Enhancing Knowledge Regarding Pain Management : Empowering Childbearing Women to Make an Informed Consent

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DNP Scholarly Project Final Approvals

The DNP student Aisha White **and the Scholarly Project** Enhancing Knowledge Regarding Pain Management: Empowering Childbearing Women to make an informed **meet all the requirements for the degree of Doctor of Nursing Practice at University of Saint Francis-Fort Wayne, IN.**

Date of Final Approval: 6/24/22

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Abstract

Background: Epidural and pain management options discussed during the prenatal stage empowers women to make an informed decision during the labor phase. Providing tools that women can refer to during pregnancy encourages shared decision making. **Methodology:** The purpose of the Doctoral Nursing Practice project was to provide education and increase knowledge regarding epidurals and pain management options to childbearing or pregnant women. In childbearing and pregnant women over the age of 18, does prenatal education on epidurals and intravenous pain management options increase knowledge to make an informed decision regarding pain control during labor? **Findings:** The educational project was implemented at Women's Health Advantage in Bluffton, Indiana. A pretest, educational brochure, and posttest was used throughout the implementation process. The average pretest score was 46% and the posttests average score was 73%. The percent of change between the pretest and posttest showed an increase of 36%. **Implications:** Childbearing and pregnant women lack knowledge regarding epidurals and pain management options. Women of childbearing age need to understand what their options are for delivery to make an informed decision. Future recommendations involve providing educational brochures on the obstetric units to allow time for the pregnant women to decide the type of pain management desired. Involvement from childbearing and pregnant women encourages shared decision making.

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Increasing Knowledge in Childbearing Women

Chapter 1: Introduction Problem

Problem Statement

According to a national U.S. study of mothers' child-birth experiences, 67% of women report receiving epidural analgesia for pain management (Goldberg & Shorten, 2014). Epidurals involve using local anesthetics with or without opioids to provide a reversible loss of sensation from the umbilicus to the feet. The usage of epidurals may assist expecting mothers in decreasing the fear of pain associated with labor. Communication and health teaching on epidurals or pain control options help provide better maternal health outcomes (Hughes & Hughes, 2016). Prenatal education can equip pregnant women to make informed decisions regarding their care (Alakeely et al., 2018). Fear and anxiety, along with the labor process, could present devastating consequences for pregnant women and their newborns.

The misinformation about epidurals and pain management passed down from generation to generation can make it difficult for women to make their own health care decisions (Goldberg & Shorten, 2014). Misconceptions include epidurals cause permanent back pain or paralysis in the mother, epidurals harm the baby, epidurals can slow down the labor or increase the risk of c-section, epidurals interfere with the birth experience, and there is a limited window of time when you can get an epidural are to name a few misconceptions (American Society of Anesthesiologist, 2014). Misinformation may be a challenge to dispel for healthcare providers. Changing the thought process will need to take an intentional effort to educate pregnant women properly. Communication and addressing those compelling misnomers among women may help increase knowledge to increase informed decision-making (Meeks, 2016). Although childbirth is

a normal process, it is still a life-altering event that many may not be prepared for, even with the second or third baby. Each pregnancy brings its own set of fears and questions.

The concern not only resides within the pregnant mother. Fears are also prominent in the partner and other family members. The lack of knowledge makes it more important to educate the whole family. Teaching tools best suited to the patient's learning style are essential when introducing new knowledge. The teaching tools create an avenue for repetition and easy access to evidence-based care. Anesthesia providers are the sole providers in establishing epidurals and managing pain.

Last-minute decision-making creates fear due to the lack of understanding of how and why epidurals are used to manage pain (Soliday et al., 2013). Up to 20% of women will develop a fear of childbirth (Poggi et al., 2018). Fear and stress concerning the unknown regarding pain management could impact a pregnancy due to maternal complications (Greer et al., 2014; Poggi et al., 2018). Informed decision-making regarding epidural usage requires that anesthesia providers educate childbearing women before pregnancy or before arriving to the hospital in labor (Goldberg & Shorten, 2014).

Overall, education empowers pregnant women to make informed decisions regarding care. Pregnancy is a fascinating time for mothers but can also produce anxiety throughout the process. As anesthesia providers and healthcare professionals, it is our responsibility to equip patients with the tools necessary to make a sound decision on the most meaningful matters. Educating patients will require effort and communication from the anesthesia provider to ensure knowledge is enhanced related to pain management.

PICOT Question

In childbearing and pregnant women over the age of 18, does prenatal education on epidurals and intravenous pain management options increase knowledge to make an informed decision regarding pain control during labor?

Background of the Problem

Epidurals are agents that have been used for many years to help women manage childbirth. Epidurals remain popular, safe, and provide effective pain control (Nagelhout & Elisha, 2018). Local anesthetics help mitigate pain, but local anesthetics do not relieve pressure. Education on what is expected before labor helps to set proper expectations.

Educating childbearing women on the risks and benefits of pain management before the patient arrives for an epidural at the hospital is important(Meeks, 2016). An informed and shared decision-making process is imperative to allow pregnant women to make informed decisions. The patient and provider relationship begins with communication. Without prior evidence-based knowledge, women typically receive their information from family and friends. These preconceived notions can produce unnecessary fears related to pregnancy and childbirth (Goldberg & Shorten, 2014). Education in the prenatal period is essential in setting patient satisfaction and expectations for delivery (Meeks, 2016).

Labor pain is a concern to laboring mothers. Worrying about potential pain can place stress on the mother and baby. Labor pain is very distractive by nature. Laboring women are presented with opportunities to make decisions regarding pain management in the midst of pain. Making decisions once pain has set in could potentially alter decision making (Cheng et al., 2020). Once labor pain has started, it is still necessary for the patient to consent to care. Often the decisions are made by a family member or partner, and these persons may not have discussed

what the laboring mother wanted once in pain. The outcome of providing last-minute decision-making at the time of birth may be uninformed responses. The expectant mother has adequate time to discuss pain control and ask questions before delivery, and the mother may be more apt to develop a safe and effective plan.

Shared decision-making (SDM) requires ample opportunity to process new information and decide based on the latest information delivered. When SDM is initiated early, possible benefits and complications are better understood (Cheng et al., 2020). At the point of education, pregnant women may take the time to understand how an epidural relieves pain. In the study by Cheng et al., (2020), it was shown that women involved in SDM experienced a higher tolerance to pain (p.11).

Shared decision-making increases patient's satisfaction (Cheng et al., 2020). Allowing women to gain an understanding of pain management options prior to the need to make pain management decisions increases patient involvement in care (Cheng et al., 2020). Misconceptions regarding epidurals often come from friends and relatives who have had unpleasant experiences (Alakeely et al., 2018; Cheng et al., 2020). Prenatal education eradicates the negative information patients receive and provides evidence-based knowledge (Togioka et al., 2019).

Needs Assessment/Practice/Knowledge Gap

Gaps in the literature and practice include childbearing women receiving education on pain management options at the time of labor. However, less education is being conducted in the prenatal stages of pregnancy (Goldberg & Shorten, 2014).

Dr. Austin Finklea has been a physician at Bluffton Medical Group since August 2015. Dr. Austin Finklea is an obstetrician and gynecologist specializing in the women's reproductive

tract, pregnancy, and childbirth. Dr. Austin Finklea has over ten years of experience in obstetrics. When speaking with Dr. Austin Finklea about prenatal education on pain management before patients are admitted to the hospital, he mentioned that anesthesia education usually occurs for all the doctor's patients when they arrive at the hospital for delivery. Dr. Austin Finklea's office manager stated that she tries to answer the patient's questions as best she can when pregnant mothers ask about epidurals and pain management. However, the office manager and Dr. Austin Finklea both agree that prenatal education is a gap in practice, and education should occur earlier in the prenatal stage.

Currently, the anesthesia practice at Bluffton Regional Medical Center (BRMC) consists of speaking with 100% of the mothers while in labor in the hospital preparing for in conjunction with Dr. Austin Finklea's office, current practice at BRMC presents patients with a short amount of time to decide on an epidural or pain management options. Most often, women at this stage are in an incredible amount of pain and may not be able to make a clear, conscious, and informed decision regarding the need for an epidural or other pain management options. Before labor, proper education is required for a laboring mother to decide on pain control methods (Cheng et al., 2020; Meeks, 2016). Education included speaking with the mother during her pregnancy about epidurals and pain management options, the benefits, and the risks. When a mother is given information before childbirth, it equips the woman with the proper tools and knowledge to make the best decision that the mother would like for delivery (Meeks, 2016). The tools used were a short comprehensive review of epidurals, the risks and benefits, possible complications, and other pain management options (Togioka et al., 2019). The tools also provided the mother a resource to return to when questions arose later in pregnancy. The brochure or tools such as videos were given to the pregnant mother in the second or third trimester of pregnancy.

Delivering the tool during pregnancy gave the pregnant women time to ask questions before delivery (Togioka et al., 2019). Preferably, an anesthesia provider provides the informational tool so that pregnant women have first-hand communication with an anesthesia provider and understands the provider's role before delivery. A process that provides information to the patient regarding epidural usage and pain management is necessary for patients to make sound decisions regarding epidural use (Borrelli et al., 2020; Cheng et al., 2020).

DNP Project Overview

Scope of Project

The project's scope provided education, pre and posttests to participants on epidurals and pain management options at Dr. Austin Finklea's office. Bluffton Medical Group works with BRMC to manage obstetric and women's health needs. CRNAs working at BRMC help manage pain for Dr. Austin Finklea's obstetric patients. Emphasizing that the DNP project provided education only and did not persuade participants to choose pain management during labor. The purpose of the epidural and pain management education was to incorporate shared decision-making if the participants wanted to select an epidural or intravenous medication during labor.

Stakeholders

The stakeholders included Aisha White, MSN, SRNA, the project manager; Dr. Megan Winegarden, project advisor; Dr. Cotrell, academic advisor; Morgan Wisenbaker, CRNA, project mentor at Bluffton Regional Medical Center; Dr. Austin Finklea with Bluffton Medical Group, and the University of Saint Francis' faculty and staff.

Budget

Cost

In kind cost were provided by the faculty and staff of the University of Saint Francis, Bluffton Regional Medical Center's CRNAs, and the office staff of Dr. Austin Finklea's office. The direct costs of the DNP project were approximately $1.30 per person. The SPSS statistics version 28 was $58.99. The plan included 20-30 participants. The total direct cost was $100-$120 for the entire project.

Description of Resources

The resources for the educational DNP project included folders, copies of tools such as the trifold educational pamphlets, which were $0.35 per pamphlet, and pretest and posttest.

Process and Outcomes

General Timeline

The project design began in January of 2021 with discovering the topic for the DNP project. Narrowing the topic with the project advisor, Dr. Winegarden. After the topic was established, the project manager needed to assess the need at Bluffton Regional Medical Center. The assessment process spanned over January 2021 through May 2021. An introduction letter was sent to Dr. Austin Finklea and Morgan Wisenbaker, CRNA to introduce the project manager and the project idea. At the same time, the project manager discussed the project idea with Dr. Louck, Nurse Anesthesia Program Director, about the importance of the topic. Literature review was completed over four months, from April until July 2021. The CITI training was also completed (Appendix A).

Collaboration with the project facility, project mentor, project advisor was imperative to keep everyone up to date on the progress. The following steps were to prepare and submit for IRB approval near October 2021. After IRB approval and the permission to move forward, implementation of the DNP project began January 2022. Data collected was reviewed, and the results were disseminated in June of 2022.

Setting and Target Population

Dr. Austin Finklea's practice consisted of serving approximately 200 patients which were obstetric patients, women of childbearing age and women who have gynecological needs. The DNP project consisted of 20-30 participants. The educational session was a one-day event. While participants were waiting for their appointments in their private rooms, education took place on epidurals and pain management options for those who wanted to participate. Dr. Austin Finklea's, office was located in Bluffton, Indiana, which is an entity with Bluffton Regional Medical Center.

Expected Outcomes

Participants completed an informed consent for participation within the doctoral project. Next, the participants completed a paper pretest. After the pretests were collected, an educational presentation was completed by the project manager. All information was deidentified by using a number system for the pretest and posttest. Once the educational presentation was completed the participants were given a posttest. Privacy and confidentiality were achieved by securing data in a secured locked file. A 20 percent increase on the posttest scores from the pretest scores was expected. Participants were asked to allocate 10-15 minutes of their time for the completion of the pretest, educational presentation, and posttests.

Risk Analysis

Risk Analysis

No immediate and or long-term risks to participants who participated in the DNP quality improvement project. Strategies to mitigate any risks were considered. Informed consents were obtained from each participant (Appendix B). No benefits, compensation, intended use of deception related to the participants that were included in the DNP project. The pre and posttest were anonymous. Participants could choose to withdraw from the quality improvement project at any time without penalty. Participation was voluntary. The data was stored for one year, June 2023. All data and records were shredded in compliance with HIPAA. Lastly, the project did not include any intent to use audio, video, or other forms of recording throughout the DNP project. The project did not include physical studies, deception, or compensation during the implementation of the doctoral project.

Chapter 2: Synthesis of Supporting Evidence and Project Framework

Relevant Theory and Concepts

Frameworks/Models/Concepts/Theories

Individuals must believe they can change and that they have the ability to change. Social Cognitive Theory is to understand or predict an individual or a group's behaviors to identify methods by which action can be modified or altered (Bandura, 2005). Utilizing interventions aimed at personal development, behavior pathology, and health promotion will encourage pregnant women to participate in their decision-making related to pregnancy and pain control options.

Anesthesia providers provide cognitive remodeling occurs through education. Educating patients with the appropriate knowledge to make informed decisions regarding epidurals and pain management helps to change misconceptions regarding pain control during labor. Modeling is also a way to promote a new way of doing things. Creating new knowledge takes creativity and a fresh perspective. Misconceptions are often created based on wrong information. The wrong information then gets repeatedly misrepresented, which then instills belief. Cognitive skills are needed to remap the current thinking engraved in people's minds and thoughts (Bandura, 2005). If one verbalizes the thoughts and takes the time to speak with others about what one believes will help to transform ideas.

Behavior characteristics are what shapes one's thoughts. According to Bandura (2005), our minds were once compared to a computer, but lacking was the ability to have consciousness capabilities. Although computer functioning is similar to human thinking, it can never be compared to the perceived emotions in one's mind (Bandura, 2005). In order to change beliefs, it is necessary to replace misconceptions with new knowledge. The new knowledge being replaced is not replaced very quickly. Learning new knowledge may take a repetitive motion of repeating the same thing until that old thought process has changed.

Four major components relate to social cognitive theory. Those components are intentionality, forethought, self-reactiveness, and self-reflectiveness (Bandura, 2005). Intentions center plans of action. Future thinking helps to shape goals as one progresses forward. However, forethought is the ability to set goals and anticipate consequences (Bandura, 2005; Poggi et al., 2018). As these concepts relate to pregnancy, it is imperative to understand that positive or negative thoughts are derived prior to the pregnancy.

Self-reactiveness involves motivation to obtain the desired goal (Bandura, 2005). Self-reactiveness comes from planning and taking the information on a matter and executing it to achieve results. Self-reactiveness leads to self-reflective action that is a result of self-examination. Self-reflectiveness, as change occurs, is when new knowledge is introduced. The new knowledge may take a while to change the influences that promote choice.

When education is introduced to childbearing-age women, it is critical to understand that thoughts and beliefs have already been established. When providing education to pregnant women, it is vital to develop excellent communication and an atmosphere of trust (Meeks, 2016; Cheng et al., 2020).

Social cognitive theory and education go hand in hand when providing new knowledge. Communication helps to create new ideas and new expectations with the hopes of dismissing misconceptions (Meeks, 2016). Change requires a repetitive approach to provide effective communication while lessening unrealistic expectations, fear, and anxiety.

Literature Review

The literature review included searching several databases that incorporated CINHAL, EBSCO, ProQuest and PubMed. The key terms used during the search were “prenatal education”, “prenatal education and epidurals”, “epidurals, “informed consent and pain management for labor” epidural and fear, labor pain and fear. The project manager also reviewed the articles and the citations used to formulate the authors research studies. A total of 10 additional articles that were related to prenatal education and epidurals. The publication date for the articles that were searched ranged from 2016-2021. The categories included unfiltered or raw article databases, filtered evidence resources, guideline resources and other search resources.

What is an Epidural?

According to the American Society of Anesthesiologists (2014), more than 60 percent of women use epidurals for labor. Epidurals operate in a way that provides a continuous infusion of medication to provide pain relief. Epidurals are placed in the epidural space, allowing for a controlled volume of anesthetic to be injected into the space to provide pain control (Nagelhout & Elisha, 2018). Labor epidurals provide patient satisfaction as it relates to pain control. Labor analgesia satisfies the obstetrician and the patient in providing optimal conditions for the birth of a baby. In an emergency, an epidural can be used as anesthesia for a cesarean section (C-section) (Nagelhout & Elisha, 2018). Preparation and positioning are crucial when it comes to epidural placement. Positioning is vital when providing the best care for the patient to receive an epidural. Positioning helps to transverse the epidural needle in the correct direction towards the epidural space to inject the local anesthetic. The local anesthetic used is a low concentration medication that provides a numbing sensation to rid pain; however, the epidural does not get rid of pressure (Jones et al., 2012; Nagelhout & Elisha, 2018). Pain versus pressure is an important concept to discuss to ensure that patients understand the difference between the two.

A laboring mother may experience a plethora of pain signals during birth. Labor consists of three stages. The first stage labor begins with contractions; the second stage starts with the baby's delivery, and the third is the delivery of the placenta. The first and second stages of labor produce an immense amount of pain. These stages may require a form of pain management. If the mother is proceeding with a vaginal delivery, epidurals may be an option (Jones et al., 2012; Nagelhout & Elisha, 2018. However, epidurals are not the only form of pain management. The mother is also able to receive intravenous medications as well. A laboring mother must consent to receive an epidural. Epidurals are small catheters (Nagelhout & Elisha, 2018) placed in the spine into the epidural space. The epidural allows for the anesthesia provider to inject medication

throughout the laboring experience. According to the patient's individual needs, the local anesthetic dosing can be adjusted for labor (Jones et al., 2012; Nagelhout & Elisha, 2018).

How do Epidurals Work

Once an epidural catheter is placed within the epidural space, a local anesthetic is injected to provide pain relief. The epidural level is determined by the amount of local anesthetic injected within the epidural space. Epidurals may create a one-sided block. Techniques may be initiated that the anesthesia provider performs to prevent a one-sided block (Jones et al., 2012). One-sided blocks occur when the numbness felt after the medicine has been injected is noted more on one side of the body than the other.

The effects of an epidural are more about reducing pain with no impact on pressure sensations. An epidural works to provide a numbing sensation. The pelvis region has nerves that would typically note pain. In this regard, epidurals block that response to pain by blocking the brain's receptors to pain (Nagelhout & Elisha, 2018). One misconception is that epidurals relieve all pain. Epidurals decrease pain responses, but a laboring patient may still feel the pressure. Pressure and pain are different sensations noted within the pain response. Pressure is a sensation of tugging or a sense of passing something large, but the pain receptors are blocked. The epidural may limit your use of the movement of legs and feet while the epidural is in place. However, once delivery is over, the epidural may be removed, and the sensation of touch and feeling will return when medication entirely wears off (Nagelhout & Elisha, 2018).

Benefits and Risks of Epidurals

The benefits of an epidural include reduction of labor pain and rest during a long labor. The epidural can be converted into a surgical epidural and does not prolong labor. A surgical

epidural means that if the pregnant mother needs to have a cesarean section, the medicine can be increased to cover surgical pain. Relief of pain is the primary benefit of epidural usage (Nagelhout & Elisha, 2018). Epidurals do not affect the baby or breastfeeding.

The risks of epidural use include infection, nerve damage, wrong epidural placement, headache, and may cause a reduction in contractions. Due to epidural usage, mothers may experience leg numbness, trouble urinating, and low blood pressure (Nagelhout & Elisha, 2018). However, these risks are minimal.

Childbearing Fears

Stress and fears among mothers and even their partners are a large area of concern. Such worries can promote unnecessary stress on the growing fetus as well. Fears among women studied by Greer et al., were the risks associated with vaginal delivery, child injury, physical harm of mother, coerced into doing something that may harm the baby, and unable to cope with the pain (Greer et al., 2014).

Greer et al., (2014) found that fear of labor was the predominant factor. The fear was geared around that patient being coerced into something that would harm them, past experiences, their partner's preconceived notions, prior health experiences, and fear of having a cesarean section. Greer et al., (2014) pointed out the importance of resources and education before delivery to help women cope with childbirth. The more positive the communication related to childbirth from the healthcare providers will help prepare for a typical birthing experience.

While childbirth may promote fear in women, education beforehand is an adaptive measure to help patients cope (Duncan et al., 2017). Setting expectations while relinquishing negative thoughts and behaviors aids in a healthier outcome for the baby and mother.

Epidural Usage

Aversions to epidural usage may come from past information on the increased chance of having a cesarean section. Due to the misconceptions of epidurals, 94% of women held off asking for epidurals (Ituk & Wong, 2017). The overarching response believed that the epidural would slow down labor (Ituk & Wong, 2017). Echevarria et al., (2017) found that 70% of women identified that the opinions of those closest to them made a significant impact on their decisions regarding epidurals. Ituk & Wong (2017) notes that minorities do not attend prenatal education classes as often as non-black or non-Hispanic mothers. As anesthesia providers, we cannot rely on others to keep obstetric patients up to date on the most relevant information regarding pain options and pain management.

Anxiety in childbirth can pose or impede the development of a child (Fernández-Campos et al., 2017). Anxiety may also cause physical changes to the mother due to the anticipation of a harmful situation. The fears are instilled within a mother through external and internal stressors (Fernández-Campos et al., 2017). Fernandez et al., (2017) reveals that anxiety decreases significantly after the use of an epidural. The thought of receiving an epidural can bring on fear; however, the results proved that epidurals decrease fear in the laboring mother (Fernández-Campos et al., 2017).

Borrelli et al., (2020) found that women's thoughts on receiving an epidural interfered with their partner's opinions, prenatal classes, media, the intensity of pain, and maternal exhaustion (p. 3286). Education and epidural usage increased once a variety of modalities were combined.

Women were satisfied once they received the epidural. Women were more relaxed and wanted to discuss labor with their providers due to the decrease in pain. Also, Borrelli el al.,

(2020) found that women stated that there was a lack of information on epidurals, a lack of information on side effects on epidurals and women felt that the side effects were downplayed (Borrelli et al., 2020).

Preanesthetic consultations are not required at this time in current practices. The anesthesia provider sees the patient on the day of delivery. Education provided the day of labor may cause some miscommunication as women may already be in pain and not think as clearly. Open communication will help to demystify some of the negative information. Optimally, honest communication should begin prior to the day of delivery. Effective communication is thought to improve patient outcomes. Communication can be provided during the prenatal stage that includes the risk and benefits regarding epidurals (Borrelli et al., 2020). The earlier education is provided to mothers, the easier the mother can make an informed decision regarding epidurals

Shared Decision Making

The advantages of shared decision-making allow patients to feel a sense of control in their healthcare. In the pregnancy process, women want to decide what is best for themselves and their babies (Cheng et al., 2020). Empowering childbearing women with information is vital in improving outcomes and reducing stress during pregnancy. Giving women pamphlets on epidurals with accurate information prior to delivery is vital. Providing videos as tools for women to review on their cell phones is also a critical factor in improving knowledge (Togioka et al., 2019). Access to such tools will allow the pamphlet to be reviewed by the family (Togioka et al., 2019). Asking follow-up questions to ensure the information provided was understood is crucial in assessing understanding.

Shared decision-making (SDM) is shown to improve the understanding of complications that could occur based on an epidural. Epidurals can cause some side effects; however, if the

pregnant women know of these ahead of time and have had time to review them on their own increases the awareness of the complication. According to Cheng et al., (2020) a clearer picture of what might happen after the procedure may demolish fears or unrealistic expectations if pregnant women receive detailed, informative education on epidurals (Cheng et al., 2020).

SDM will help to eliminate misbeliefs and distinguish reality. Expectations can only be met by way of communication. Communication will dissolve the negative fallacies that were previously learned. Cheng et al., (2020) stated that when pregnant women were involved in the shared decision making, there was a reasonable expectation that the women had to tolerate birth (Cheng et al., 2020). SDM increases satisfaction, which occurs when someone can take part in their care (Borrelli et al., 2020; Cheng et al., 2020).

Summary of Supporting Evidence

Overall, education is vital in reducing fears among pregnant women. Fear and anxiety increase stress in a pregnant woman (Greer et al.,2014). SDM is vital in helping to reduce stress among childbearing women (Meeks, 2016). SDM allows women to have a part in their birthing process. SDM will help to increase patient satisfaction and outcomes.

Epidurals do come with some risks and benefits. However, epidurals have proven to be safe for laboring mothers (Nagelhout & Elisha, 2018). As providers support patients in their decision-making through education, patients become more confident in their decision-making skills. Anesthesia providers and obstetricians may work together to provide a collaborative approach in serving the patients.

Childbearing women can benefit from a reduced anxiety state when receiving an epidural. Childbearing women must understand how epidurals work early in pregnancy to reduce fears. Over 3.7 million births occur each year (CDC, 2021) and addressing fear is imperative.

Fear and childbirth are linked to depression (Duncan et al., 2017). The earlier education happens in pregnancy, the sooner the expecting mother can reduce misconceptions and fear.

When women are informed and educated about their healthcare, women are more apt to make decisions that will impact their outcomes. Increased satisfaction, less anxiety, improved outcomes, decrease stress on pregnancy, and safe delivery of infants is the end goal when anesthesia providers and pregnant women participate in SDM (Alleemudder et al., 2015).

Tools such as pamphlets, videos, and culturally sensitive education should be provided prior to the onset of labor (Alakeely et al., 2018). Furthermore, decisions are typically decided based on information from friends and family. Past experiences from family and friends are not evidence-based. The importance of anesthesia providers delivering education that will promote an increase in knowledge to make an informed consent is vital.

Chapter 3: Project Design

Methodology

Project Design

A Quality Improvement (QI) Project was chosen to improve education delivery to childbearing women regarding pain management options during labor. The education involved evidence-based information provided in a pamphlet (Appendix E). The pamphlet was provided to childbearing women and women in their second and third trimesters to allow plenty of time to read and process the information. This QI project allowed for improvement in clinical care and patient satisfaction.

Ethical Considerations

Ethical considerations and human subject protection were top priority and have been evaluated throughout the project. The DNP project received approval from the University of

Saint Francis' Institutional Review Board on October 25, 2021, and faculty approval on November 11th, 2021. Support of the project was provided by the implementing facility, Bluffton Medical Group on August 30th, 2021 (Appendix C).

The DNP project had no immediate or long-term risks to participants. Strategies to mitigate any risks were considered. The project manager completed the Collaborative Institutional Training Initiative (CITI) program. Informed consents were obtained from each participant (Appendix B). The pre and posttest were anonymous. Participants had the choice to withdraw from the quality improvement project at any time without penalty. Participation was voluntary. The data will be stored for one year until June 2023 in a secured locked file. All data and records will be shredded in compliance with HIPAA one year after project completion.

The pretests and posttests will be kept confidential in a secured locked file. The locked file will only be accessed by the project manager. The process is in line with the Health Insurance Portability and Accountability Act (HIPAA).

Project Schedule

The project design and schedule (Appendix D) began in January 2021 with narrowing the topic with the project advisor, Dr. Winegarden. After the topic was established, the project manager needed to assess Bluffton Regional Medical Center. The assessment process from January 2021 to May 2021. An introduction letter was sent to Dr. Austin Finklea, OB/GYN and Ms. Morgan Wisenbaker, CRNA to introduce the project manager and the project idea. Morgan Wisenbaker is a current CRNA at Bluffton Regional Medical Center. Morgan Wisenbaker, the project mentor helped with facilitating the DNP project. The project manager discussed the project to Dr. Louck, Nurse Anesthesia Program Director, about the importance of the topic.

Literature review was completed over four months, from April 2021 until July 2021. The CITI training was also completed (Appendix A).

Collaboration with the project facility, project mentor, project advisor was imperative to keep everyone up to date on the progress of the project. The DNP process included preparing and submitting for IRB approval. IRB approval was received on October 25th,2021 (Appendix H). DNP faculty approval was received on November 11th, 2021(Appendix J). Implementation of the DNP project is scheduled for January 24, 2022. Data collected during the implementation phase of the project will be reviewed, and the results were disseminated by a PowerPoint presentation in June of 2022.

Implementation Methods

Intervention Plan

The DNP project was approved for implementation on October 25, 2021, by the USF IRB committee (Appendix H) and faculty approval was completed on November 11th, 2021 (Appendix J). The project manager transported all materials for the project to the implementing facility in a locked file. The materials included informed consents, pretests, posttests, and pamphlets. All materials had an unidentifiable two-digit number to keep responses confidential. The educational intervention began with the introduction of project manager's and other anesthesia providers in attendance. After consents were signed, the demographic questions and a pretest were given to all the participants. Once the demographic questions and pretests were completed, the educational presentation began. The educational pamphlet was given to all the participants to review and keep for future reference. The project manager reviewed content on the educational pamphlet to provide a clear understanding of the educational intervention. The participants were given a posttest to complete. All pretests, posttests and demographic survey

were collected and stored in a locked file maintained by the project manager. The participants were allowed to keep the pamphlet for later reference or to share with their families.

Educational Teaching Tool

The educational pamphlet was presented by the project manager (Appendix E). The educational pamphlet was a trifold brochure that includes a QR code to a video that correlates with the information on the pamphlet. The learning objectives of the educational session included:

- Identifying what epidurals are
- Identifying when epidurals are used
- Defining the procedure of an epidural
- Stating the risk and benefits of epidurals
- Defining IV pain management options
- Identifying the differences between pain versus pressure

The 10-15-minute educational session informed participants on the risks and benefits, the process, and the expectations of receiving an epidural or other forms of pain management.

Measures/Tools/Instruments

The project contained two aims with associated outcomes. The project aims and outcomes are presented in Table 1 (Appendix I).

Two aims were identified for the DNP project. The first aim entailed knowledge of risk and benefits. The two expected outcomes were that childbearing and/or pregnant women will express an increase of knowledge by 20% after the educational presentation prior to admission to the hospital. The second outcome for this aim was childbearing women and/or pregnant women will express an understanding of the risk and benefits by 20% post intervention.

The second aim was to improve patients' understanding of pain management as it related to childbirth. The two outcomes for this aim were that childbearing women would gain an increase in knowledge on the difference between pain and pressure by 15% post intervention. Also, childbearing women understand the difference between IV medications for pain and epidurals by 15% post intervention.

A pamphlet from Munro et al., 2018, "Having an epidural for pain management during labor was adapted with permission from the authors and was used to address the PICOT question, project aims and outcomes" (Appendix C). Additional information provided by Nagelhout & Elisha (2018) introduced intravenous medications for pain control during labor. The project manager received authorization to use the tool (Appendix D).

The pre and posttest were used to measure the outcomes. The pre and posttest consist of 11 questions that were identical for both tests (Appendix E). The questions were adapted from the study, "Having an epidural for pain management during labor" (Munro et al., 2018). Permission was given on April 23, 2021, by authors Sara Munro, PhD and Patricia Janssen, PhD, to adapt the pamphlet, pretest, and posttest questions (Appendix H).

The test answers were used to determine if the outcomes have been met. All folders, pretests, and posttests had a participant identification number with no identifying participant information. All data will be stored in a secured locked file to ensure participants confidentiality for up to one year.

Evaluation Plan

Measures and Data Sources

The population targeted were childbearing and pregnant women who chose to participate in the project by way of convenience sampling. In attendance was a CRNA who was employed

at BRMC. Demographic variables included maternal age (Scale), plans to use epidural (Nominal), type of birth (Nominal), education level (Nominal) and the source of their epidural knowledge (Nominal).

Once the implementation of the project was completed, a comparison of the pretest scores and the posttest scores were evaluated. The 11 questions were used to assess knowledge of epidurals, risks and benefits and pain management options. The pretest included an additional six questions, and the posttest included 11 questions due to the demographic questions being omitted.

Methods of Collection Data

After IRB and facility approval, communication was continued with Kristi Landis, RN. Kristi was the office manager at Bluffton Medical Group. The day and time chosen was based on a day with the highest patient volume for maximum participation. A CRNA at BRMC was in attendance as well to observe the educational session in order to ensure the continuum of care and sustainability was optimized. The intervention included providing education in a private patient room in the office while the patient waited to see the doctor. Once patients were registered for the prenatal appointment, informed consent, demographic survey, and pretest were given. All pretests and posttests remained anonymous and included an unidentifiable number to pair tests. An educational presentation was presented to the participants. Immediately following the educational presentation, the posttests were administered. Questions and answers were allowed after the posttest was administered if time allowed.

Prior to the delivery of the folders that obtain the pretest and posttest the project manager created a two-digit number that correlates with each packet. The two-digit number was placed in the upper right-hand corner of each form. The pretests and posttests were placed face down when

participants submitted the results. The project manager then paired the matching two-digit numbers that correlated the pretests and posttests. The identification numbers helped to maintain confidentiality of the participants and were assigned randomly.

The data was secured in a locked file with the project manager only having access. Survey responses were entered into the SPSS statistical software. The dataset was stored in a password protected University of Saint Francis OneDrive which the project manager only had access. No identifiable patient information was stored with the dataset or pre and posttests.

The percent of change provided information on whether there had been an increase, decrease or no change after the implementation of the DNP project. The participants were provided with the project managers contact information if feedback was desired by the participants.

Data Analysis Plan

The pretests and posttests scores were analyzed to determine if there was an increase in knowledge. The expected outcome revealed an increase in correct answers on the posttest after given the educational information. The goal was that participants were able to make an informed consent as it relates to their choice of utilizing an epidural or other pain management options for labor.

Dissemination Plan

The results were disseminated on June 23, 2022. The outcomes were presented to the project implementation site, stakeholders, DNP faculty and anesthesia faculty. The educational presentation discussed aims, outcomes and if the outcomes were met. The results and educational tools were shared and explained to those in attendance. All information was available in the form of a written executive summary. The data outcomes can be used to further improve the way

information is delivered to obstetric patients in order to improve pain management decision making.

Chapter 4: Results and Outcomes Analysis

Data Collection Techniques

Data for the scholarly project was collected using a pretest and posttest. A total of N=19 participants were included within the implementation of the project. The participants were given the pretests after completing their appointment registration process. Once the pretest was completed, the team leader met with each participant to provide an educational session using the brochure that team leader created on pain management. After the educational session was completed, the participants were given a posttest to complete and further questions regarding the pamphlet were answered. Lastly, each participant was placed in a room to see the doctor. The team leader collected the information from the participants and then stored the results in a locked file.

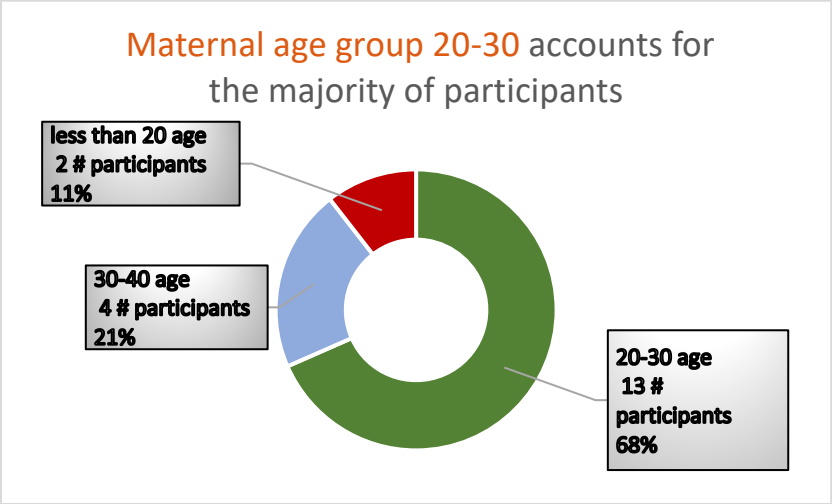
The education was provided on January 24th, 2022, at Dr. Finklea's office in Bluffton, Indiana. The patient count for that day was a total of 25 patients and of those 25 patients 19 participants agreed to take part in the DNP project. The others who opted out were above the age range, had a hysterectomy or felt as though they did not need any further information on pain management. After implementation, a total of 19/25 (76%) participants participated in the DNP project. The average amount of time it took to complete the pretest, educational session and posttest was on average 15-20 minutes.

The participants demographic variables collected included maternal age, pain management plan, level of education and where was pain management knowledge obtained

(Appendix F). The average age range of the participants were 20-30 which consisted of 13 (68%) participants.

Table 1

Age Groups of the Participants

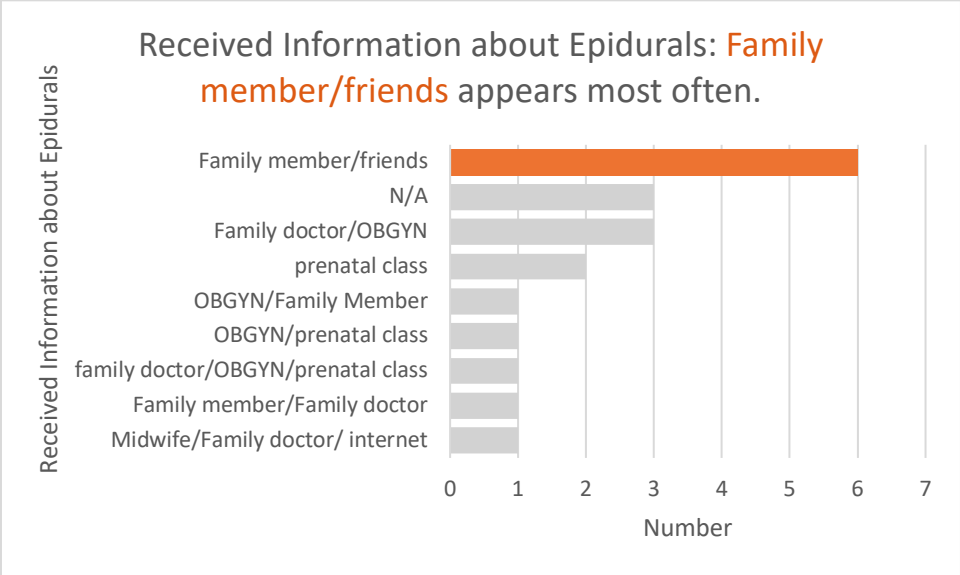


The second largest age group was 30–40-year-olds which made up 21% and 11% consisted of ages less than 20. The highest level of education among the 19 participants was a college degree 42% of the participants held high school diplomas.

After reviewing the completed section of the demographic survey, there were nine participants that had an epidural in the past, eight who had not had an epidural and two participants who did not answer the question. The total number of participants who knew they would use an epidural for labor was 8/19 (42%). Lastly, 8/19 (42%) of the participants received information regarding pain management for labor from family members and friends and 8/19 received information from OB/GYN or family doctor (42%).

Table 2

Who Participants Received Information from the Most on Epidurals



Measures/Indicators

The scholarly project presentation was evaluated based on ability to achieve the proposed project outcomes and learning objectives. The average pretest score was 46% and the posttest average score was 73% with a standard deviation of .19. The most missed question was question four with 42% of the participants answering the question correctly. A percent of change was used to determine if there was an increase in knowledge between the pretest and posttest scores. The results presented a percent change of 73%, which is an increase in the posttest results. The aims and outcomes set by the project manager included:

1. Aim: Increase in knowledge on the risks and benefits of epidurals.

    1a. Outcome: Childbearing and/or pregnant women 18 years of age and older will express an increase of knowledge by 20% after the educational

presentation prior to admission to the hospital.

Pre and posttest item numbers #1 #4, #6, #7, #9

1b. Outcome: Childbearing and/or pregnant women will express an understanding of the risk and benefits of epidurals by 20% post intervention.

Pre and posttest item numbers #1 #2, #5, #6, #7, #8, #9, #10

Table 3

Percent Change

Question #	Pretest (correct answers)	Posttest (correct answers)	Percent change
1	8/19 (42%)	15/19 (78%)	87.5% increase
4	10/19 (52%)	17/19 (89%)	70% increase
6	7/19 (36%)	17/19 (89%)	142.8% increase
7	5/19 (26%)	18/19 (94%)	260% increase
9	6/19 (31%)	15/19 (78%)	150% increase

(https://www.calculatorsoup.com/calculators/algebra/percent-change-calculator.php)

2. Aim: Improve patient's understanding of pain management and pain management options during childbirth.

2a. Outcome: Childbearing women will gain an increase in knowledge on the difference between pain and pressure by 15% post-intervention.

Pre and posttest item numbers #2, #11

2b. Outcome: Childbearing women will understand the difference between IV medications for pain and epidurals by 15% post intervention

Pre and posttest item numbers #1, #11, #10

Table 4

Percent Change

Question #	Pretest (correct)	Posttest (correct)	Percent change
2	15/19 (78%)	16/19 (84%)	6.7% increase
11	14/19 (73%)	18/19 (94%)	28% increase

(https://www.calculatorsoup.com/calculators/algebra/percent-change-calculator.php)

Data Analysis Inferences

A percent change was conducted to analyze the pretest, posttests scores and individual scores. As the data was reviewed, the team leader compared scores to determine if the aims and outcomes were met. The mean pretest score was 46% and mean posttest score was 73%. The percent of change between the pretest and posttest was a percent increase of 73%. Question number 7 states, “An epidural will slow down labor for up to 50% of women.” Question seven displayed the highest percent change at 260%. Most women were under the assumption that epidurals would slow down their labor. After the educational session, knowledge surrounding question seven increased greatly.

Gaps

No incentive was offered to the participants to complete the pretest, posttest, or demographic survey. The team leader explained to the participants the nature of DNP project and asked for consent from each participant prior to collecting any information.

The main gap related to the amount of time spent with each participant varied. Some participants had a lot of questions to ask post education and posttest, while others did not, which affected the amount of time spent with every participant. The team leader made a conscious effort to stay with the office flow and not impede the doctor's visit with the patient.

Unanticipated Consequences

An unanticipated consequence occurred when Dr. Finklea had two emergency cesarean sections on the day of implementation. The consequence caused a rearrangement of how the participants were going to be seen by the team leader and in what order. Overall, the change in the schedule allowed the team leader more time to present the DNP project to each participant and to be available for more questions from the participants.

Expenditures

The resources for the educational DNP project included folders at $1.00 each ($25), copies of the brochures in a trifold format, which were $0.95 per pamphlet ($50), and pretests and posttests were $0.35 per copy ($48).

SPSS was also purchased to facilitate analyzing data ($99). The team leader took doughnuts for the staff the morning of the implementation day ($20). The grand total equaled $242 for out-of-pocket expenses to the team leader.

Chapter 5: Leadership and Management

Organizational Culture

"Dedicated to providing excellent care for our patients and to creating a safe work environment for our practitioners and staff" (Quality and Safety, 2021). Bluffton Regional Medical Center (BRMC) provides quality and safety, which is the foundational groundwork that must be established when delivering patient care. When the team leader observed the implementation site for the DNP project, the first area reviewed was the mission statement to determine the aims of care. Gaining the proper understanding of an organization is a critical way to lay a foundational framework.

The foundational framework was used to promote and encourage change. A foundation provides support for all that comes after the groundwork is laid. The foundation sets the culture. If the right people and resources are not put into place, the foundation may become fragile.

Creating a foundation of success begins with the end in mind. As the team leader moved toward the implementation portion of the DNP project, the planning efforts included the overall result. The mission statement and vision of an organization helped to establish the goal for the facility. The vision or mission of an organization should be reverberated to the interdisciplinary team, staff, and physicians to create the intended environment

The political environment at BRMC was relatively relaxed. The CRNAs worked independently but still required the surgeon to fulfill the role of supervisor. No anesthesiologists scheduled at BRMC but could be quickly contacted by phone at Lutheran hospital. The independent model allowed each provider to work within their full scope of practice. The CRNAs in that capacity worked within the American Association of Nurse Anesthetists (AANA) standards and were held liable for their actions. The primary three CRNAs who worked within

the model at BRMC did not mind the surgeon's supervision as it allowed the freedom to provide the best care for the patient. Due to the rural setting of BRMC, the CRNAs need not be limited in the type of care provided. However, the State of Indiana was in the voting stage to remove restrictions such as physician supervision which would further advance CRNAs into full practice authority.

The culture in an organization can reflect how the team members feel within an organization. Valued team members tend to trust leadership. A culture full of trust develops a strong and positive work environment. Based on the survey by Mark McClain and the answer responses, BRMC has a culture that values employees (Organization Assessment, 2020). Leadership at BRMC created an atmosphere that looked out for the welfare of the employees (Organization Assessment, 2020).

The Burke and Litwin Model was chosen for the DNP project. The Burke-Litwin model encompassed an array of steps and ideas that laid a framework for organizational change. The framework was the building block that created a cause-and-effect foundation. The Burke-Litwin model has 12 elements that orchestrate change within an organization (Mulder, 2018). Two consultants built the Burke-Litwin model. The model was built in the 1960s by the two consultants who believed change comes from external influences (Mulder, 2018).

The backbone of the Burke-Litwin model was made up of six components that include external influences: leadership, management practice, work unit climate, motivation, and individual and organization performance. As the Burke-Litwin model was evaluated on a smaller scale, transformation and transactional elements were the two main factors. The transformational factors caused negative organizational changes when the external factors were interrupted.

However, if transformational aspects are changed for the better, a positive lasting change is inevitable (Mulder, 2018).

Transactional factors refer to day-to-day operations within an organization. Factors include management practices, structure, systems, work unit climate, motivation, task requirements, individual needs, and values. The Burke-Litwin model's main components are diagnosing a problem or creating an action plan for the organization (Mulder, 2018). It is evident in the Burke-Litwin model that many elements play a role in organizational change and it took a team approach from BRMC to encourage positive change.

Change Strategy

Organizational change is a phenomenon that may cause some resistance (Betancourt et al., 2017). Prior to initiating change, the intended plan should be evaluated to test the climate for the particular outcome. Initiating change may be a challenge initially if communication is not delivered in a way for all those to understand (Betancourt et al., 2017). Assessing the environment where change occurred gave excellent feedback and information on how the team leader moved forward.

The change strategy offered to Dr. Austin Finklea's office was well communicated and received. The plan included informing the staff about the education project on pain management before implementation.

Epidurals are one of the most highly requested pain options for laboring mothers (Togioka et al., 2020). However, laboring women may not fully understand the benefits or risks on the day of delivery. The staff received a copy of the educational material prior to implementation. The education was delivered to the patients before their appointment times. The team leader stressed to the participants to take their brochures to the hospital at the time of

delivery. The continuum of education was an excellent way to provide a continuity of care. The team leader received feedback from the CRNAs regarding the brochure, which allowed for a collaborative approach.

Leadership Style

Transformational leadership creates adaptable, innovative teams that thrive amid change (Grossman & Valiga, 2017). Transformational leadership encompasses motivation. Motivation is the undercurrent to change. Transformational leadership consists of four processes: idealized influence, inspirational motivation, individualized consideration, intellectual stimulation (Grossman & Valiga, 2017). The overarching commonality in all four processes is building trust, respect, and confidence by the leader, which empowers the team (Grossman & Valiga, 2017).

The transformational leadership team of BRMC consisted of the perioperative manager, Lutheran Hospital Network's executive manager, OR staff, physicians, CRNAs, and team members of other departments (Personal Communication, 2021). The CRNAs were employed by an anesthesia group called Midwest Anesthesia Associates. Although the hospital did not hire CRNAs, the CRNAs worked cohesively with all staff members. The manager and CRNAs worked together when ordering supplies, scheduling, and implementing new ideas. The communication aspect between the two entities kept the operating room running smoothly.

In conjunction with the OB/GYN physician, Dr. Austin Finklea, the perioperative manager, the CRNAs, and the small environment allowed freedom to discuss the positives and negatives that arose. An open-door policy allowed for situations to be addressed early. The staff believed that issues were addressed much faster than in a larger facility (Personal Communication, 2021). One barrier was that the small hospital was under the leadership of a

larger facility, which delayed the response time of some concerns. However, many aspects were dealt with within the small hospital and did not need to be escalated.

As the team leader who had more of a transformational leadership style, it was vital to understand who would particpate were involved in making a change. Coordination of the DNP project took a conscious effort on the team leader's part to keep everyone well informed of the steps ahead. The team leader communicated each step of the way to the project committee, office manager, DNP advisor, office manager, and CRNAs to bring the plan to fruition. Executing the desired tasks would have been more challenging if the team leader did not effectively lay the proper foundation. Communicating the appropriate information provided a pathway to success and allowed for a trustful relationship among the key players.

Interprofessional Collaboration

Collaboration is an excellent concept used to create significant and minor changes within the health care system (Grossman & Valiga, 2017). Collaboration means connecting with other team members in search of common ground. The common ground in healthcare is patient safety. Patient safety is the number one priority within the healthcare sector. Silos can no longer be the way to improve patient outcomes but instead a multidisciplinary approach is required. An interdisciplinary approach increases the magnitude by which a patient can be affected for the better (Grossman & Valiga, 2017).

During the implementation of the DNP project, the planned collaboration began with the CRNAs, Dr. Finklea, office manager, Kristi Landis, Dr. Winegarden, and Dr. Cottrell. The initial phase included building a relationship with the team members. The relationship-building process included introductions and letters to each member to explain the DNP project idea and receive feedback.

After the introductions, the team leader coordinated specific details forgoing. The details included an update of the progress of the DNP project that kept each member informed. Collaboration was needed to keep everyone on the same page. Meetings via telephone, email or in-person were conducted when required to keep the lines of communication open.

Conflict Management Strategies

Disagreements are bound to happen and can lead to conflict (Patton, 2020). Conflict occurs when implementing something new. Conflict can result in something positive, creating innovation and creativity (Patton, 2020). When assessing potential situations that may spark conflict before the dispute arises, establishing a plan to mitigate the conflict with a resolution is a proactive approach to leadership. Management strategies were communication, listening to feedback, and compromising when needed. Communication facilitated in disputing misconceptions or misunderstandings.

Barriers to change such as decreased resources, lack of support, resistance, and poor communication can be conflict initiators. Conflict is often viewed as a negative outcome but can often bring about positive change. Every negative situation can inspire growth.

One misunderstanding that stirred during the preparation phase of implementation of the DNP project centered around the delivery of the education and timing. Dr. Finklea wanted to ensure that there would not be any interruption in his day and the flow of patients. The team leaders' job was to adhere to the office rules and design a system that kept things running smoothly. The team leader came up with three plans for the day of implementation. All three prior plans were aborted, and a fourth plan was created on the day of implementation with the office manager and staff. Although a misunderstanding developed, the critical ingredient for success was flexibility. The team leader listened to what worked best for the office and made the

appropriate adjustments, including seeing the patient immediately after lab tests in a patient room before the patient was seen by the doctor. Once everyone was on the same page, each participant was provided education without interfering with the doctor's workflow.

After implementing the DNP project, the team leader understood that flexibility and listening to others were essential. Conflict and misunderstandings happened but maintaining self-control, a gentle, communicative approach, and patience fostered great results (Patton, 2020).

Listening is a prominent aspect of conflict management. As a leader, it is acceptable to listen to another one's thoughts and opinions. Listening shows respect when working in collaboration with others. Although leaders must be confident, it is noteworthy to view a different perspective. Avoiding conflict without conversation may cause tension among team members (Patton, 2020). Tension can halt the process of something great.

Conclusion

Organizational leadership is a concept that takes finesse, skill, communication, resolutions, trust, and respect, just to name a few. The DNP project implementation idea was well communicated to the stakeholders so that everyone was abreast of the upcoming project. Insight and feedback from the team players were critical to the forward-moving of the project within the organization. Understanding that there would be barriers to implementing a quality improvement project helped to develop a plan to move past the obstacles. Change is inevitable; however, a well-developed plan made change more bearable.

Chapter 6: Discussion

Impact of Project

The project was well received from Dr. Finklea, the hospital staff and participants. Participants felt as though they were better informed to make an informed decision regarding pain management when they arrived at the hospital for delivery of their baby. The knowledge and educational tools that the participants received can be shared with other family members and friends.

Decisions and Recommendations

The brochures can also be stocked within any OB/GYN office or women's health clinic to widely spread the education on pain management. The discussion on how many brochures would be needed at a time for each office would be discussed with the project manager. Also, a permanent copy could be emailed to the office manager in which they could make copies on their own and at their own expense to give to patients.

Limitations of the Project

The limitations to the project entailed the limited number of patients seen in a one-day visit. The DNP project titled, " Enhancing knowledge regarding pain management," was completed in an office setting so ensuring the patients were educated in a place that provided confidentiality was of upmost importance.

The project manager was scheduled for one day in the office. If the project was completed over several days more information could have been obtained due to an increase in participants. COVID-19 was a potential problem and limited the project manager using a conference room that could hold several participants at one time.

Application to Other Settings

As previously mentioned, the educational tool which is a trifold brochure with a QR code can be scanned, and the informational video can be viewed as often as necessary by the patient. Making the brochures available to other facilities such as clinics and hospitals would increase the amount of prehospital education on pain management in pregnant women. Also, providing more brochures throughout the community is a great way to educate childbearing women prior to pregnancy.

Strategies for Maintaining and Sustaining

As an anesthesia provider, it is essential to lead by example by equipping patients with the education needed to improve health care outcomes. Communication and collaboration with local OB/GYN facilities to provide educational brochures for patients is an essential strategy for maintaining and sustaining shared decision making.

Lesson Learned

Communication, collaboration, time management and organization were lessons learned throughout the doctoral project. Communication and collaboration among the project leader, advisor, office manager and Dr. Finklea were the driving forces in completing the doctoral project. Collaboration and clear expectations were a must to ensure details of the project were conveyed appropriately.

Time management while completing the various course work within the nurse anesthesia program needed to be mastered. Time management allowed for a successful completion of the DNP project. A commitment to strive to compile quality information to promote change in healthcare mandates time management.

All eight essential elements of the DNP practice were met with the completion of the doctoral project through the educational intervention. DNP essentials are what help to shape DNP programs and must be present in all DNP programs.

- Essential I: Scientific underpinning for practice includes combination of nursing science, middle-range nursing theories, patterns of human behaviors, and the endless interaction with their environment (AACN, 2006). Essential I was met by incorporating the Social Cognitive Theory which is to understand or predict an individual or a group's behaviors to identify methods by which action can be modified or altered (Bandura, 2005).
- Essential II: Organizational and systems leadership for quality improvement and systems thinking includes critical skills to improve the development of clinical practice guidelines and protocols, evidence-based interventions, and evaluating outcomes with improved strategies (AACN, 2006). The use of the literature review to develop tools to improve clinical practice with evidence-based guidelines were met with educational intervention.
- Essential III: Clinical scholarship and analytical methods for evidence-based practice encompasses the education of the Doctor of Nursing Practice to incorporate the skills needed to provide changes within an organization (AACN, 2006). The implementation site was Bluffton Medical Center where the project leader incorporated anesthesia pain management education into the OB/GYN appointment for pregnant women.
- Essential IV: Information systems/technology and patient care technology for the improvement and transformation of health care allows the doctoral nurse to understand the information technology and how to evaluate the legal and ethical issues that may arise within healthcare (AACN, 2006). Multiple forms of technology were utilized in the making of the doctoral project and included: Microsoft Word, Microsoft Excel, Microsoft

Forms, PowerPoint, IBMs SPSS Statistics 27, Information Technology (IT) Services, email documentations, and text messaging. Legal and ethical issues were reviewed, and practices were put into place to minimize any risks.

- Essential V: Health care policy for advocacy in health care allows the doctoral graduate to analyze health policies and provide the best outcomes for the nursing profession (AACN, 2006). The health policy course within the doctoral program encouraged advocating for the profession locally and nationally. Advocacy for health care is a continual effort in order to provide the best outcomes for the nursing profession.
- Essential VI: Interprofessional collaboration for improving patient and population health outcomes help prepare the DNP graduate for a leadership role in the development of the scholarly project (AACN, 2006). Interprofessional collaboration was the key ingredient in conducting the DNP project in efforts to improve health outcomes.
- Essential VII: Clinical prevention and population health for improving the nation's health incorporates nurse's knowledge to interpret occupational, and environmental data to improve the overall health of individuals and provide the safest outcome possible to the population (AACN, 2006). The DNP project provided education to pregnant women to help improve shared decision making to encourage the safest outcome for patients.
- Essential VIII: Advanced nursing practice involves critical judgment skills, evidence-based care, and preceptorship with other healthcare providers involved in nursing practice (AACN, 2006). Applying new knowledge to improve outcomes clinically as an Advanced Practice Nurse was of utmost importance while developing the DNP project. Educational tools that are evidenced based promotes advocacy and keeps patients well informed.

Lastly, organization to construct and pull together intricate details on a project that creates change within healthcare was imperative in the execution of such an enormous task. The support of tutors, advisors, readers, and peers helped to strengthen the project. Incorporating insight from others enlightened the project manager on the importance of a team. To achieve a large task as a healthcare improvement or change it is important to utilize the resources that were at hand.

Chapter 7: Conclusion

Potential Project Impact on Health Outcomes Beyond Implementation Site

Health outcomes that were impacted beyond the implementation site including educating family members on truths regarding pain management prior to labor and delivery of a newborn baby. As mothers and their families make important decisions regarding birth planning it is essential for families to think about how to manage pain. Education on pain management in the OB/GYN office setting equips women with the resources needed to make informed decisions. The educational brochures used during the implementation of the project can be reproduced and shared with any OB office, clinic, or hospital. Incorporating mothers in the shared decision-making process decreases fear and uncertainty while preparing for the birth a child.

Health Policy Implications of Project

The doctoral project did not directly impact a specific policy. However, the doctoral project aligns with the AANA Guidelines, *Standard Three: Plan for Anesthesia Care* and *Standard Four: Informed Consent for Anesthesia Care and Related Services.* Informed consent

is a standard that must be adhered to as it relates to anesthesia care. Adhering to the guidelines and standards ensures quality care for patients.

Proposed Future Direction for Practice

The project manager will make educational brochures available to the implementation site. The educational brochures will make a great addition to OB new patient packets. The project manager will also make plans to provide educational brochures to OB/GYN offices locally. The goal is to equip as many patients as possible with the educational material prior to being admitted to the hospital. The educational brochures can also be given to anesthesia providers to take to patients as pain management options are discussed.

Ultimately, shared decision making is a key component to improve heath outcomes. Involving the patient in the decision-making process will help to decrease fears related to childbirth. Anesthesia providers are the gatekeepers to pain management as it relates to childbirth. Informed decision making is a key ingredient to successful comradery between anesthesia provider and patient.

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Appendices

Appendix A: CITI Training Certificates


CITI PROGRAM

Completion Date 09-Feb-2021
Expiration Date 09-Feb-2024
Record ID 40772581

This is to certify that:

Aisha White

Has completed the following CITI Program course:

Not valid for renewal of certification through CME.

GCP - Social and Behavioral Research Best Practices for Clinical Research
(Curriculum Group)
GCP - Social and Behavioral Research Best Practices for Clinical Research
(Course Learner Group)
1 - Basic Course
(Stage)

Under requirements set by:

University of Saint Francis

CITI
Collaborative Institutional Training Initiative


CITI PROGRAM

Completion Date 16-Feb-2021
Expiration Date 16-Feb-2024
Record ID 40772578

This is to certify that:

Aisha White

Has completed the following CITI Program course:

Not valid for renewal of certification through CME.

Social & Behavioral Research - Basic/Refresher
(Curriculum Group)
Social & Behavioral Research
(Course Learner Group)
1 - Basic Course
(Stage)

Under requirements set by:

University of Saint Francis

CITI
Collaborative Institutional Training Initiative


CITI PROGRAM

Completion Date 18-Feb-2021
Expiration Date 18-Feb-2024
Record ID 40772580

This is to certify that:

Aisha White

Has completed the following CITI Program course:

Not valid for renewal of certification through CME.

Social and Behavioral Responsible Conduct of Research
(Curriculum Group)
Social and Behavioral Responsible Conduct of Research
(Course Learner Group)
1 - RCR
(Stage)

Under requirements set by:

University of Saint Francis

CITI
Collaborative Institutional Training Initiative


CITI PROGRAM

Completion Date 09-Feb-2021
Expiration Date 09-Feb-2024
Record ID 40772582

This is to certify that:

Aisha White

Has completed the following CITI Program course:

Not valid for renewal of certification through CME.

Public Health Research
(Curriculum Group)
Public Health Research
(Course Learner Group)
1 - Basic
(Stage)

Under requirements set by:

University of Saint Francis

CITI
Collaborative Institutional Training Initiative


CITI PROGRAM

Completion Date 11-Feb-2021
Expiration Date N/A
Record ID 40772579

This is to certify that:

Aisha White

Has completed the following CITI Program course:

Not valid for renewal of certification through CME.

Information Privacy Security (IPS)
(Curriculum Group)
Researchers
(Course Learner Group)
1 - Basic Course
(Stage)

Under requirements set by:

University of Saint Francis

CITI
Collaborative Institutional Training Initiative

Verify at www.citiprogram.org/verify/?w6400e927-51b7-4ae4-97d3-d109055064f8-40772579

Appendix B: Informed Consent

Hello, I am Aisha White, MSN, SRNA. I am a senior SRNA (Student Registered Nurse Anesthetist) at the University of Saint Francis, Fort Wayne, Indiana. I am conducting a project for my Doctor of Nursing Practice (DNP) degree, and I am seeking your participation in this study. I will be receiving support and guidance from my doctoral project advisor, Dr. Winegraden. Dr. Winegarden can be reached at:

Megan Winegarden DNP, EdM, RN, CNE
Office phone (260) 399-7700 ext. 8513
mwinegarden@sf.edu.

This project aims to provide education on epidural anesthesia to increase knowledge in childbearing women to make an informed decision regarding epidural usage during delivery.
Explanation of Procedure:

1. In the Spring of 2022, an educational session will be held in Dr. Austin Finklea's office in a private conference room, where patients wait for their appointments. The educational presentation on epidurals as pain management will include the benefits, risks, and expectations when receiving an epidural.
2. Participants will answer 11 pretest questions prior to receiving any education on epidurals. The pretest should take 5-7 minutes to complete.
3. Immediately following the pretest, education on epidurals will be given in a private conference room. The educational session will take about 10 minutes.
4. After answering the participants' questions, a posttest will be given to assess whether an increase of knowledge was noted.
5. Immediately after the presentation, the 11-question posttest will be given to the participants. The posttest will take 5-7 minutes.
6. The total amount of participation time required is about 20 minutes; the time is divided into the pretest, educational video, and posttest.
7. The duration of subject participation will be less than 2 months.

Explanation of the risks and benefits of the research

1. There are no foreseeable risks or discomforts that may be caused by this educational project's time requirements, cost, or sensitive questions.
2. There will be no compensation for this project. The participants may benefit from the presentation of data, education, and a workshop, but this is not considered compensation.

Explanation of the safeguards

1. Participants will not be able to be identified directly or indirectly through identifiable information linked to subjects. The initial pretest and posttest will be assigned anonymously by using a specific ID.

2. The project manager, myself: Aisha White, SRNA, will receive the anonymous data. Anonymous data will be kept locked in my residence, then deleted or shredded in one year aligning to HIPAA guidelines.
3. No identifying data will be included in the project publication.

Freedom to Withdraw

1. Participation is completely voluntary, and subjects may withdraw from the project at any time and for any reason without penalty.
2. The participation or decision not to participate will not affect treatment or involve penalty or loss of benefits to which the subject is otherwise entitled. If a participant withdraws, all data will be shredded.
3. Discovery of false data, sharing forms with ID identifiers, or dishonest practices may result in inaccurate data. If appropriate, this may result in the subject's removal from the project without the subject's need to consent.

Offer to answer inquiries

After completion of this project, results can be shared with the participants. If interested in the project results or if you have any questions, please contact me at:
Aisha White (project manager)
whiteao@cougars.edu

As a participant in this project, please call or write to the following contact with any complaints.
IRB Chairperson
University of Saint Francis
Fort Wayne, In 46808
USA
irb@sf.edu
or
Megan Winegarden DNP, EdM, RN, CNE
Associate Professor of Nursing
University of Saint Francis
Office phone-(260) 399-7700 ext. 8513
mwinegarden@sf.edu
I have received an explanation of this project and agree to participate. I understand that my participation in this project is strictly voluntary.
Name (Print and Sign) _____Date:_____
This DNP project has been approved by the University of Saint Francis' Institutional Review Board for the protection of Human Subjects for a one-year period.

Appendix C: Approval to Implement from Facility

Lutheran
Health Physicians
Bluffton OB/GYN

8/30/2021

To the University of Saint Francis Institutional Review Board:

This letter is being written in support of University of Saint Francis NAP/DNP Aisha White's Doctor of Nursing Practice Project Scholarly Project entitled Enhancing Knowledge regarding Pain Management: Empowering childbearing women to make an informed consent. Dr. Finklea with the Bluffton Medical Group understands that the DNP Scholarly Project aims are to educate childbearing women on pain management options prior to labor.

Dr. Finklea and the Bluffton Medical Group are supportive of the aims of the project. Dr. Finklea and practice manager Kristi Landis are allowing an educational presentation on pain management options for labor. Dr. Finklea's and office staff will allow the distribution of pretest and posttest, educational material on epidurals and pain management options to the participants. This project does not require institutional IRB approval.

Dr. Finklea with Bluffton Medical Group is committed to increasing knowledge on pain management options prior to labor. Dr. Finklea with the Bluffton Medical Group has committed to allow implementation of the project supported by its leadership to Aisha White's DNP Scholarly Project titled Enhancing Knowledge regarding Pain Management: Empowering childbearing women to make an informed consent.

Sincerely,

K. Landis DNP

Kristi Landis
Practice Manager OBGYN
Bluffton Medical Group
1026 S. Main Street
Bluffton, Indiana 46714
Tel: 260-353-2081
Kristi.Landis@blufftonregional.com

Appendix D: Activity Timeline/Year 2020-2021

	Jan/Feb. 2021	Mar 2021	Apr 2021	May 2021	June 2021	July 2021	Aug 2021	Sept 2021	Oct 2021	Nov 2021	Dec 2021	Jan 2022	Feb 2022	Mar 2022	April 2022	M/Jun 2022
Discovering DNP Project																
Discussed project with Dr. M. Winegarden (project advisor) for approval																
Literature Review for DNP Project																
Began assessing the need at Bluffton Regional Medical Center for pre-hospital education on Epidurals																

Discussed with Morgan Wisenbaker,CRNA (practice mentor) and Dr. Finklea, OBGYN to gather idea about epidural education															
Developed an introduction letter to have prepared to introduce myself and project idea to specific parties when needed															
Discussed with Morgan Wisenbaker, CRNA (practice mentor) about details of project															
Discussed with Dr. Louck (current program director) and Dr. Osborne (former program director) about the importance of DNP project within anesthesia															

Presented PICOT question and research to class and doctoral leaders in the anesthesia program																
Organized all Lit review																
Received educational tools including brochure and pre and posttest from author, PhD																
Received educational brochure from author, Brandon Togioka M.D																
Discussed with A3s about project idea and received feedback																
Received signatures for project team members																
Developed informed consent																
CITI training completed																

Organizational Assessment																
Attended A3's dissemination of DNP project																
Interview with Senior level student about developing Chapter 3 and Chapter 4																
Collaborating with OBGYN's office manager and Morgan Wisenbaker, CRNA (practice mentor)																
Developed Aims																
Developed Goals																
Present the summary for IRB approval																
USF IRB Approval																

Implementation of project at BRMC/OBGYN																
Compile Data collected																
Review Data collected																
Presentation of DNP project																

Appendix E: Educational Pamphlet for the Implementation of this Project

Possible Side Effects

Epidurals during labor are usually safe and have few side effects or risks.
Side effects include:

- Temporary shivering
- A drop in blood pressure may cause the baby's heart rate to slow down. However, this is easily fixed with IV fluids and medications.
- Itchiness while the epidural is in place
- Rarely, patients may experience a headache after an epidural. This happens when the epidural needle goes past the epidural space. If you are still in the hospital when a headache occurs, please notify your nurse. Don't hesitate to contact your healthcare provider if you have gone home and notice a headache that doesn't go away.
- Very rarely, a nerve may be damaged. It usually recovers, but there have been a few cases that have ended in permanent damage.
- An infection at the site of the epidural may also be a very rare complication.
- Very, very rarely, there may be bleeding into the epidural space.

CONTACT US

Bluffton Medical Group
1026 S. Main St.
Bluffton, IN 46714
260-919-3880

Click on the QR code and watch an informative video from North Mississippi Medical Center. Please call the Bluffton Medical Group with any questions.
Disclaimer: Please do not call North Mississippi Medical Center as stated in the video.

References

Munro, S. B., Hui, A., Gemmell, E. A., Torabi, N., Johnston, A. S., & Janssen, P. A. (2018). Evaluation of an information pamphlet for women considering epidural analgesia in labour. Journal of Obstetrics and Gynaecology Canada, 40(2), 171–179. https://doi.org/10.1016/j.jogc.2017.06.028t

Schwartz, A. J. (2006). Learning the essentials of epidural anesthesia. Nursing, 36(1), 44–49. https://doi.org/10.1097/00152193-200601000-00039

Revised by Aisha White, MSN, SRNA from the University of Saint Francis in Fort Wayne, Indiana using "Having an epidural" by optimalbirthbc. www.optimalbirth.ca

MANAGING PAIN DURING LABOR

Epidurals and Pain Management

Be Informed

The process of labor is different for everyone. It is important to be aware of some important considerations regarding epidurals and pain management.

Adapted from Published tool Optimal Birth BC (Munro et al., 2018)

Appendix E: Educational Pamphlet for the Implementation of this Project

HOW TO MANAGE PAIN?

Pain is a normal part of labor. There are many non-medical ways to soothe pain such as coaching, breathing and taking baths.

HOW DO EPIDURALS HELP WITH LABOR PAIN?

Epidurals are a generally safe and effective way to manage pain during labor. The medication in the epidural numbs the nerves coming from the uterus and birth canal. Pain relief usually begins in 5-10 minutes and reaches maximum effect by 20 minutes. Epidurals do not all work perfectly. There may be areas that are not numb. Make sure to notify your nurse as soon as possible if interested in an epidural to allow time for the CRNA to arrive.

HOW IS THE EPIDURAL PLACED?

An IV will be placed to give the mother IV fluids. Your nurse will assist you to sit on the edge of the bed and hunch your back. This will open up a space between the bones of your spine.

A Certified Registered Nurse Anesthetist (CRNA) will inject a numbing medication into your skin. This process may feel like a bee sting but will go away quickly . The CRNA will then insert a needle between the bones in your spine so that the pain-relieving medication reaches the tissues surrounding the spinal cord. You may feel an ache or pressure as this is done but it does not usually hurt.

The CRNA will pass a tiny tube (catheter) through the needle into the epidural space. You may feel a brief tingling sensation down one leg as the epidural catheter passes a nerve. The needle is then removed. Pain medication is then injected into the catheter.

The epidural catheter is thoroughly taped securely to your back. Once the epidural is in place you will not feel it.

The epidural catheter will be attached to a medication pump that will continuously deliver pain relief medication at a steady rate. The epidural does not touch the spinal cord.

Special care with an epidural

You will not be able to take a shower or a tub bath while the epidural is in place.

If labor slows down, you may be given a medication called oxytocin in your IV to increase the number and strength of contractions.

You may breastfeed your baby as soon as the baby is born.

A nurse will check:

- Your baby's heart rate
- Your breathing, blood pressure and temperature, and your ability to urinate
- How well the numbing medication is working
- How well you can move your legs
- Pain levels on a scale from 1-10

HOW DOES HAVING AN EPIDURAL FEEL?

The area between your groin and belly button becomes numb. The amount of pain that you are experiencing will decrease and may even go away completely. Your legs will feel numb, tingly, and sometimes a bit heavy. You will feel pressure during the laboring process. However, pain should be diminished. Pressure is not relieved with epidurals.

Adapted from Published tool Optimal Birth BC (Munro et al., 2018)

Appendix E: Adapted from Published tool Optimal Birth BC (Munro et al., 2018

Intravenous Analgesia in the Laboring Mother			
IV medications are given through an IV in your arm or hand.	Benefits: Can receive if a patient does not want an epidural or not able to receive an epidural	Disadvantages: pain relief may be inadequate, respiratory depression in mom and baby, nausea, and vomiting	Non-Pharmacologic options: Warm bath and massage
(Nagelhout et al., 2018 p. 1071-1072)			

Appendix F: Demographic Questionnaire/Pretest/Posttest

Demographic Questionnaire

Demographic Questions Instructions:

Please read each question and circle the response that best represents your answer or check the box that applies.

1) Maternal Age
    a. Less than 20
    b. 20-30
    c. 30-40
    d. Greater than 40

2.) Do you plan on using an epidural for pain management?

    a. yes

    b. no

3.) Have you had an epidural for pain management in the past? Yes or No

4.) Are you planning for a:

    a. Vaginal birth (birth through vaginal canal)

    b. Cesarean birth (C-section-surgically removed)

5.) Highest level of education

    a. Middle School or less

    b. High School

    c. Some college

    d. College graduate

6.) Where have you received information about epidural for pain management in the past?

Please check all that apply:

☐ Midwife/Doula/Nurse

☐ Family doctor/Obstetrician/Gynecologist

☐Family Member/ friends

☐ Prenatal class/pregnancy books

☐ Family member/friends

☐ Internet search/TV/mommy blogs/magazines

Appendix F: Pretest

	Pretest Questions Please select only one correct answer for each question.	True	False	Don't Know
1	Most women who have an epidural feel instant pain relief.		x	
2	An epidural always completely removes labor pain.		x	
3	Women who have an epidural also receive IV fluids in their arm.	x		
4	The epidural needle, when inserted, touches the spinal cord.		x	
5	Some epidurals can be adjusted so you may move easily or walk.		x	
6	After having an epidural, women and their babies may receive antibiotics to treat a possible fever or infection.	x		
7	An epidural will slow down labor for up to 50% of women.		x	
8	In most hospitals, an epidural is available as soon it's requested.		x	
9	An epidural increases the risk for delivery with vacuums, forceps, and an episiotomy.		x	
10	Many women need to be given a drug called oxytocin to increase the strength of contractions after an epidural	x		
11	There are IV pain management options that women may choose that may help with pain	x		

Appendix F: Posttest

	Posttest Questions Please select only one correct answer for each question.	True	False	Don't Know
1	Most women who have an epidural feel instant pain relief.		x	
2	An epidural always completely removes labor pain.		x	
3	Women who have an epidural also receive IV fluids in their arm.	x		
4	The epidural needle, when inserted, touches the spinal cord.		x	
5	Some epidurals can be adjusted so you may move easily or walk.	x		
6	After having an epidural, women and their babies may receive antibiotics to treat a possible fever or infection.	x		
7	An epidural will slow down labor for up to 50% of women.		x	
8	In most hospitals, an epidural is available as soon it's requested.		x	
9	An epidural increases the risk for delivery with vacuums, forceps, and an episiotomy.		x	
10	Many women need to be given a drug called oxytocin to increase the strength of contractions after an epidural	x		
11	There are IV pain management options that women may choose that may help with pain	x		

Appendix G: Permission for use

WARNING: This email originated from outside of USF. Do **NOT** click links or attachments unless you recognize the sender and know the content is safe.

Hi Aisha – as requested – could you share your findings with us? – thx, Patti

Patricia Janssen, PhD

Professor and Co-Lead, Maternal Child Health

UBC School of Population and Public Health

Room 103, 2206 East Mall, Vancouver, BC, V6T-1Z3

604 313 8243

From: White, Aisha O <WhiteAO@cougars.sf.edu>

Sent: April 6, 2021 2:04 PM

To: Janssen, Patricia <patti.janssen@ubc.ca>

Subject: Re: regarding article:Evaluation of an Information Pamphlet for Women Considering Epidural Analgesia in Labour

[**CAUTION:** Non-UBC Email]

Hello!

Thank you for your quick response.

DNP stands for a Doctor of Nursing practice with a focus in anesthesia. I would love to have the paper pamphlet, an online version, and an example of your pre and posttest as well. My project is measuring knowledge as well as it relates to understanding epidurals.

Thank you so much!

Aisha White, SRNA

University of Saint Francis

From: Janssen, Patricia <patti.janssen@ubc.ca>

Sent: Tuesday, April 6, 2021 4:59:40 PM

To: White, Aisha O <WhiteAO@cougars.sf.edu>

Subject: RE: regarding article:Evaluation of an Information Pamphlet for Women Considering Epidural Analgesia in Labour

Hi Aisha – yes you are welcome to. What does DNP stand for? Would you like me to send you a copy of the paper pamphlet? We have an online version that is an 8 x 11 format as well – thx, Patti J

Patricia Janssen, PhD
Professor and Co-Lead, Maternal Child Health
UBC School of Population and Public Health
Room 103, 2206 East Mall, Vancouver, BC, V6T-1Z3
604 313 8243

From: White, Aisha O <WhiteAO@cougars.sf.edu>
Sent: April 5, 2021 11:38 AM
To: Janssen, Patricia <patti.janssen@ubc.ca>
Subject: regarding article:Evaluation of an Information Pamphlet for Women Considering Epidural Analgesia in Labour

[**CAUTION:** Non-UBC Email]
Hello,

My name is Aisha White and I am conducting a DNP project on education and epidurals. The article, "Evaluation of an Information Pamphlet for Women Considering Epidural Analgesia in Labour," has great information to help support my project.

I would like to know if I could review the tool you used to assess an increase in knowledge. Also, I was wondering if I could review the pamphlet you used to educate the women on epidural analgesia.

Thank you in advance for your time,

Best regards,

Aisha White, SRNA

From: Munro, Sarah <sarah.munro@ubc.ca>

Sent: Friday, July 23, 2021 1:03:13 PM

To: White, Aisha O <WhiteAO@cougars.sf.edu>

Subject: Re: Evaluation of an Information Pamphlet for Women Considering Epidural Analgesia in Labour

Dear Aisha,

Certainly. Please keep me and Patti in the loop as you get your results. We'd love to see what you find. Please also credit us and our Optimal Birth BC development process in your write up. You have my blessing!

Take care and good luck with your dissertation.

Sarah

On Jul 22, 2021, at 5:30 PM, White, Aisha O <WhiteAO@cougars.sf.edu> wrote:

[**CAUTION:** Non-UBC Email]

Thank you so much for your help! Just to clarify, is it okay for me to use the pamphlet and pre/posttest for my doctoral project. I am conducting a project on epidural education prior to hospital admission. I am excited for this opportunity.

Thank you for all your help!

Aisha White, SRNA

University of Saint Francis

Appendix H: Approval for Implementation

University of Saint Francis
Institutional Review Board
Human Subjects Review Committee/ACUC/IBC
Institutional Review Board Approval Form

Protocol Number: 16326151936
Reviewed by (underline one): HSRC ACUC IBC
Date Reviewed: Monday, October 25, 2021
Principal Investigator: Aisha White
Faculty Advisor: Dr. Megan Winegarden
Protocol Title: Enhancing Knowledge Regarding Pain Management
Study Site(s): University of Saint Francis, Main Campus

Type of Proposal:
☐Original research
☐ Replication or extension of previous research
☒Quality Improvement/Evidence-Based Practice Project

Items submitted for review:
☒CITI Certificate
☒Initial protocol
☒Abstract
☒Informed Consent Form (if applicable)
☒Approval letter from outside institution
☐Other – explain: Email request was made for waiver

Type of Review:
☒Full Review
☐Expedited Review
☐Exempt Review

Approval:
☒Approval granted on Monday, October 25, 2021 for a period of one year.
☐Conditional approval* granted on _____for a period of one year.
☐Not approved*
☐IRB approval is not required:
☐Other

*Comments:

The committee performing this review is duly constituted and operates in accordance and compliance with local and federal regulations and guidelines.

Michael P. Bechill, IRB Chair	Michael P. Bechill	2021.10.25
Printed Name (Chair or designee)	Signature	Date

Appendix I: Aims and Outcomes

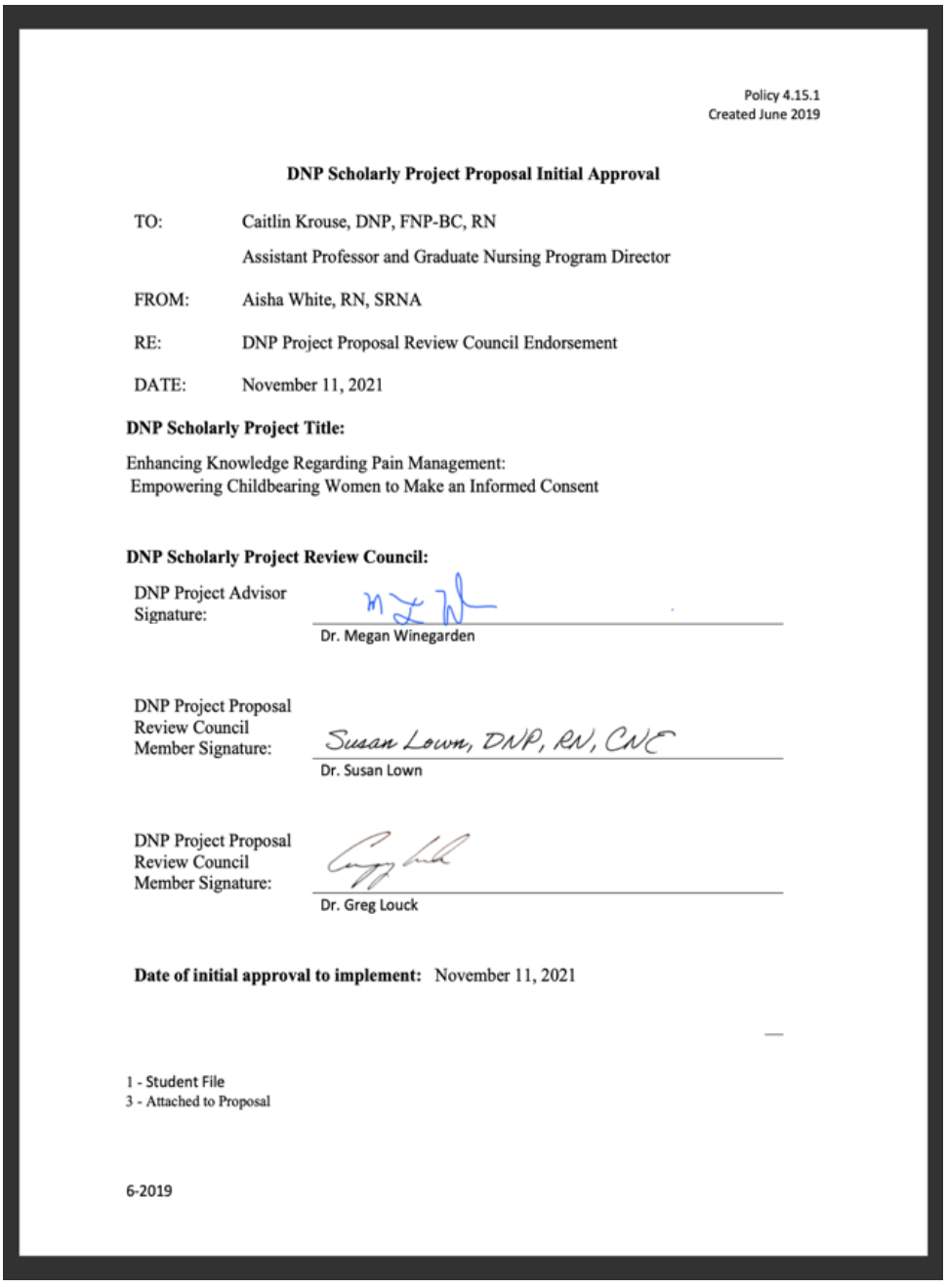
Table 1

Aims and Outcomes

Proposed Aims, Outcomes/Indicators
Aim 1: Knowledge of the risks and benefits of epidurals
Outcome/Indicator 1a: Childbearing and pregnant women 18 years of age and older will express an increase of knowledge by 20% after the educational presentation prior to admission to the hospital. Pre and posttest item numbers #1 #4, #6, #7, #9
Outcome/Indicator1b: Childbearing and pregnant women 18 years of age and older will express an understanding of the risk and benefits of epidurals by 20% post intervention. Pre and item numbers #1 #2, #5, #6, #7, #8, #9, #10
Aim 2: Improve patient's understanding of pain management and pain management options during childbirth
Outcome/Indicator 2a*:* Childbearing and pregnant women 18 years of age and older will gain an increase in knowledge on the difference between pain and pressure by 15% post-intervention. Pre and posttest item numbers #12, #2
Outcome/Indicator 2b: Childbearing and pregnant women 18 years of age and older and will understand the difference between IV medications for pain and epidurals by 15% post-intervention Pre and posttest item numbers #11. #1, #10

Note. This table explains the aims and outcomes of the DNP project.

Appendix J: University of Saint Francis' Faculty Approval



Policy 4.15.1
Created June 2019

DNP Scholarly Project Proposal Initial Approval

TO: Caitlin Krouse, DNP, FNP-BC, RN
Assistant Professor and Graduate Nursing Program Director

FROM: Aisha White, RN, SRNA

RE: DNP Project Proposal Review Council Endorsement

DATE: November 11, 2021

DNP Scholarly Project Title:

Enhancing Knowledge Regarding Pain Management:
Empowering Childbearing Women to Make an Informed Consent

DNP Scholarly Project Review Council:

DNP Project Advisor Signature: _____
Dr. Megan Winegarden

DNP Project Proposal Review Council Member Signature: Susan Lown, DNP, RN, CNE
Dr. Susan Lown

DNP Project Proposal Review Council Member Signature: _____
Dr. Greg Louck

Date of initial approval to implement: November 11, 2021

1 - Student File
3 - Attached to Proposal

6-2019