organization, and the project coordinator. Stakeholders were educated about the POLST structure within the dialysis unit. Six agenda meetings were held with all stakeholders; each meeting lasted approximately one hour. The dialysis manager, dialysis social worker, two staff nurses, and the project coordinator were educated for 14 hours to become trained facilitators. Two (one-hour) educational sessions were provided for all dialysis staff members.

Each patient who was screened and determined to meet the criteria for a POLST conversation were allowed up to a 90-minute conversation with a trained facilitator. The Bemidji dialysis unit needed to budget for these meetings, training, conversations, and sessions that were important for successful implementation of the POLST program with dialysis. Bemidji dialysis provided funding for staff wages during meetings and when having POLST conversations. The Bemidji POLST organization provided funding for the training through grant funding. See Appendix C.

**Institutional Review Board (IRB) Approval**

Upon reviewing the process that would be utilized to conduct this project and how the POLST conversations would be conducted, it was determined by the North Dakota State University IRB board that this project did not require IRB approval or certification of exempt status. Implementing the POLST project did not include a systemic investigation that was designed to develop or contribute to generalized knowledge. See Appendix D.
Data Collection

Project success was determined by the effectiveness and usability of the process flow chart, education of the dialysis staff and dialysis patients, utilization of the screening tool, and POLST implementation within the Bemidji dialysis unit. The evaluation methods are discussed in detail below as well as in Chapters 4 and 5.

At designated POLST educational meetings, dialysis staff members provided verbal feedback about the POLST program. This informal feedback was that the staff received the appropriate amount of education about the POLST process and the criteria for choosing patients who qualified for a POLST conversation. At a structured POLST meeting, providers also gave feedback that the POLST screening tool was useable and could easily be utilized to determine the dialysis patients who met the criteria for a POLST conversation.

With the guidance of the Bemidji POLST coordinator, a meeting was held with trained facilitators from the dialysis unit in order to assess their ability and readiness to have a POLST conversation. At this meeting with the trained facilitators and the project coordinator, the skills that are necessary to conduct a POLST conversation were practiced and evaluated. Facilitators initiated a POLST conversation with a dialysis patient while continuing to follow the structured interview process. The interview process that was explained during the training was reviewed with all trained facilitators.

The POLST coordinator reminded facilitators that it was very important to ask dialysis patients if there was anything else they wanted to add on the POLST form. The POLST coordinator also wanted facilitators to ask patients if they needed further clarification about any vague phrases or unfamiliar terms on the form. All trained facilitators were evaluated for their ability to have a POLST conversation during the role-play activity. The specific skills evaluated
were the facilitators’ communication skills, their ability to complete a POLST form, and their response to the patient’s need for clarification and personalization of the end-of-life wishes.

Evaluation took place while the trained facilitators completed a role-play activity where they took turns being a facilitator and a dialysis patient. Role-play evaluation allowed the project coordinator to see if the facilitators were educated and trained well enough to move forward with the POLST implementation process at Bemidji dialysis.
CHAPTER 4. EVALUATION AND RESULTS

The POLST paradigm is designed to ensure that seriously ill patients could decide what care they wanted in the final stage of their life and to provide some reassurance that their wishes would be honored. The POLST document is both a holistic method of planning for end-of-life care and a specific set of medical orders to ensure that patient wishes are honored. The POLST Paradigm is not for everyone; the paradigm is designed for patients with serious, progressive, or chronic illnesses (POLST, 2012). Patients with chronic kidney disease stage 5, also referred to as kidney failure, have a serious, progressive disease that, in the end stages, necessitates kidney dialysis. For a majority of patients with chronic kidney disease stage 5, dialysis is a maintenance therapy and not a cure for their disease. The likely trajectory of the illness is downward, and the prognosis is poor. Dialysis patients and their family deserve to have a conversation with a trained professional about the care they want to receive at the end of their life. The POLST program provides the structure for patients and families to clarify final wishes.

The Bemidji POLST organization recognized that dialysis patients were good candidates for a POLST conversation and supported the development of a POLST program for the dialysis unit. This project set up the process to implement POLST for the dialysis unit at Sanford Health in Bemidji. The project plan included a workflow plan; the education of patients, staff, and providers about the POLST program’s benefits and opportunities; providing facilitator training; the development of a patient-selection screening tool; and an implementation plan.

Evaluation Plan

A process flow chart was developed to assist staff with connecting eligible patients and trained facilitators so that all patients who fit the POLST criteria were given the opportunity to have a POLST conversation. Evaluation of the process flow chart occurred through informal
conversations with and feedback from dialysis stakeholders. In particular, stakeholders were asked about their understanding and the ease of use for the process flow chart.

Dialysis staff members were educated about the POLST program and benefits. Educational sessions and written materials were provided for staff members to increase their knowledge about POLST. Patients and their families were given educational materials about the POLST program. Evaluation of the educational sessions and materials was amassed from staff through informal discussions after POLST meetings. Dialysis staff members were asked if they felt informed by the education they received. Staff offered feedback from conversations with patients and families about POLST.

Trained facilitators received training through the POLST organization. The training was based on the La Crosse, Wisconsin, Respecting Choices Model. Facilitators completed 14 hours of combined online and classroom training. Evaluation of facilitator training was based on stakeholder’s feedback and a role-play activity that was developed by the POLST coordinator and project coordinator.

The POLST screening tool was developed to provide dialysis providers and staff with a guide for selecting patients who met the criteria for a POLST conversation. Tool evaluation was done with informal verbal feedback from dialysis staff and providers. Specifically, providers and staff were asked if the tool was understandable, useful, and accurately identified dialysis patients who met the criteria for a POLST conversation.

Due to unforeseen circumstances, no actual POLST conversations were held during the project period. Several barriers to implementation were identified, and recommendations to resolve the barriers and a plan for implementation were developed. Recommendations about
how to decrease or eliminate barriers, complete and evaluate implementation, and achieve the desired outcomes were discussed with the dialysis stakeholders and the POLST coordinator.

Project components are discussed, in detail, in the remainder of this chapter. The PDSA model guides the organization and reporting of the results. The PDSA model is a process-improving and problem-solving tool that was used for this practice-improvement project. The components of the model are plan, do, study, and act. Each cycle within the PDSA model is used to improve a step of the implementation process. There are five cycles that will be discussed for this project: flow chart, education, facilitator, screening tool, and implementation.

Flow Chart

Plan: Flow Chart

The first step was to develop a flow chart. Discussion between the POLST coordinator and the project coordinator recognized a need for a process flow chart within the dialysis unit. Previously, the Bemidji POLST organization was successful at implementing the POLST program for other departments using a similar flow chart. The POLST stakeholders helped create the process flow chart that fit the dialysis unit’s workflow. The remaining dialysis staff members were educated about the flow chart’s purpose and use. With informal feedback, dialysis stakeholders expressed that they were knowledgeable regarding the POLST-process flow chart.

Do: Flow Chart

The dialysis stakeholders had three one-hour venue meetings to create a POLST-process flow chart that fit the Bemidji dialysis unit’s workflow. At the meetings held from January to March 2014, the stakeholders participated and gave input about the best methods for incorporating POLST within the dialysis unit. The POLST coordinator shared flow-chart ideas
that worked for other departments in the Bemidji area. The dialysis stakeholders were asked if they felt anything could be added or changed to make the process fit better at the dialysis unit. After completing three venue meetings, a process flow chart was developed for the dialysis unit. See Appendix A.

Study: Flow Chart

Once completed, the dialysis-process flow chart was specific to the dialysis unit. The flow chart incorporated the dialysis admission process, monthly care conferences, patient-care plans, and changes to patient-health status. The unit’s dialysis stakeholders provided positive feedback about the flow chart. However, the flow chart has not been used more than a few times. One staff person commented, “The flow chart incorporated all of the components that are unique to dialysis.” Through informal feedback, dialysis stakeholders verbalized an understanding of the POLST-process flow chart and its workability in the dialysis unit. One of the stakeholders commented, “The POLST process flow chart would help to ensure that all dialysis patients fitting the criteria for a POLST conversation would be given the choice to have a POLST conversation.” Another stakeholder said, “POLST process flow chart was easy to use and that it helped identify a couple of dialysis patients who fit the criteria for a POLST conversation.”

Act: Flow Chart

The dialysis-process flow chart has only been used as a guide for identifying patients who fit the criteria for a POLST conversation. The flow chart has not been utilized fully because implementation has not occurred. Even though the flow chart has not been utilized fully, the dialysis stakeholders’ report an understanding of the flow chart and its ease of use within the dialysis workflow. Therefore, no further PDSA cycles are needed before the staff can begin
using the flow chart on a daily basis. After several months of use, the Study cycle should be repeated for the purpose of evaluating if the flow chart meets the needs of staff or if revisions are needed. The dialysis stakeholders and the POLST coordinator are responsible for evaluating the flow chart and using the PDSA cycle to make changes if and when they are needed.

**Education**

**Plan: Education**

Education was the second step of the POLST project. The dialysis staff was educated about the POLST program. The Bemidji POLST coordinator conducted educational sessions. The POLST coordinator and the project coordinator organized the educational sessions. During these sessions, the POLST program, including how POLST can potentially benefit dialysis patients, was explained. Dialysis staff members’ comfort and knowledge about POLST was evaluated through informal feedback.

Educational handouts purchased from the *Respecting Choices Model* were provided to dialysis patients and their families. The handouts were provided to patients during and after their dialysis treatments. The handouts included information about the POLST program and its benefits. Patients received the handout without organized face-to-face or group education. Dialysis staff offered information regarding discussions between staff and patients that revealed patients were knowledgeable about POLST.

**Do: Education**

The Bemidji POLST coordinator conducted two one-hour educational sessions for dialysis staff; the sessions included a PowerPoint presentation that outlined the POLST program and the program’s benefits. Sessions were held during staff lunch breaks, and the staff members were paid their regular hourly wage to attend the training. The dialysis staff attending the
sessions included nurses, technicians, social workers, and providers. Fifty percent of the dialysis staff members attended the sessions. Both the staff members attending and those who did not attend received POLST educational handouts, purchased from the Respecting Choices Organization, which they were able to keep. At the educational sessions, staff members could ask questions about POLST and the plan for implementing POLST within the dialysis unit.

Dialysis patients and their families received educational handouts from the Respecting Choices Organization. The educational handouts were written at a fifth-grade reading level for ease of understanding. The handouts were given to the patients by the POLST coordinator. The handouts outlined the POLST program and POLST benefits for patients and their families. Patients and their families were given contact information for the POLST coordinator to raise additional questions or concerns.

**Study: Education**

After the educational sessions, staff members commented that they gained knowledge about the POLST program and were happy to have been educated on this topic. Two of the dialysis staff members, in particular, expressed that “this program could help patients better understand the nature of their illness and need for advanced care planning.” Another staff member commented, “The POLST coordinator was very knowledgeable about POLST and seemed excited about the benefits it could provide dialysis patients.” The stakeholders verbalized that the POLST program would be beneficial for this patient population and could improve both patient and staff satisfaction.

The stakeholders received feedback from the patients and their families about the POLST program. Patients commented to stakeholders about an interest in having a POLST conversation and that the providers may be more likely to comply with patients’ end-of-life wishes with a
POLST form. Stakeholders’ feedback came from their conversations with patients and families during dialysis treatments and at care conferences. Due to the delay with implementing the POLST program, stakeholders believed that it would be beneficial to provide patients and their families with structured educational sessions instead of the handout alone.

**Act: Education**

Education that was given was standard education for the POLST program and provided necessary information to dialysis staff, patients, and family. The POLST coordinator and educated dialysis staff members will be responsible for any further education that is necessary for dialysis staff as the POLST-program implementation continues. All new dialysis staff and patients should be given standard education regarding the POLST program.

Due to the stakeholders’ feedback regarding the concern about further education for patients before implementation, it was necessary to develop a plan for more sessions that are educational. The Bemidji POLST coordinator was contacted about the need for educational sessions and materials for dialysis patients in the future. A plan by the POLST coordinator to provide educational sessions for patients before project implementation was created.

**Facilitator**

**Plan: Facilitator**

Facilitator training was the third step in the implementation process. The Bemidji POLST organization recommended training facilitators who worked in the dialysis unit. The organization explained that implementing a POLST program is often more successful when facilitators come from the unit. Facilitators were trained in accordance with the La Crosse, Wisconsin, *Respecting Choices Model*. The Bemidji POLST organization members, who are qualified to train new facilitators, provided education for the staff members who volunteered for
POLST training. The education consisted of six hours of online training and eight hours in the classroom. A role-play meeting was held with all dialysis-trained facilitators to evaluate their ability to have a POLST conversation with a dialysis patient.

**Do: Facilitator**

In March 2014, four of the Bemidji dialysis staff members and the project coordinator were trained by the Bemidji POLST organization. The training started with six hours of online material that laid the groundwork for the POLST facilitator course. Many scenarios were provided as examples; how to address these difficult conversations was demonstrated. Upon completion of the online training portion, all facilitators were asked to attend an eight-hour, in-class training. During the in-class training, facilitators were taught how to use the guide to conduct these conversations. Once all the information about how to have the conversation was provided, all facilitators were asked to spend time doing role-play activities to practice a POLST conversation. All the trained facilitators went home with a POLST folder that included the necessary materials for a POLST conversation.

In the months following the facilitator training, the facilitators were provided with a variety of practice sessions and meetings that were conducted by the POLST organization to practice skills and to review the POLST process. Facilitators were encouraged to discuss any concerns and to make updates to the materials in their POLST folders.

**Study: Facilitator**

The Bemidji POLST coordinator provided guidance to the project coordinator about a role-play exercise to evaluate the trained facilitators. A meeting with the project coordinator and the facilitators was held in December 2014. Two of the trained facilitators who remained employed with Bemidji dialysis attended the session. During the meeting, the project
The coordinator asked one of the trained facilitators to assume the role of a dialysis patient using the role-play example provided by the Bemidji POLST coordinator. The other facilitator was asked to conduct a POLST conversation. Each trained facilitator took a turn playing the patient and the facilitator. They exhibited the skills that were taught at the facilitator training. Both facilitators were able to stay within the structured interview process for a POLST conversation. Another skill that was evaluated was if the facilitators allowed patients to ask questions and to add information. Both facilitators asked if there was anything else that the patient wanted to add or that needed clarification. Additionally, the facilitators effectively led the role-play scenario and completed a POLST form with the patient. The project coordinator, who is a trained POLST facilitator, observed and evaluated the role-play activity. The observer thought that the trained facilitators did a wonderful job conducting a POLST conversation and completing the POLST form during the role-play exercise.

**Act: Facilitator**

The role-play activity provided support that the dialysis facilitators who remain employed with the dialysis unit have been trained to conduct the POLST conversation. Because only two of the four facilitators who were initially trained remain committed to this project, there is a need to recruit more dialysis staff.

In the first PDSA cycle for facilitators, it was found that not enough dialysis staff members were trained to become facilitators. POLST conversations last one-to-two hours in and can take a lot of the trained facilitator’s time. In order for the project to be implemented, there must be an adequate number of trained facilitators for the dialysis patients who are eligible for a conversation. Discussion with the POLST coordinator and the dialysis director will be needed to
confirm support for training more dialysis facilitators. These individuals will need to be trained using the same approach as the previous facilitators.

In January of 2015, the POLST coordinator and the dialysis director were contacted about the need to have more dialysis-trained facilitators for this project. Recruiting more staff members to become trained facilitators was encouraged. The dialysis social worker was contacted, and she identified staff members who possessed the necessary skills to be good POLST facilitators. In February 2015, two nurses were asked about committing to become trained facilitators. In April 2015, the Bemidji POLST organization will conduct another facilitator course. The newly identified dialysis staff members will be trained during this course.

Trained facilitators need to continue practicing the skills that they learned. The POLST organization considers the conversations complicated and challenging and as such, the facilitators’ skills may wane or be forgotten if not practiced.

**Screening Tool**

**Plan: Screening Tool**

The screening tool is the fourth step in the implementation process. Dialysis staff members requested that a screening tool be developed to help them better identify which dialysis patients would be good candidates for a POLST conversation. Literature regarding factors that contribute to a dialysis patient’s mortality was reviewed. Identifying the factors that are associated with the patients' chance of imminent mortality is critical when creating a POLST screening tool. The instrument was developed once knowledge was gained about what criteria were important to include.
**Do: Screening Tool**

A POLST screening tool was developed to provide guidance for screening dialysis patients who fit the criteria for a POLST conversation. The instrument was created using literature that supported how dialysis patients with certain criteria are more likely to have mortality within 12-18 months. The screening tool was unique for dialysis because it was developed using the diagnostic values and chronic illnesses that are related to dialysis patients’ higher mortality. Once the instrument was created, a nephrologist reviewed it.

The screening tool was introduced to all dialysis stakeholders at a venue meeting in January 2014. At this meeting, all stakeholders were educated about the tool. The dialysis stakeholders were trained on how to use the screening tool and they will be responsible for screening potential dialysis patients for the POLST conversations. While using the screening tool, stakeholders were asked to consider the patients’ lab values and health status as part of identifying appropriate patients for a POLST conversation. This tool only serves as a guide; staff will need to take into consideration each patient's circumstances. The nephrologist’s will make the final decision about which patients are offered a POLST conversation. See Appendix B.

**Study: Screening Tool**

The dialysis stakeholders provided feedback that the POLST screening tool can serve as a guide to identify dialysis patients who are candidates for a POLST conversation. One stakeholder commented, “I used the tool to screen all 75 Bemidji dialysis patients and found that 15 met the criteria for a POLST conversation.” Another stakeholder verbalized that she “felt that this tool would be beneficial in the future when trying to identify dialysis patients who are being considered for a POLST conversation.” One person suggested that the screening tool could be improved by including a question that specifically asked if the patient lived within the Bemidji
ambulance’s service area. In order to offer a patient POLST participation, the patient is required to live within the ambulance’s service area. The nephrologist’s expert opinion constitutes the final decision about patient eligibility for a POLST conversation. The screening tool is a valuable aid for staff during the initial screening process, before the request goes to the nephrologist.

**Act: Screening Tool**

The purpose of the POLST screening tool is to guide staff in the patient selection process. The screening tool provides the staff with objective criteria for screening dialysis patients and determining which patients might be a good fit for a POLST conversation. The screening tool is available for staff use. However, until the POLST program is up and running in the dialysis unit, the screening tool will have little use.

**Implementation**

**Plan: Implementation**

Due to unforeseen circumstances, the project was not implemented. A plan has been developed to remove the barriers that prevented the project from moving forward. This plan will be shared with the Bemidji POLST organization and the dialysis stakeholders who will be responsible for taking over the project. The PDSA cycle for implementation was halted due to multiple roadblocks that will be discussed in greater detail in Chapter 5.
CHAPTER 5. DISCUSSION AND RECOMMENDATIONS

There is a need for change in the current advanced-care planning process, and the POLST program may be used to help clarify patient requests for medically indicated treatments at the end of life (Bomba et al., 2012). The POLST program honors the patient’s preferences for end-of-life wishes in a variety of healthcare settings (Hickman et al., 2009).

Despite high mortality rates among chronic kidney disease patients, the patient preferences for end-of-life treatments have not been considered (Davison, 2010). Holley (2011) illustrates that nearly all healthcare professionals who work with dialysis patients, at some point, have been faced with decisions about end-of-life treatment options. Healthcare professionals need to be educated and trained for this difficult conversation. The need to ensure that patient wishes are honored is critical for the success of the POLST program.

The project components are discussed in more detail in the following sections. Specifically, I will discuss the project, Flow Chart, Facilitators, patient and staff education, the Screening Tool, and the lack of POLST implementation within the dialysis unit.

Flow Chart

A flow chart is a process that displays the necessary steps to carry out a plan. The dialysis-process flow chart was created with guidance from the Bemidji POLST coordinator and the dialysis stakeholders. These stakeholders provided feedback that they were knowledgeable about the process flow chart. Stakeholders were able to use the flow chart to identify patients who fit the criteria for a POLST conversation and suggested that the flow chart would work well within the dialysis unit. The flow chart helps structure a plan for the implementation process utilized by healthcare professionals. According to the POLST coordinator, flow charts have streamlined POLST implementation in other health care settings.
**Education**

Dialysis facilitators were educated about POLST through venue meetings and a formal training process. Facilitators must be knowledgeable about the POLST program in order to have conversations with patients. Because there were not POLST conversations with actual patients from the dialysis unit, the project coordinator and the POLST coordinator decided to evaluate the facilitators by conducting a role-play activity. The facilitators completed the role-play activity. The coordinators decided that, based on their observations, the facilitators were knowledgeable about POLST, and were successful having a POLST conversation.

Dialysis staff members were educated about the POLST program through presentations and written material. Staff members provided feedback that they were knowledgeable about the POLST program and did not need additional training. An evaluation form would have provided better feedback about the POLST trainers, the educational materials, and whether the educational objectives were met.

Dialysis patients and their families were given written materials for education. The information that was provided to patients and their families was written at a fifth-grade level for literacy. Dialysis staff offered feedback regarding patient and family understanding of POLST. Dialysis patients and families need further education before implementing POLST. Educational sessions hosted by the Bemidji POLST coordinator should be offered to patients and their families.

The evaluation method chosen was an ineffectual in measuring the success of the education. Informal feedback is subjective only. Perhaps a more objective method, such as a survey or pre and posttest, would have been a better measurement of participant understanding. A survey may have provided a more accurate measurement of staff perceptions about
effectiveness of the education provided. There is an obligation to evaluate healthcare education, regardless of how satisfactorily it might appear to fulfill its intended goal; there remains a need for adequate testing (CDC, 2012).

**Facilitators**

The dialysis unit social worker assisted with identifying facilitators; staff members were then asked if they had any interest in becoming a facilitator for the unit’s POLST program. The facilitators were required to complete 14 hours of training that was conducted by the Bemidji POLST organization in accordance with the La Crosse, Wisconsin, *Respecting Choice Model*. Upon completion of the training, facilitators were asked to continue to practice having POLST conversations by using the written materials. Unfortunately, the facilitators did not complete any conversations with dialysis patients. Therefore, a decision was made by the POLST and project coordinators to evaluate facilitator performance through role-play. Facilitators were asked to participate in a meeting that involved a role-play activity to evaluate their ability to have a POLST conversation.

The POLST coordinator was consulted and provided guidance about evaluation methods for the facilitators. A role-play activity developed by the POLST coordinator was used to assess the skills necessary to carry out POLST conversations. The two remaining POLST facilitators attended the meeting and role-played a POLST conversation. “Role-play is used as a training method to acquire knowledge, attitudes, and skills in a range of disciplines and with learners of different ages” (Nestle & Tierney, 2007). Healthcare professionals can be trained with a variety of means: written tests, practical examinations, peer feedback, and role-play. Role-play was chosen for evaluation because the project coordinator and POLST coordinator felt that role-play would best demonstrate the facilitator’s skill and comfort level. Because having a POLST
conversation is a very intimate and interactional process, a written test would not evaluate the facilitator’s performance.

More trained facilitators are needed for successful implementation of the POLST program. POLST conversations are time consuming, and there must be an adequate number of facilitators to have the conversations. Initially, the POLST coordinator recommended that three dialysis staff members become facilitators based on his experiences with other departments that implemented POLST. Facilitators must be willing to take the time to have these conversations; therefore, it is essential that newly identified facilitators commit to the project. Conversations between the POLST organization and the project coordinator generated the recommendation that training two more dialysis facilitators would afford adequate facilitator time to implement the program. Two additional dialysis nurses have been contacted about their interest in becoming POLST trained facilitators. Once two more staff members commit to becoming facilitators, they will be asked to attend the April 2015 training.

**Screening Tool**

A screening tool is used to evaluate a patient in order to identify a condition or need. An instrument was developed through conversation with the nephrologist and evidence-based research about dialysis-patient mortality. The literature supports that dialysis patients have serious, often terminal diseases and that mortality is high among dialysis patients. The screening tool was developed by considering the unique needs and health of the dialysis patients; the tool reflects evidence-based practice. Dialysis staff members asked for a tool to screen dialysis patients so that they correctly selected patients who met the criteria for a POLST conversation. The screening tool fulfilled the need for a streamlined, effective method of determining dialysis patients who had a higher risk for mortality. Stakeholders gave their input about the screening
tool and about how the tool could best be utilized with dialysis patients. The stakeholders were educated about how to use the screening tool as a guide for patient selection. They verbalized that the screening tool would be helpful for identifying patients who needed a POLST conversation.

Other departments that have implemented the POLST program in the Bemidji area have not used a screening tool to evaluate their patients. The instrument was developed in response to a dialysis-staff request. Dialysis patients can range in their degree of severity and chronicity. Often, patients live for many years after starting dialysis. The POLST program is targeted to patients who have 12-18 months or less to live. Dialysis staff members are faced with difficult decisions due to fluctuations in the severity of dialysis patient’s health status. Currently, a patient-selection screening tool is not used at other locations. After the tool has been used at the dialysis unit for several months, the effectiveness and reliability of selecting eligible patients should be evaluated. The tool must also be revised as evidence-based care for dialysis patient’s changes. The tool’s validity and reliability could be evaluated after use at the Bemidji dialysis unit and, hopefully, other dialysis units within the Sanford system.

**Implementation**

At this date, the POLST program has not been implemented at the Bemidji dialysis unit due to barriers such as the dialysis staff’s lack of time, staff resistance, and the lack of adequate space to have a private POLST conversation in or near the dialysis unit. The previously mentioned barriers were identified by stakeholders at a September 2014 POLST meeting. At that time, the POLST organization, dialysis staff, and project coordinator brainstormed possible solutions for the barriers. First, a solution was proposed that another dialysis staff member become trained as a facilitator to help with the time barrier. More facilitators would provide
more options about who could provide a POLST conversation. Due to low demand, training courses are not available until April 2015.

Staff resistance to have these conversations was addressed with the two remaining facilitators. These individuals commented that they felt uncomfortable about the first POLST conversation because of their lack of experience with end-of-life discussions. Both facilitators committed to conducting their first conversations in pairs. Having these conversations with a partner will help alleviate some of the difficulty that can arise.

The third identified barrier was lack of space. The Sanford Bemidji administration was contacted about any space near the dialysis unit that could be used. To date, an acceptable solution that meets staff needs has not been found. The proposed spaces are buildings that are not part of the dialysis unit. The dialysis staff feels that a separate location is a barrier because most dialysis patients have trouble with transportation and mobility. Staff and administration continue to search for solutions in, or close to, the dialysis unit. With the influx of new patients, there is a need to expand the current space or to construct a new dialysis unit. There is hope that a meeting room could be included in the design for the new space. Currently, the social worker does not have an office. Perhaps, an office and meeting space could be combined for everyone’s benefit.

Conversations among the Bemidji POLST coordinator, the project coordinator, and another POLST organization member reinforced the commitment of the POLST organization’s goal of implementing POLST within the dialysis unit. Barriers were identified and discussed during the meetings. The lack of dialysis staff time was addressed, and a solution to find two more dialysis staff members who are interested and willing to have POLST conversations was discussed. The POLST organization agreed to have another POLST facilitator-training course in
April of 2015. The POLST organization and the POLST coordinator asked for assurance that the dialysis director and the clinical manager were still in full support of funding this project.

The POLST coordinator wrote a letter of support for project continuation as well as the identification and elimination of the identified barriers. The letter of support can be seen in Appendix F.

A meeting with the dialysis director and the project coordinator was held in February 2015. The identified barriers, a lack of dialysis staff time and no private space for POLST conversations, were discussed. A solution to train two more dialysis staff nurses to resolve the time barrier was agreed upon with support from the director of dialysis to continue funding staff wages. A solution to find an adequate space for a POLST conversation was discussed. Part of the plan when the Bemidji unit is expanded is to include space for POLST conversations. The director of dialysis unit has committed to working with the clinic manager and Sanford administration in Bemidji to find a short-term solution to the space problems, until something more permanent can be located.

Through dialogue with the director of dialysis, she reaffirmed her support for this project and agreed to support continued funding for wages for POLST meetings and conversations. Additionally, the dialysis director agreed to write a letter of support for the continuation of this project once the barriers have been resolved. The letter of support can be seen in Appendix E.

The most current evidence continues to champion the use of POLST for healthcare providers who care for chronically ill patients. While many chronically ill patients continue to rely on their healthcare professional for guidance and support, the reality is that their care raises complex social and ethical concerns. “Yet, the vast majority of healthcare professionals and service providers say that they are woefully ill-prepared to deal with the growing challenges of
an aging population” (POLST Pennsylvania, 2015, p. 1). This project provides evidence that a POLST program can be developed to help healthcare professionals feel prepared for difficult end-of-life conversations. Along with these findings, a recent case study of nurse-practitioner engagement in the care-planning process found that “the structured involvement of a CRNP in care plan meetings seemed to promote an individualized approach to POLST goals of care that had not occurred in previous interprofessional meetings led by nursing and social work staff” (Hartle, Thimons, & Angelelli, 2014, p. 4). The nurse practitioner is uniquely qualified to provide end-of-life care that assists patients with their end-of-life decisions because of the relationship nurse practitioners share with their patients.

Limitations

The following sections will discuss the limitations in more detail. The limitations are numerous and include time constraint, an increased patient workload in the unit, facilitator resistance, and space constraints.

Time Constraint

The time constraint was identified by Bemidji dialysis staff. Conducting a POLST conversation is a lengthy process; it can take from one-to-two hours to have the conversation and another hour to document what was said. This time commitment creates a challenge for many organizations that are trying to implement a POLST program. Currently, there are no reimbursement incentives for having these POLST conversations. Based on previous literature, this limitation was considered when preparing this project. During project development, the coordinator addressed the time commitment that would be necessary for the three dialysis staff members who chose to become trained facilitators. This recommendation was based on the Bemidji POLST coordinator’s experience with implementing the POLST program at other
Bemidji-area departments. In the last year, the Bemidji dialysis unit had a high staff turnover rate. One of the trained facilitators left the dialysis unit for a new career in November of 2014, and decreased the time availability for POLST conversations. Only having two trained facilitators for the Bemidji dialysis unit became a problem when trying to implement the POLST program.

**Increased Patient Workload**

Increased productivity and workload within the dialysis unit created challenges for the facilitators. The Bemidji dialysis unit had a 10% increase in new patient admissions in the past year. Because of the surge in new patient admissions, the remaining two trained facilitators had to focus more time on the new patients and had a decreased amount of time to focus on the POLST program. One trained facilitator was asked to work more shifts to staff the unit because of understaffing at various times throughout the year. The social worker had an increased patient load that left her overwhelmed with new admissions and patient concerns. Priority for dialysis staff was to complete patient admissions and other associated concerns that arise on a day-to-day basis.

**Facilitator Resistance**

The trained facilitators have faced barriers with implementing the POLST program. However, if they wanted to get the conversations done, perhaps they would have found the time. When considering new dialysis staff to become trained facilitators, importance will be given to confirm that the staff members are committed to this project and will take the time to complete the conversations.

In November of 2014, the POLST organization was contacted about the possibility of training more dialysis staff as facilitators. This idea was accepted as a possibility by the POLST
organization. However, it was discovered that, due to a low overall need for POLST facilitators in the Bemidji area, there would not be another facilitator course until April of 2015. This time constraint has restricted any work on the POLST program implementation for Bemidji dialysis since June of 2014.

**Space Constraint**

The space constraint in or near the Bemidji dialysis unit posed a concern. Conducting a POLST conversation is a lengthy process. Additionally, the conversations need to be private. Medical information is discussed during these conversations, and due to the personal nature of medical history, providing privacy is not just recommended, it is required. The space must also be large enough to accommodate the patient, invited family members or healthcare agent and/or any other persons the patient wishes to have present. The Bemidji dialysis unit does not have a large enough private space that can be used for POLST conversations. The lack of space limitation was discovered in April of 2014 as the project moved towards the implementation stage. With the recent influx of patients, the unit has faced similar space constraints for day-to-day operations. Additional seating is needed to accommodate dialysis patients and those who accompany the patient to dialysis. Sanford administration was contacted about the need to find available space that could provide both comfort and privacy within a reasonable distance from the dialysis unit. After much investigation by numerous Sanford employees, there was discovery that adequate space within a reasonable distance of the dialysis unit was not available. The only available space was in a Sanford-owned building some too great of a distance from the dialysis unit. Dialysis staff members felt that asking dialysis patients, who have mobility constraints, to travel to another building for a POLST conversation created another barrier. Since April of 2014, the lack of useable space has restricted any further progress towards implementation.
Recommendations

Recommendations to overcome the project’s barriers and limitations are discussed in the following section. In regards to limiting the time constraints, if more staff members are trained, there will be more staff time to conduct the conversations. Increased productivity and unit workload will need to be addressed by dialysis administration. Facilitator resistance should be considered, and concerns should be addressed. A short-term solution for space limitations needs to be addressed by Sanford administration. A long-term resolution for space constraint should consider finding a designated conversation room.

The POLST organization’s training course will provide education for more facilitators. The next available training course is in April 2014. Training that is consistent with recommendations from the Respecting Choices Model will produce new facilitators for the dialysis unit. Individuals who have completed this training are successfully conducting POLST conversations throughout the nation. Once more dialysis staff become trained facilitators and the time constraint is resolved, it would be important to find a short-term solution for an appropriate space to have a POLST conversation.

Short- and long-term solutions are needed for the space constraints. Discussions with Sanford administration and the dialysis staff needs to focus on obtaining private and large enough space close to the dialysis unit. The dialysis director and the dialysis clinical manager have agreed to have conversations addressing space needs in both the short and long term. There is space available for short-term use in both the hospital and in buildings located outside the dialysis unit. The purpose of the screening tool is to aide staff in identifying patients appropriate for a conversation; however, the screening tool could also be used to determine if the patients are able and willing to travel to another building for a POLST conversation.
Support from dialysis administration and the Bemidji POLST coordinator to resolve these barriers in the near future so that this project can progress was discussed and documented in personal letters. Dialysis administration has agreed to continue supporting the POLST program being implemented at the Bemidji dialysis unit. As part of supporting this implementation, the administration has agreed to fund the facilitators’ wages for trainings, meetings, and conversations. Support for the training of two more facilitators, and finding a private space for the conversations have been documented by the dialysis director. See Appendix E.

The Bemidji POLST coordinator agreed to continue to support the POLST program’s implementation for the Bemidji dialysis unit. Discussion between the POLST coordinator and the project coordinator determined a need for the POLST organization to provide continued education and training for dialysis staff, patients, and facilitators. The POLST organization controls the implementation of these conversations by providing structure and feedback. Potential solutions for the time constraints, space constraints, and staff hesitancies were discussed and addressed by the Bemidji POLST coordinator. See Appendix F.

Dialysis staff as well as patients and their families need to have continued education about the POLST program. Scheduled and special request educational sessions should be conducted by the POLST organization. Educational materials should be available to dialysis staff, patients, and families whenever needed. New staff and patients joining the dialysis unit should be offered the opportunity for POLST education.

Dialysis stakeholders should continue to review the process flow chart and screening tool at quarterly staff meetings to identify any concerns or necessary changes. The POLST organization should be included in these meetings for expert guidance.
The plan for implementation includes documenting the POLST form in both the electronic medical record and paper chart within the dialysis unit. A copy of the POLST form will be sent to the primary-care provider for approval and a signature. The original POLST form will be sent to the patients with an instruction about keeping the form easily accessible to themselves and their families in case of an emergency. This plan is more thoroughly outlined in the process flow chart and can be seen in Appendix A.

Concentration should be focused on having POLST conversations with current, eligible dialysis patients. After the POLST form is offered to current patients, the POLST process should become part of the admission process for the dialysis unit. The flow chart that was created should guide the process.

Currently, there are no reimbursement incentives for organizations to conduct POLST conversations. However, most leaders in POLST organization support Medicare and private insurance reimbursement for advanced care planning counseling, including the time required to prepare POLST (Sabatino & Karp, 2011). Because the POLST conversations are a lengthy process, this creates a challenge for justification of staff and facility time in order to conduct POLST conversations. However, there is federal legislation currently in development that would allow Medicare patients to get financial reimbursement for having the POLST conversation. Organizations should support legislation for third party reimbursement for POLST conversations. It makes sense that reimbursing end of life discussions would potentially reduce costly, painful, futile end-of-life interventions in the final days and months of life.

To have success, support is needed from the stakeholders, the unit’s staff administration, the Sanford organization, and the POLST organization. Stakeholders need to commit to the POLST process and focus on improving patients’ end-of-life care. The Bemidji dialysis
administration, along with the Sanford organization, needs to provide funding and to meet the space requirements for successful program implementation. The POLST organization needs to continue to support the education, training, and implementation process. Agreement about project goals and having defined plans are critical for the project’s success (Hughes, 2010).

The POLST organization should consider implementing the POLST program for other departments, which have patients who are chronically ill. Other areas for the POLST organization to consider introducing the POLST program include oncology, internal medicine, cardiology, and family practice. The POLST organization should continue to monitor and evaluate the POLST program outcomes. An important outcome to measure is whether the patient’s end-of-life wishes were honored and if the POLST information was used for end-of-life care. Evaluation data should be analyzed so that any necessary changes can be made. The ultimate goal is maintaining a high-quality program that benefits staff members, patients, and families.

Recommendations outside the Bemidji POLST organization regarding application for this project in other settings would include evaluating patient/family experiences with the POLST program, evaluating the quality of the patients’ POLST decisions, and evaluating the need to broaden access to POLST earlier for patients who are seriously ill.

Implications for Practice

Nurse practitioners have key roles to educate and create new care strategies for aging and chronically ill populations. As health educators, nurse practitioners can talk to patients, families, and communities about ways to promote end-of-life care. The POLST program gives the nurse practitioner a guide to educate patients about considering their wishes for end-of-life treatments. With an aging American population, there is an increased need for nurse practitioners, along with
other healthcare providers, to initiate conversations with patients about end-of-life choices. Nurse practitioners are known to have good relationships with patients, to be good educators, and to serve as excellent patient advocates.

The majority of Americans do not have any form of an advance directive, and many patients receive unwanted and unnecessary medical interventions (Bell, 2011). The POLST program gives nurse practitioners a tool to use when guiding patients and their families in making tough decisions about end-of-life care.

The literature supports the fact that most healthcare professionals have a difficult time initiating and conducting an end-of-life conversation (POLST Pennsylvania, 2015). To lessen the discomfort with talking about end-of-life care, nurse-practitioner programs should include training that focuses on the skills that are necessary to have the conversations. Administration should support staff that participate in training and should reinforce the importance of conversations about the end of life. Organizations should mandate that all healthcare professionals who work in areas of chronic illnesses receive training related to end-of-life discussions.

The goal would be to have trained nurse practitioners who are comfortable with discussing end-of-life care as well as to have patients who maintain control and dignity by deciding, in advance, what care they do and do not want in their final days. The POLST program provides a structured method to attain that goal. Nurse practitioners are fully capable of addressing advanced-care planning near the end of life, but they must first find a way to make it a consistent part of their routine (Hartle et al., 2014).

The POLST program provides an excellent opportunity for nurse practitioner to listen to and communicate with patients in order to discover the patients’ end-of-life wishes.
Collaboration for nurse practitioners and other healthcare professionals about their patient`s wishes and what medical interventions to use can be achieved with a POLST form. The hope is that this medical order will reduce unwanted and unnecessary medical interventions, at the same time providing documentation about details about the patients’ wishes. The POLST program has the potential to improve both nurse practitioner quality of care and patient satisfaction.

**Dissemination**

Disseminating information about the implementation process for a POLST program within the Bemidji dialysis unit will be completed by poster presentations at NDSU’s spring poster presentation and at the North Dakota Nurse Practitioner Pharmacology Conference in September 2015. Increasing nurse practitioners’ knowledge and understanding about the POLST program will encourage the use of POLST. Interest with this program could promote the creation of similar projects to utilize POLST for a greater population. The Sanford director of dialysis will use results to promote creation of similar programs using POLST, within other Sanford dialysis units. Informing other dialysis units about the POLST program and a project guide for implementation will encourage the use of POLST with chronic kidney disease patients. The Bemidji POLST organization will also use results to educate and to promote POLST in the Bemidji area. Releasing both gained knowledge and results about POLST can help to promote the program’s use so that patients’ end-of-life wishes are known and honored.

**Implication for Research**

POLST is becoming a nationally recognized advanced-care planning tool to help improve patient satisfaction among many areas of healthcare. There is evidence that POLST is working in other healthcare areas and is ensuring that patient`s wishes are honored at the end-of-life. More research is needed to determine if POLST works well with dialysis patients. Evaluation
related to dialysis patient’s wishes being honored with the use of POLST should be conducted. More research is needed about dialysis patients’ satisfaction increasing with the use of POLST.

Evaluating the outcomes of the POLST program for all dialysis patients by extending the criteria would be beneficial in the future. Research about the use of a POLST program with patients who have a variety of chronic illnesses is needed; this study could focus on the areas of oncology, cardiology, and geriatrics.

The results from this project give direction for further research about the best method to educate staff along with how to recruit and train facilitators. Researching educational models that improve patient and family adherence to POLST could improve outcomes. Determining methods that increase the facilitators’ likelihood of conducting conversations would be beneficial for the future of POLST programs.

Conclusion

Developing a process flow chart, along with education and training, helped provide guidance to implement POLST into Bemidji dialysis. Provider Orders for Life-Sustaining Treatments (POLST) is an excellent tool that is used to ensure that a patient’s end-of-life wishes are honored. The POLST program is suitable for patients who are chronically ill and who are considered by their healthcare provider as having 12-18 months or less to live. Dialysis patients are chronically ill and, often, have numerous comorbidities that make them candidates for a POLST conversation.

During the project, I learned a great deal about effecting change and project development within the hierarchy and constraints inherent in a large organizational system. I recognized that numerous dedicated individuals must commit to a project of this size in order for the project to be successful. Additionally, I understand that project planning is a detail oriented, time
consuming, sometimes frustrating, and ultimately can be a worthwhile endeavor. Despite the
time spent training, planning, organizing, and revising the project, POLST implementation has
not yet been realized. Barriers such as the availability and heightened workload of staff, as well
as the facility space constraints encountered, have stalled project implementation. The
stakeholders and the project coordinator have developed recommendations for resolving the
identified barriers so the project can move forward. The stakeholders have pledged their
continued support and commitment to seeing the POLST project to fruition. I have recently
accepted an NP position in the nephrology department at Sanford Health in Bemidji. I plan to
continue as the project coordinator once I start my new role and to mentor dialysis staff as they
begin to have POLST conversations with dialysis patients and their families. Completing this
project is a top priority for me professionally. My goal is to ensure that the POLST program
becomes standard of care for patients receiving dialysis at Sanford Health in Bemidji, Minnesota.
REFERENCES

http://www.ascensionhealth.org/index.php?option=com_content&view=article&id=188&Itemid=172


http://www.gundersenhealth.org/respecting-choices


APPENDIX A. POLST-PROCESS FLOW CHART

**Current EOL**

1. **Code status**
   - Code status as assessed by charge nurse on admission
   - Status this entered into the EMR
   - Code status is readdressed if
     - 1] patient has an inpatient hospital stay
     - 2] if the patient is discharged and readmitted

2. **Advance directives**
   - Assessed by social services within first 30 days.
     - Do you have an AD?
     - If yes, the document is scanned into the EMR and a paper copy is placed in the chart
     - If no, patient is asked if they would like information and provided help and requested

**Screening process**

1. **On admission**
   - **✓** Nephrologist assesses patient's
   - **✓** Uses POLST dialysis screening tool

2. **At any point during dialysis**
   - **✓** Facilitators
   - **✓** Consult with Nephrologist
   - **✓** Use of POLST dialysis screening

3. **Monthly care of plans**
   - **✓** Team will assess patient's use POLST dialysis screening tool
   - **✓** SW will routinely raise question for each patient reported team assessment
   - **✓** Consult with Nephrologist

**Referral process**

1. **Possible POLST candidates identified**

2. **Charge or RN contacts Patient's primary physician and would be notified of the dialysis team’s assessment that the patient is appropriate for POLST conversation**
   - If no, no further action is taken
   - If yes, the charge nurse will contacts facilitators

3. **The facilitators makes initial contact the patient/family**
   - If patient says no, no further action is taken
   - If patient says yes, facilitators sets up time and ***place for facilitated conversation and contacting those who the patient would like meeting

<table>
<thead>
<tr>
<th>Referral process</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>2. <em>Charge or RN contacts Patient's primary physician and would be notified of the dialysis team’s assessment that the patient is appropriate for POLST conversation</em>*</td>
<td>POLST coordinator will separate meeting time and place Dialysis manager will be available to answer any questions the charge nurse might have</td>
</tr>
<tr>
<td>3. The facilitators makes initial contact the patient/family</td>
<td></td>
</tr>
</tbody>
</table>
**POLST conversation & documentation**

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
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</thead>
<tbody>
<tr>
<td>1.</td>
<td>Conversation is completed</td>
</tr>
<tr>
<td>2.</td>
<td>Facilitator documents conversation using template</td>
</tr>
<tr>
<td>3.</td>
<td>A copy of the documentation is put on the patient's dialysis hard chart you in a red sleeve chart</td>
</tr>
<tr>
<td>4.</td>
<td>Original POLST and documentation sent to primary care physician in a red routing envelope</td>
</tr>
<tr>
<td></td>
<td>- Facilitator attaches sticking note to original document instructing physician to return the original document to dialysis</td>
</tr>
</tbody>
</table>

**Completed POLST is return to dialysis**

<p>| | |</p>
<table>
<thead>
<tr>
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<tbody>
<tr>
<td>1.</td>
<td>Original is given to the patient to take to their residence</td>
</tr>
<tr>
<td></td>
<td>- If the patient is at home a magnetized red plastic sleeve is provided for the patient to place document on the refrigerator</td>
</tr>
<tr>
<td></td>
<td>- If patient is in a POLST pilot site the document is returned to that setting along with documentation</td>
</tr>
<tr>
<td></td>
<td>****If the patient is not in their own home or in a POLST site their place of residence the residence is notified of the POLST document</td>
</tr>
<tr>
<td>2.</td>
<td>When a patient is a resident at one of the POLST sites facilities and the dialysis team obtains referral the dialysis team will complete the POLST conversation and documentation.</td>
</tr>
<tr>
<td></td>
<td>- The referral is obtained through Nephrologist and the dialysis team assessment. The dialysis team would be the best position to make sure that the patient's needs are reflected POLST document.</td>
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</table>

**Reviewing a POLST and a new POLST completed**

<p>| | |</p>
<table>
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<tbody>
<tr>
<td></td>
<td>There is a substantial change in the patient's plan of care / health status</td>
</tr>
<tr>
<td></td>
<td>- The patient is transferred from one level of care to another</td>
</tr>
<tr>
<td></td>
<td>- The patient's treatment preferences change</td>
</tr>
<tr>
<td>1.</td>
<td>The POLST may be changed or revoked at anytime by the patient/resident or their HCA</td>
</tr>
<tr>
<td>2.</td>
<td>Monthly care of plans</td>
</tr>
<tr>
<td></td>
<td>✓ Team will assess patient's POLST for appropriateness of the patient's change and plan of care or health status</td>
</tr>
<tr>
<td></td>
<td>✓ SW will routinely raise question for each patient reported team assessment</td>
</tr>
<tr>
<td></td>
<td>✓ Consult with Nephrologist</td>
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</table>

**Changing a POLST**

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
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</thead>
<tbody>
<tr>
<td>1.</td>
<td>When a POLST is changed the word ‘VOID’ is written diagonally across the front and back of the document.</td>
</tr>
<tr>
<td>2.</td>
<td>The voided POLST is scanned into the patient's EMR and placed in the patient's/resident’s permanent record</td>
</tr>
<tr>
<td>3.</td>
<td>A new POLST is generated and signed/dated by the physician.</td>
</tr>
<tr>
<td>4.</td>
<td>Rationale for change is documented in the patient EMR</td>
</tr>
<tr>
<td>5.</td>
<td>The new POLST is scanned into EMR</td>
</tr>
<tr>
<td>6.</td>
<td>The new document accompanies the patient to their place of residence</td>
</tr>
</tbody>
</table>
APPENDIX B. POLST SCREENING TOOL

Name: ________________________________________________ Date: ______________

Do you live within the Bemidji Ambulance Service Area? Yes No
If the answer is no to the above question please stop taking screening tool, we cannot currently commit to a POLST being effective as physician’s orders outside the Bemidji Ambulance Service area. If the answer is yes – please continue.

Please answer yes or no to the following questions to help determine if this dialysis patient meets enough criteria for a Provider Orders for Life-Sustaining Treatments (POLST) conversation.

1. I would not be surprised if this patient died in the next 12 -18 months? Yes No

If the answer is yes to the above question please consider referring patient for POLST conversation, if the answer is no please continue to questions 2-7.

2. Is patient greater than 65 years old? Yes No

3. Is patient serum albumin less than 3.5g/dL? Yes No

4. Does patient have peripheral vascular disease? Yes No

5. Does patient have ischemic heart disease? Yes No

6. Does patient have dementia? Yes No

7. Does patient have chronic pulmonary disease? Yes No

Please consider referring patient for POLST conversation if patient has four or more questions that were answered with a yes on this screening tool.
# APPENDIX C. BUDGET FOR POLST IMPLEMENTATION

Estimated Budget for Implementation of POLST into Bemidji Dialysis Unit

<table>
<thead>
<tr>
<th>Resource</th>
<th>Estimated cost</th>
<th>Funding source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Training costs for facilitator</td>
<td>$1500</td>
<td>NMF grant</td>
</tr>
<tr>
<td>Printed materials including instruments, informed consent forms, flyers</td>
<td>$200</td>
<td>NMF grant</td>
</tr>
<tr>
<td>Rights to print Respecting Choices information sheets about CPR, artificial nutrition and hydration, and supports for breathing</td>
<td>$200</td>
<td>NMF grant</td>
</tr>
<tr>
<td>Sanford wages to complete POLST conversations and POLST meetings</td>
<td>$200 (per conversation)</td>
<td>Dialysis Unit</td>
</tr>
</tbody>
</table>

*NMF – Northwest Minnesota Foundation*
APPENDIX D: IRB APPROVAL

NDSU NORTH DAKOTA STATE UNIVERSITY

May 14, 2014

Dr. Tina Lundeen
Dept of Nursing
Sudro Hall

Re: Your submission to the IRB: “POLST Implementation at Sanford Health Bemidji Dialysis Unit”

Research Team: Jenna McKeen

Thank you for your inquiry regarding your project. At this time, the IRB office has determined that the above-referenced protocol does not require Institutional Review Board approval or certification of exempt status because it does not fit the regulatory definition of ‘research involving human subjects’.

Dept. of Health & Human Services regulations governing human subjects research (45CFR46, Protection of Human Subjects), defines ‘research’ as “…a systematic investigation, research development, testing and evaluation, designed to contribute to generalizable knowledge.” These regulations also define a ‘human subject’ as “…a living individual about whom an investigator conducting research obtains (1) data through intervention or interaction with the individual, or (2) identifiable private information.”

It was determined that your project does not require IRB approval (or certification of exempt status) because the implementation does not include a systematic investigation designed to develop or contribute to generalized knowledge. The board makes this determination conditional on your assertions that there will be no systematic data collection in order to assess the effectiveness of the implementation.

We appreciate your intention to abide by NDSU IRB policies and procedures, and thank you for your patience as the board has reviewed your study. Best wishes for a successful project!

Sincerely,

Kristy Shirley

Kristy Shirley, CIP; Research Compliance Administrator
February 11, 2015

To Whom It May Concern,

Jenna Gross has been working with our Bemidji Dialysis unit to initiate an ongoing POLST program. We feel this program is very valuable to this patient population because of their morbidity risk related to multiple co-morbidity diagnoses. I continue to support this program pilot in this dialysis unit and plan to mobilize this program to other Sanford Dialysis units once we have finalized the processes here.

We have been delayed from full implementation of this program because of unforeseen barriers. One barrier is related to our staffing. One of the nurses who was POLST trained has resigned from the unit. This unit is also experiencing a few medical leaves. For these reasons, we are currently lacking enough human resources in the next couple of months to move this project forward. I will support the POLST training of one more employee to replace the nurse who resigned.

A second barrier has been lack of support space within the unit. The volume of patients we serve has increased dramatically. Therefore, we have requested a space analysis of the unit to expand the number of stations available for treatment as well as adjacent support space. Having additional support space will allow us adequate space to have these private conversations. In the meantime, we have discussed options and will utilize conference rooms within the medical center until such a time that we have this space within the dialysis unit.

We appreciate Jenna’s work and continue to support the original plan she presented. We will make all attempts to remove the barriers and complete full implementation of the POLST program. If you have any questions, please feel free to contact me.

Sincerely,

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APPENDIX F. SUPPORT LETTER FROM POLST COORDINATOR

Greetings Tina and Dean,

ESRD patients and their decision makers are ideal candidates for comprehensive patient centered advance care planning (ACP). Our ACP program is and will remain committed to the ongoing work needed to aid the Sanford Bemidji Dialysis unit in developing a functioning POLST paradigm program based on a patient centered ACP approach. Jenna played a significant part in developing our initial training and referral process, which laid solid groundwork in educating staff and developing workflows. However, several substantial barriers stalled the process just short of actually engaging patients/decision makers in conversations, creating ACP plans that reflect their needs, and completing POLST documents. Clearly, the next steps are very achievable once the barriers we identified are addressed. These barriers include 1) staff’s inability in the midst of their workloads to feel they had time to initiate what could well be a 90min plus conversation, 2) the lack of a private setting to have the conversation, and 3] hesitancy with in healthcare to change practice patterns to engage patients in addressing end of life issues. All three of these issues are not unique to Dialysis but are commonly experienced in other sites also.

Jenna’s commitment to finding solutions to these barriers is an essential component moving the process forward. As in other sites, having an ‘insider’ with working relationships with clinical and management staff, someone like Jenna, has been the key catalyst to moving to the next level of engaging in ACP conversations and document completion. Her taking the initiative here may well help this program blossom. Nancy Hall and I had a conversation with Jenna that really got to the heart of the issues keeping POLST facilitators from taking the next step in Dialysis.

First, staffing workloads - we identified the need for POLST facilitators to be reimbursed for their time to have these conversations. This will enable these conversations to happen outside of their regularly scheduled hours. Jenna’s contacting Maria Regnier, Director of Nursing Services [the person ultimately responsible for the dialysis budget] to advocate for and confirm that facilitators will have their time reimbursed is essential to the process moving forward. This would also help hesitant staff, giving them the opportunity to imagine having the conversation in a successful way that does not put an undue strain on other patients, their peers, or themselves.

Second, the length of the conversations, the need for privacy, and the often limited mobility of dialysis patients make it important to find a place to comfortably have the conversation. Currently, there is no obvious solution to this problem. Jenna’s ability to engage the Dialysis leadership in making this a priority is key to having conversations and completing documents.

Third, in addressing the hesitancy of staff in beginning a new practice pattern, Jenna’s connecting the Dialysis social worker with a colleague who is currently doing POLST facilitated conversations is positive move forward. Also, Jenna had a conversation with a POLST facilitator who is very willing to have these conversations. This gives us an opportunity to support the facilitator once compensation issues are clarified. Finally, Jenna has helped to
identify additional Dialysis staff with therapeutic listening skills and interest in becoming POLST facilitators.

I’m very hopeful that Jenna’s ongoing leadership in the POLST program and Dialysis unit are helping things take that next, most important step. The Bemidji Area Advance Care Planning team will continue to build on Jenna’s efforts to make POLST-type ACP a standard of care in the Sanford Bemidji Dialysis unit.

Thanks

Mark Papke-Larson, MDiv. BBC

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APPENDIX G. EXECUTIVE SUMMARY

Provider Orders for Life-Sustaining Treatments (POLST) is a tool developed in Oregon in the early 90’s to help ensure that patient end of life wishes are honored. POLST is considered an alternative to traditional advanced directives and serves as a medical order once created. The POLST program was created in hopes that seriously ill patients could have their wishes both known and honored near and at the end of life (POLST, 2012). Numerous states throughout America have adopted this new advanced care-planning tool. However, many states have created their own versions to better meet the state’s needs and regulations. Minnesota developed its own version of the POLST and is actively being used throughout the state. The community of Bemidji, in northern Minnesota, has developed a POLST organization and is in the implementation stages of providing POLST to its community. One of the identified areas of need for a POLST program in the Bemidji area is the dialysis unit.

The Patient Self Determination Act (PSDA) enacted in 1990, was developed to increase individual decision making regarding life-sustaining treatments and advanced directives (Ascension Health, 2013). However, new regulations such as the PSDA have proven unsuccessful as only one out of five Americans has an advanced directive of any kind. Even those who have created an advanced directive have faced limitations. However, POLST has been having positive outcomes with patient’s preferences being honored at the end of life (Robley, 2009). POLST is a portable document that accompanies patients through the healthcare system. It is more specific and includes six sections of various life-sustaining treatment options (Vawter & Ratner, 2010). Little is known about the use of POLST among dialysis patients in Bemidji, Minnesota. The suffering and economic consequences for dialysis patients can be
overwhelming but are predicted to improve with the use of the POLST program (Benson & Aldrich, 2012).

Studies have shown that only a small percentage of the American population has an advanced directive of any kind (Evan, 2011). Many times the document cannot be located and often the family is unaware that there was an advanced directive. For the small percent that do have an advanced directive, often the document is not followed because the form does not address important treatment options (Bell, 2011). However, POLST is a newer and relatively easy tool that can serve as an antidote to the limitations faced with traditional advanced directives (Robley, 2009). Compared with other advance directives, the POLST program is more accurate at conveying end-of-life preferences (National, 2006). The benefits to the POLST program discovered in the articles are that it not only allows patients to decide to restrict end of life interventions but also choose interventions that are more specific.

Patients receiving hemodialysis are considered to be chronically ill and typically suffer from other illnesses. Despite the fact that there are high mortality rates among dialysis patients, there is little research that has been done to study hemodialysis patient’s preferences at the end of life (Davison, 2010). Nearly every nurse, social worker, midlevel provider, technician, or nephrologists working in an acute or chronic dialysis unit has a story to tell about a patient who continued dialysis despite severe dementia or an expected poor prognosis (Holley, 2011). Dialysis units and dialysis staff may be able to avoid some of these situations through advanced care planning and advanced directives such as POLST.

The Bemidji POLST organization was created to start providing the POLST program to seriously ill patients in the Bemidji area. The POLST program is just one part of the advanced care planning process that will take years to implement. The Bemidji POLST organization has
already implemented POLST in numerous other healthcare settings in the Bemidji area. The Bemidji Dialysis Unit is one more area that the POLST organization hopes to implement POLST. The POLST organizations goal with the use of POLST is to improve patient outcomes near and at the end of life. The POLST organization in collaboration with the Bemidji Dialysis Unit has taken the necessary steps to implement the POLST program into the dialysis unit.

The POLST process for implementation into the Bemidji Dialysis Unit was developed to improve patient outcomes related to end of life preferences, patient and family satisfaction, nursing and provider satisfaction, and reduce unwanted financial costs. The dialysis administration was contacted and approved the idea of implementing POLST within the dialysis unit. Dialysis administration believed that POLST would improve patient outcomes and satisfaction.

The project for implementing POLST into the dialysis unit consisted of a number of steps. A process flow chart was developed to help dialysis staff with implementation of the POLST program. All dialysis staff and patients were provided education about POLST and its benefits. Department facilitators were trained on how to conduct a POLST conversation for the dialysis patients. A screening tool was developed to help guide the dialysis provider and staff in determining what dialysis patients met the criteria for a POLST conversation.

The funding for this project came from both the Sanford Bemidji dialysis unit and the Bemidji POLST organization. The length of this research project is still to be determined. The process of planning and educating started in October of 2013 and is still awaiting resolution of limitations before successful implementation.

Project success was determined by the effectiveness and usability of the process flow chart, education of the dialysis staff and dialysis patients, utilization of the screening tool, and
POLST implementation within the Bemidji dialysis unit. Evaluation of the process flow chart, education, and screening tool was conducted through informal feedback from dialysis staff, patient, and families.

The dialysis stakeholders provided positive feedback about the flow chart. However, the flow chart has not been used more than a few times. After the educational sessions, staff members commented that they gained knowledge about the POLST program and were happy to have been educated on this topic. The dialysis stakeholders provided feedback that the POLST screening tool can serve as a guide to identify dialysis patients who are candidates for a POLST conversation. Due to unforeseen circumstances, the project was not implemented. A plan has been developed to resolve the barriers that prevented the project from moving forward. This plan will be shared with the Bemidji POLST organization and the dialysis stakeholders who will be responsible for taking over the project.

Once the barriers have been resolved and implementation of the POLST program into the Bemidji Dialysis Unit occurs, further research will be needed to evaluate the success of the POLST among dialysis patients. In the future, the POLST process should become apart of the dialysis admission process for all patients by screening everyone for a POLST conversation.

Dissemination of the results of the project results will be communicated to the Bemidji POLST organization along with Bemidji dialysis stakeholders for the future implementation of POLST. Results will be communicated by the Bemidji POLST organization to area providers at local conferences as they continue to implement POLST throughout the community of Bemidji. Results will also be presented at the North Dakota State University poster presentation in April 2015 to area nurse practitioners.