N311 Care Plan #4

Lakeview College of Nursing

Veronica Bridgeforth

Demographics (5 points)

Date of Admission	**Patient Initials**	**Age**	**Gender**
11/4/20	R.B.	69 Y/O 4/5/1951	Female
Race/Ethnicity	**Occupation**	**Marital Status**	**Allergies**
Caucasian/White	Retired	Married	Penicillin, Codeine
Code Status	**Height**	**Weight**	
Full Code	152.4cm (5'0")	71.8kg (158lb. 4.6oz.)	

Medical History (5 Points)

Past Medical History: Arthritis, asthma, COPD, HTN, stroke, walker as ambulation aid, wears glasses

Past Surgical History: Hysterectomy

Family History:

Maternal- Cancer

Paternal- Diabetes, CHF

Social History (tobacco/alcohol/drugs):

Tobacco- Never used

Alcohol- Occasionally, 1x/month, 1 glass of wine

Drugs- Never used

Admission Assessment

Chief Complaint (2 points): Right total hip arthroplasty

History of present Illness (10 points): The client has been reporting chronic hip pain that is progressively getting worse, impacting her ability to care for herself, perform ADLs, and get around. **Location:** She has c/o pain in her right hip, stating that it additionally radiates all the way down to her right knee. The left leg is unaffected. **Duration:** She describes the pain to be constant, as it never stops completely. **Characteristics:** When asked to elaborate on the

description of her pain, she concludes that it is burning, shooting, and aching. **Aggravating factors:** Upon asking what irritates her pain, she says that movement of any kind accelerates her pain levels. **Relieving factors:** When she was asked to elaborate on any alleviating factors that contribute to her pain control, she talks about how ice reduces her pain and swelling. In addition to ice, she states that rest aids in recovery. **Treatment:** The client was asked if she tried any OTC medications at home to treat her pain. She replies that Ibuprofen helped with inflammation, and that she took Tylenol to help reduce her pain.

Primary Diagnosis

Primary Diagnosis on Admission (3 points): Right total hip arthroplasty

Secondary Diagnosis (if applicable): Arthritis

Pathophysiology of the Disease, APA format (20 points):

Definition: Total hip replacement surgeries provide comfort and alleviate pain associated with the hip while concurrently recovering range of motion, strength, and agility imperative for movement. Hips are replaced by shaving damaged skin and skeletal material found in segments of the femoral head and exchanging it with a metallic stem that is inserted into the resonating core of the femur. This metallic stem is made up of hardy plastics and metallic assortments.

Cause: Patient's need total hip arthroplasties for numerous reasons. Factors that put a patient at risk for a hip replacement are: falls, fractures, arthritis, age, osseous calcifications, dislocations, loss of bone mineral density, and more. To determine if a patient will need a hip replacement, the healthcare team members caring for the patient should assess range of motion, flexibility, stamina, agility, and suppleness of the affected limb. After assessing their ability to work their extremity, an X-ray should then be implemented to ascertain the level of injury to the hip.

Signs & Symptoms: Indicators of a hip replacement usually include deterred ROM, feebleness in involved limb, unbalanced walk, trouble bearing weight, and pain upon movement.

Risk Factors: Total hip arthroplasties are similar in risk factors to other orthopedic procedures. These risk factors involve in bleeding, DVT/PE, infection, venous insufficiency, damage to tissues, rejection of replaced joint, and anesthesia crises.

Treatment: Once the joint is replaced, the patient is then moved to an area of the hospital where post-operative clients are checked on frequently. While they sit in the post-anesthesia unit, their VS are continuously cycling, the client is wearing off anesthesia, CO2 and tidal are watched closely, and the patient will eventually wake up to be alert again. Once the client has awakened and anesthesia is worn off, they will relocate the client to a surgical unit that will help the client in physical activities to help them recover. These activities include ambulation, ROM, assistance with ADLs, introduce supportive equipment to aid in ambulation, and physical therapy. While on the surgical unit, the nurses will administer pain medication to help the client tolerate ROM so she can be discharged earlier. Rest, ice, compression, and elevation (RICE) are also incorporated into the treatment of a total hip arthroplasty, and crucial for the process of recovery.

The client concurrently has a Hx of arthritis as her secondary diagnosis for this hospitalization.

Definition: Arthritis is the inflammation and aching of joints all over the body. The two most common complaints of arthritis include joint discomfort and soreness. There are many types of arthritis, but the one that should be focused on is osteoarthritis. Osteoarthritis makes joints decompose. **Cause:** Causes of osteoarthritis include: deterioration of cartilage, swelling of joint coating, and alterations in osseous matter. **Signs & Symptoms:** Signs and symptoms of osteoarthritis are plentiful. Symptoms often include joint swelling and stiffness, loss in flexibility, popping of the joint during mobility, soreness, sensitivity, discomfort, and bone spurs.

Risk Factors: Risk factors of osteoarthritis include: obesity, age, joint damage, bone defects, gender, and recurring trauma to the effected joints. **Treatment:** To treat arthritis, NSAIDs are often recommended to treat inflammation, joint replacements, Tylenol to help with pain, ice to reduce swelling, elevation of extremity to reduce inflammation, and physical therapy.

Pathophysiology References (2) (APA):

Arthritis. National Institute of Arthritis and Musculoskeletal and Skin Diseases. https://www.niams.nih.gov/health-topics/arthritis/advanced. Accessed May 9, 2019.

T. Capriotti, Davis advantage for pathophysiology: introductory concepts and clinical perspectives, F.A. Davis, Philadelphia, 2020.

Laboratory Data (20 points)
If laboratory data is unavailable, values will be assigned by the clinical instructor

CBC Highlight All Abnormal Labs—Explanations must be in complete sentences and contain in-text citations in APA format.

Lab	Normal Range	Admission Value	Today's Value	Reason for Abnormal Value
RBC	4.10-5.70	**4.97**	*	
Hgb	12.0-18.0	**15.8**	**12.4**	
Hct	37.0-51.0%	**47.9**	**37.9**	
Platelets	140-400	**298**	*	
WBC	4.00-11.00	**9.5**	*	
Neutrophils	*	*	*	
Lymphocytes	*	*	*	
Monocytes	*	*	*	
Eosinophils	*	*	*	
Bands	*	*	*	

Chemistry Highlight All Abnormal Labs—Explanations must be in complete sentences and contain in-text citations in APA format.

Lab	Normal Range	Admission Value	Today's Value	Reason For Abnormal
Na-	136-145	**141**	**136**	
K+	3.5-5.1	**4.3**	**4.2**	
Cl-	98-107	**104**	**107**	
CO2	21.0-32.0	**26.0**	**24.0**	
Glucose	60-99	**90**	**171**	**The patient is on a regular diet. She has been eating foods high in carbohydrates, elevating her blood sugar.**
BUN	7-18	**15**	**22**	**She is likely dehydrated. It is predicted that she was NPO before her surgery, she does not have a sufficient amount of fluids. She should replenish her fluids lost from being NPO before surgery.**
Creatinine	0.70-1.30	**1.0**	**0.99**	
Albumin	*	*	*	
Calcium	8.5-10.1	**8.9**	**8.4**	**The client has a diet high in caffeine. She states she is always drinking soda, tea, or coffee. Caffeine makes it difficult for the body to absorb calcium.**
Mag	*	*	*	
Phosphate	*	*	*	
Bilirubin	0.0-1.2	*	*	

Alk Phos	35-105	*	*	

Urinalysis Highlight All Abnormal Labs—Explanations must be in complete sentences and contain in-text citations in APA format.

Lab Test	Normal Range	Value on Admission	Today's Value	Reason for Abnormal
Color & Clarity	Pale yellow, straw colored, or amber	**Yellow, clear**	***No repeat UA ordered**	
pH	4.5-8	**5.0**	*	
Specific Gravity	1.015-1.025	**1.009**	*	
Glucose	None	**Negative**	*	
Protein	Trace	**Negative**	*	
Ketones	Negative	**Negative**	*	
WBC	0-5	**0-5**	*	
RBC	0-5	**0-2**	*	
Leukoesterase	Negative	**Negative**	*	

Cultures Highlight All Abnormal Labs—Explanations must be in complete sentences and contain in-text citations in APA format.

Test	Normal Range	Value on Admission	Today's Value	Explanation of Findings
Urine Culture	No growth	***No cultures ordered**	*	

Blood Culture	No growth	*	*	
Sputum Culture	No growth	*	*	
Stool Culture	No growth	*	*	

Lab Correlations Reference (APA):

Pagana, K. D., & Pagana, T. J. (2018). Mosby's manual of diagnostic and laboratory tests. Sixth edition. St. Louis, Missouri: Elsevier.

Diagnostic Imaging

All Other Diagnostic Tests (10 points):

X-ray of right hip- Metal remains in the same location as positioned. No Fx or dislocations observed. Adjacent soft tissues are customary. Anticipated post-op result.

Current Medications (10 points, 2 points per completed med)
5 <u>different</u> medications must be completed

Medications (5 required)

Brand/Generic	**Hydrocodone-Acetaminophen Norco**	**Metaxalone Skelaxin**	**Naloxone HCl Narcan**	**Ketorolac Tromethamine Toradol**	**Ondansetron HCl Zofran**
Dose	1 tablet 10-325mg	1 tablet 800mg	0.4mg	15mg	4mg
Frequency	Q4h PRN	Q8h PRN	PRN	PRN	Q8h PRN
Route	PO	PO	IV	IV	IV
Classification	Opioid analgesic	Muscle relaxer	Opioid antidote	Analgesic	Antiemetic
Mechanism of Action	Block pain receptors on nerve cells in the	Weakens CNS, initiating tranquility,	Provokes receptors in CNS to repeal	Stops enzymes required to produce	Serotonin blocker, prevents N/V

	brain	limiting skeletal muscle tremors to deliver pain alleviation	sedation, respiratory declination, ecstasy, and pain relief.	prostaglandins. These enzymes facilitate inflammatory response and initiate vasodilation, swelling, and pain.	
Reason Client Taking	Pain control	Relax muscle spasms	Reverse opioid (Norco)	Pain control	N/V
Contraindications (2)	Hypersensitivity to acetaminophen, hypersensitivity to other opioids	Hypersensitivity to metaxalone or its components, significant renal or hepatic disease	Heart disease, hypersensitivity	Hx of GI bleeds, Concurrent use of other NSAIDs, such as Aspirin or Ibuprofen	Congenital long QT syndrome, hypersensitivity
Side Effects/Adverse Reactions (2)	Nausea, headaches	Drowsiness, vomiting	Severe hypertension, tremors	Dizziness, hyperglycemia	Weakness, anorexia

Medications Reference (APA):

Jones & Bartlett Learning. (2020). *2020 Nurse's Drug Handbook.* Burlington, MA.

Assessment

Physical Exam (18 points)

GENERAL:	
Alertness:	Alert
Orientation:	Alert & oriented to time, place, & self
Distress:	Pt appears to be in no distress
Overall appearance:	Well-nourished, well-groomed
INTEGUMENTARY:	
Skin color:	Pink
Character:	Dry
Temperature:	Warm
Turgor:	Good skin turgor
Rashes:	No rashes
Bruises:	No bruises

Wounds: . **Braden Score:** **Drains present: Y☐ N ☒** **Type:**	No wounds 20
HEENT: **Head/Neck:** **Ears:** **Eyes:** **Nose:** **Teeth:**	Normocephalic, neck supple, no tracheal deviation, strong carotid pulses bilaterally, rise/fall of thyroid noted, no JVD Pearly-gray tympanic membrane, mild cerumen bilaterally, ears symmetrical, no drainage PERRLA, EOM, eyes symmetrical, normal conjunctiva and sclera No deviation of septum, nose symmetrical, no polyps observed, no enlarged turbinates Gums pink, moist, and firm. Uvula normal. Tonsils present. Rise and fall of soft palette noted. No post-nasal drainage..
CARDIOVASCULAR: **Heart sounds:** **S1, S2, S3, S4, murmur etc.** **Cardiac rhythm (if applicable):** **Peripheral Pulses:** **Capillary refill:** **Neck Vein Distention: Y ☐ N ☒** **Edema Y ☐ N ☒** **Location of Edema:**	 Heart sounds normal S1 & S2 heard, no murmurs, gallops, or rubs Normal sinus rhythm Pedal pulse +3 bilaterally <3 seconds .
RESPIRATORY: **Accessory muscle use: Y☐ N ☒** **Breath Sounds: Location, character**	 Lung sounds clear, no adventitious sounds. .
GASTROINTESTINAL: **Diet at home:** **Current Diet** **Height:** **Weight:** **Auscultation Bowel sounds:** **Last BM:** **Palpation: Pain, Mass etc.:** **Inspection:** **Distention:** **Incisions:** **Scars:** **Drains:** **Wounds:** **Ostomy: Y ☐ N ☒** **Nasogastric: Y ☐ N ☒**	 Regular Regular 152.4cm (5’0”) 71.8kg (158lb. 4.6oz. Gurgling, normal 11/4 No pain, masses, or tenderness upon palpation No abdominal distention No incisions Healed, faded scar d/t hysterectomy No drains No wounds.

Size: **Feeding tubes/PEG tube Y ☐ N ☒** **Type:**	
GENITOURINARY: **Color:** **Character:** **Quantity of urine:** **Pain with urination: Y ☐ N ☒** **Dialysis: Y ☐ N ☒** **Inspection of genitals:** **Catheter: Y ☐ N ☒** **Type:** **Size:**	 Yellow Clear 200mL
MUSCULOSKELETAL: **Neurovascular status:** **ROM:** **Supportive devices:** **Strength:** **ADL Assistance: Y☒ N ☐** **Fall Risk: Y ☒ N☐** **Fall Score:** **Activity/Mobility Status:** **Independent (up ad lib) ☐** **Needs assistance with equipment ☐** **Needs support to stand and walk☒**	Strong pedal pulses bilaterally, normal capillary refill (<3 sec), warmth and dryness of skin, normal sensations, mild pain ROM limited in right knee d/t right hip replacement, otherwise normal ROM Walker, gait belt Weakness in right leg d/t right hip arthroplasty Walker, gait belt 3 Up with assist of 1 and walker w/ gait belt .
NEUROLOGICAL: **MAEW: Y ☒ N☐** **PERLA: Y ☒ N☐** **Strength Equal: Y ☐ N ☒ if no -** **Legs ☒ Arms ☐ Both ☐** **Orientation:** **Mental Status:** **Speech:** **Sensory:** **LOC:**	 Right leg weakness d/t right hip replacement Alert & oriented Cognitive of space, time, and location Married Articulate speech Mature and cognitive No gross focal neurological deficits Alert & oriented x3.
PSYCHOSOCIAL/CULTURAL: **Coping method(s):** **Developmental level:** **Religion & what it means to pt.:** **Personal/Family Data (Think about home environment, family structure, and**	 Quilting, friends, Bingo, cats, dog, husband Mature Catholic Lives at home w/ husband who will assist with care during recovery.

available family support):	

Vital Signs, 1 set (5 points)

Time	Pulse	B/P	Resp Rate	Temp	Oxygen
1105	60 Right finger	138/69 Left arm	18	36.6C 97.8F	98% Right finger

Pain Assessment, 1 set (5 points)

Time	Scale	Location	Severity	Characteristics	Interventions
1105	0-10 numeric 5/10 reported	Right hip, right knee	Moderate	Shooting, aching, burning	-Analgesics -Ice -Rest -Elevation

Intake and Output (2 points)

Intake (in mL)		Output (in mL)	
600mL	**P.O.**	**450mL**	**Urine**

Nursing Diagnosis (15 points)
Must be NANDA approved nursing diagnosis

Nursing Diagnosis	Rational	Intervention (2 per dx)	Evaluation
• Include full nursing diagnosis with "related to" and "as evidenced by" components	• Explain why the nursing diagnosis was chosen		• How did the patient/family respond to the nurse's actions? • Client response, status of goals and outcomes, modifications to plan.

1. **Impaired physical mobility related to acute post-operative pain, discomfort, weakness of the right leg d/t right hip surgery, and arthritis, as evidenced by impeded ROM, report of muscle spasms and weakness, "My pain is about a 5/10 at all times", "It hurts to even move", Hx of stroke, and disinclination to work with the interdisciplinary team to promote healing, exercise, and mobility.**	**The patient is having pain and discomfort upon moving. She is beginning to realize that it doesn't hurt so much when she lies still, so she will continue to do so to relieve the pain. It is critical that the pt understands the importance of early mobility after surgery. Without early mobility, she has an increased risk of developing a DVT. Because she has just had surgery, she will be weaker and in more pain than usual, impairing her usual mobility prior to surgery, and increasing her risk of falls. Though it is suggested that she be up and moving to prevent DVT, it is also hazardous for her to ambulate alone, therefore, she should have assistance with her ADLs when discharged.**	1. **Administer analgesics before activities and procedures** 2. **Consult with PT and OT to get the pt up and moving during the day to aid in impaired physical activity.**	**Goal met. Pt is receiving analgesics around the clock, and prior to any physical mobility. PT and OT consulted, working daily with the pt to recover. Pt is making progress ambulating to bedside commode and walking in the hallway with PT with a walker and gait belt.**
2. **Acute pain related to total right hip**	**Pain can cause a pt to become depressed,**	**1. Monitor and obtain VS Q4h, look for changes**	**Goal met. VS are obtained every 4 hours and closely monitored**

arthroplasty, arthritis, muscle spasms, old age, and worry as evidenced by "My pain is about a 5/10 at all times", agony upon RLE movement, loss of appetite, inability to perform ADLs, and guarding of effected extremity.	**hopeless, immobile, irritable, and angered. When the patient is discharged, hospital staff is responsible for preparing them to go home. A patient who has just had surgery is going to have acute pain. It is the job of the healthcare employees caring for the patient to educate her on how to deal with the pain so she can recover quickly. If she is unaware and uneducated on how to treat her pain, she will become immobile. In turn, this can increase her likelihood for DVT and cause severe depression to the pt.**	**in baseline to determine if pain is altering VS.** **2. Assess the pt's pain frequently by asking: location, characteristics, severity, duration, etc. so that the pt can be given pain medication as frequently as needed. After administration, it is important to assess the pt again and evaluate if the pain is relieved by analgesic administration.**	**in the event that pain elevates HR, BP, or RR. The pt is assessed for pain frequently by the nurse to describe the pain and treat it. After administration of analgesics, the nurse will assess the client again to evaluate the effectiveness of the medication.**

Other References (APA):

Concept Map (20 Points)

Subjective Data

Married
Pain reported 5/10
Dizziness
Muscle spasms
Catholic
Utilizes walker at home
Drowsiness
Forgetfulness d/t anesthesia
Nauseous d/t analgesic

Nursing Diagnosis/Outcomes

Impaired physical mobility **related to acute post-operative pain, discomfort, weakness of the right leg d/t right hip surgery, and arthritis, as evidenced by impeded ROM, report of muscle spasms and weakness, "My pain is about a 5/10 at all times", "It's uncomfortable to move", Hx of stroke, and disinclination to work with the interdisciplinary team to promote healing, exercise, and mobility.**

Outcome- **Goal met. Pt is receiving analgesics around the clock, and prior to any physical mobility. PT and OT consulted, working daily with the pt to recover. Pt is making progress ambulating to bedside commode and walking in the hallway with PT with a walker and gait belt.**

Acute pain **related to total right hip arthroplasty, arthritis, muscle spasms, old age, and worry as evidenced by "My pain is about a 5/10 at all times", agony upon RLE movement, loss of appetite, inability to perform ADLs, and guarding of effected extremity.**

Outcome- **Goal met. VS are obtained every 4 hours and closely monitored in the event that pain elevates HR, BP, or RR. The pt is assessed for pain frequently by the nurse to describe the pain and treat it. After administration of analgesics, the nurse will assess the client again to evaluate the effectiveness of the medication.**

Objective Data

Regular diet
Urine yellow/clear
Gums pink, moist, firm
PERRLA
Braden score: 20
Fall score: 3
Alert & oriented
VS
Well-nourished
Well-groomed
EOM

Patient Information

This is a 69 year old female that is hospitalized for a total right hip arthroplasty. She also has a history of arthritis, increasing her chances for osteoarthritis post hip replacement.

Nursing Interventions

Elevate RLE to reduce swelling and promote venous return
Administer analgesics around the clock
Administer antiemetic drugs to prevent and treat post-operative N/V
Ice right hip and leg to bring down inflammation and constrict blood vessels
Promote early ambulation, consult PT to work on ROM with pt
Administer anticoagulants to the pt to keep her from forming a DVT, as she's less mobile than usual
Place SCDs or plexis on the legs/feet of pt to promote venous return to the heart
Place the pt in non-skid socks to prevent falls when mobile
Activate the bed/chair alarm to alert staff if the pt is trying to get up without assistance