

Knee Replacement Surgery Preoperative Guide

Use This Tool to Help Prepare for Your Upcoming Knee Replacement Surgery



Welcome to Holy Cross Health's Joint Program

Thank you for choosing Holy Cross Germantown Hospital or Holy Cross Hospital

for your orthopedic care. Our experienced orthopedists and other members of your joint care team are ready to help you move forward to overcome your joint pain. Below is information that is essential as you prepare for your surgery and recovery. Please keep this with you and fill in the blanks as you can. Surgeon Name: _____ _____Identifying your Coach Name: ____ coach is a very important step in your surgery process. This person will assist you in your recovery, and he or she will need to be available 24 hours a day for your first 72 hours at home, following your discharge from the hospital. Your identified coach should also attend the pre-operative joint class with you, to learn more about their role. **Pre-operative Joint Class** Please call 301-754-8800 or visit HolyCrossHealth.org to schedule your pre-operative joint class, approximately one month prior to surgery. This class will teach you what to expect, how to prepare and how your coach will assist you throughout the process. You coach should attend the class with you. ☐ Schedule Your Pre-operative Work Up Appointment Make this appointment with your primary care provider for medical clearance for surgery. Appointment Date: _____ This appointment must occur within 30 days of surgery. **Pre-admission Call** You will work with a Holy Cross Health nurse to review your medications, fill out a pre-anesthesia questionnaire, review your pre-surgical diet and limitations, and follow up on other screenings, if needed. Please call 301-754-8200 to schedule your interview for Holy Cross Hospital or 301-557-6827 for Holy Cross Germantown Hospital. Interview Date:

If you have any questions, please call 301-754-7774 and someone from our joint care team will be happy to assist you.

Date of Your Surgery: ____

Arrival Time on the Day of Your Surgery: _____

Your Expected Discharge Time: _____

Your Surgery Time: _____

Important Phone Numbers

Your Nurse

Your Occupational Therapist

Your Physical Therapist

Your Surgeon

Your Primary Care Doctor

Joint Program Information

301-754-7774

Outpatient Pharmacy Holy Cross Hospital: 301-754-7820

Holy Cross Homecare: 301-557-CARE

Holy Cross Outpatient Physical Therapy: 301-754-7340

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Holy Cross Health's Joint Program

How to Prepare and What to Expect Before, During and After Joint Replacement Surgery



Moving Life Ahead

In this class we will also cover

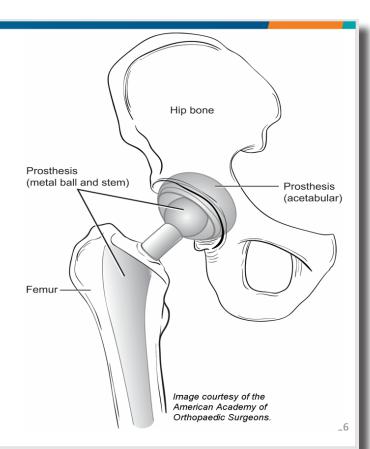
- Preparing for surgery
 - Having a Coach
 - Your hospital stay
- Planning to go home
- Preparing your home
 - Post-Op Services



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Hip Replacement

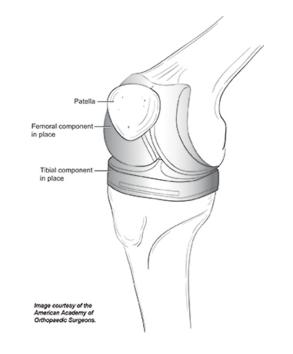
- The hip joint is a ball and socket joint.
 The implants are made with metal or ceramic and polyethylene
- The prosthetics relief from pain and improves mobility, function and quality of life





Knee Replacement

- Resurfaces the joint's bone ends with two to three component parts
- Metallica and polyethylene materials are used for strength and durability
- Offers relief from pain and improves stability, mobility, function and quality of life





Invest in Your Success By

- Preparing your home
- Reading your guide packet
- Exercising
- Practicing with your coach
- Attending the pre-operative class
- Requesting assistance
- Identifying equipment needs
- Noticing your improvements
- Getting back to an active life!









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Your Joint Team

- · Orthopedic Surgeon
- Anesthesiologist
- Nurses (RN)
- Physician Assistants (PA)
- Certified Nursing Assistants
- Physical Therapist (PT)
- Occupational Therapist (OT)
- Care Management/Discharge Planning
- · Coach or coaches!

YOU- You are the most important part of this team. You're preparing and participating in your care contributes to the best outcome!



Develop your TEAM'S plan with your COACH /COACHES

Transportation- your surgeon will clear you to drive
Exercise- start now to prepare your muscles for recovery
Activities of Daily Living-assistance with dressing & bathing
Medications and meals-medication timing, nutrition/hydration
Shopping

Any person or persons who can support you throughout the process:

- Should plan to stay with you at least the first 72 hours
- Should be involved from preparation through recovery and be physically able to assist you.
- > Review your guide packet together.





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Important Appointments and Actions Before Surgery

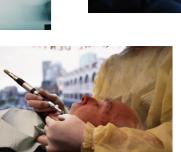
Required

- Pre-admission call: Holy Cross Health nurse will call you to review pre-op information including medications, anesthesia questionnaire and when to stop eating and drinking. They will inform you of when to come in for a COVID test.
- History and Physical: This is an appointment with your primary care physician. Your surgeon will indicate what tests you need. This should occur within 30 days of surgery.

Recommended

- Dental exam (within the past year)
- Advance Directives







Exercises Before Surgery

Improving your muscle strength before surgery is important for recovery.

2 sets of 15 repetitions of each exercise 2 times/day starting today!

1. Ankle pumps

3. Gluteal sets

2. Quadriceps sets

4. Chair push-ups

Exercise Safely

- Take short rest periods, as needed.
- Use slow and steady movements while exercising.
- Take slow, deep breaths during each exercise.
- Counting out loud for each repetition helps you keep track and breathe well.
- Do Not over-exert yourself.
- **Do Not** exercise in a cold room or immediately after a meal.
- Do Not continue to exercise if it causes increased pain. You can modify an exercise without eliminating it.

Stop exercising and contact your doctor if you notice chest pain, dizziness or excessive perspiration while exercising.

Ankle Pumps









Chair Push Ups







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Day Before Surgery

Follow eating and drinking guidelines:

- No food after midnight.
- You may drink clear liquids up to 4 hours before the time your surgery is scheduled to begin.

Remove all nail polish.

Lay out comfortable clothing for next day and complete your packing list

Review medication instructions, take only medication as instructed morning of surgery

Check arrival time and plan to arrive two hours before surgery

Call Your Surgeon if:

- · You have a fever or feel ill
- Cough
- Have a rash, abrasion or cut near your surgical site



Proper Nutrition can help Improve Recovery after Surgery

Undergoing surgery is like running a marathon.

Your body requires proper training and nutrition in the weeks and days before and after surgery for the best recovery.

Fuel your body with nutrient packed foods

Healthy diet rich in protein and omega-3 fatty acids

Proper hydration





Nutrition: Day Before Surgery Carbohydrate Loading

- Night before surgery
 - Drink 2 Ensure Pre-Surgery
 - Finish within 20-30 minutes
- 2 hours before you leave home for surgery
 - Drink 1 Ensure Pre-Surgery
 - Finish within 5-10 minutes



Contraindications

- DM Type 1
- Emergency surgeries
- Known with delayed gastric emptying (e.g. severe DM with anticipated gastroparesis)

Skin Preparation Before Surgery





Proven effective

and backed by published outcomes on reducing surgical site infections





Showering Before Surgery and Skin Preparation

- Shower as normal once per day for three days prior to your surgery.
- On the day before your surgery:
 - · Change your bed linens
 - · Shower before bed
 - **Do not** shave or use hair removal lotions (shaving hair with razor beginning at least 1 week prior to procedure, especially if near surgical site).
 - **Do not** apply creams, lotions, powder or makeup
 - Complete CHG bathing this is the Skin Prep Wipes to reduce the risk of surgical site infection
 - Wear newly laundered pajamas
 - No pets in your bed the night before!



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Preparing Your Skin Before Surgery

Preparing or "prepping" skin before your surgery can reduce the risk of infection at the surgical site. To make the process easier for you, Holy Cross Health has chosen disposable cloths moistened with a special, rinse-free 2% Chlorhexidine Gluconate (CHG) antiseptic solution. The steps below outline the prepping process that you should follow carefully.

Bathing Before Surgery

- Shower or bathe your body as normal once a day for three days before your surgery, using your own soap products.
- The day before your surgery, take an evening shower and wait at least one hour before you prep your skin with the antiseptic cloths.
- DO NOT shave or use hair removal lotions or creams on the area of your body where surgery will be done.
 Shaving can increase your risk of infection due to nicks from the razor.

Sage Wipes

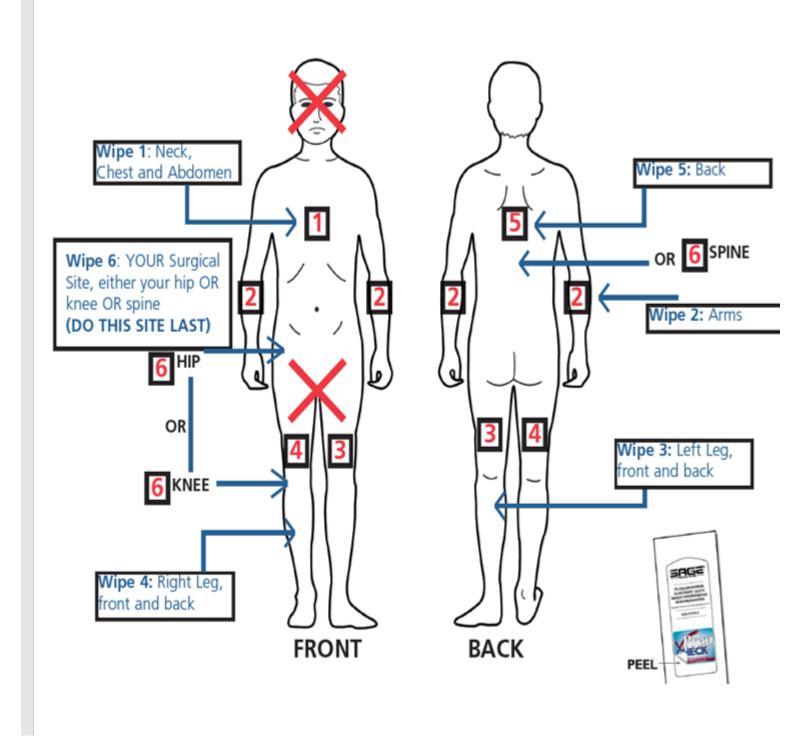
- Use one multi-pack of the disposable cloths to prep your entire body (this will include three inner packages, for a total of six wipes)
- To open each inner package, follow the "Tear Here" instructions on the back.
- Avoid contact with your eyes, ears, mouth and genitals. Do not wipe your rectal area.
- DO NOT microwave the package prior to use.

When NOT to Use the Wipes

Do not use the wipes if you:

- Are allergic to CHG
- Have severe skin breakdown, rash or burns
- Are receiving radiation therapy
- Are receiving thiotepa (chemotherapy drug)

Pre-operative Preparation Diagram



Instructions for the Night Before Surgery

Wipe down your body the night before your surgery, like you would with a washcloth. Begin wiping with the six cloths provided in the order listed below. Place in the trash after use on each body part.

- 1. The first cloth is for your neck, chest and abdomen
- 2. The second cloth is for your arms.
- 3. The third cloth is for your left leg.
- 4. The fourth cloth is for your right leg.
- 5. The fifth cloth is for your back.
- 6. The last cloth is for the surgical area, so this will be your second wipe down in that area. Wipe your surgical site last, moving back and forth for about three minutes making sure to wet the whole area.

Use all cloths in the packages (six total) and throw into the trash when finished.

Day of Surgery – Arrival to the hospital

- Arrive two hours before your scheduled surgery time
- Visit the **Information Desk** to be directed to Patient Registration and to pick up a visitor's pass for your coach.











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Please Bring to the Hospital

- Driver's license/photo ID
- Insurance card
- Advance Directive- forms for advance directives are available at <u>HolyCrossHealth.org</u>.
- Medication list only with dosage and time taken, please include over the counter supplements. My Medications List at HolyCrossHealth.org
- Glasses, hearing aids, dentures
- CPAP if stay/walker labelled with your name
- Loose fitting clothes and proper footwear
- Toiletries

Please Leave at Home

- Valuables including jewelry (if possible, remove your wedding ring)
- Cash greater than \$5
- Medications unless specifically instructed by our nurse



Registration

Sign in at Patient Registration:

- Confirm contact information
- Complete insurance paperwork. Your co-pay and or deductible may be due at this time.
- Submit Advance Directive
- Get your hospital ID bracelet

Please note that hospital charges are separate from the physician and anesthesia fees





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Surgery Department- Pre-op

You will be directed to the Ambulatory Surgery Department (ASD)

- This is where we will:
 - Confirm your information again
 - Start your IV
 - Review your consent
 - Perform another wipe down with the Chlorhexidine Gluconate (CHG) antiseptic cloths
 - Speak with your surgeon and your anesthesiologist







Operating Room

- Your Operating Room (OR) nurse will escort you on a stretcher to the operating room.
- Your Anesthesiologist will be waiting to begin anesthesia.
- The types of anesthesia can vary. Your surgeon and anesthesiologist will determine the best option with you. These include:
 - General
 - Regional (Epidural, spinal and peripheral nerve blocks)





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Anesthesia

Anesthesiologists are doctors who provide oneon-one medical care during surgery. During the procedure, the anesthesiologist:

- Provides comfort and safety;
- Manages preexisting medical conditions and problems that may develop during surgery;
- Monitors and controls blood pressure, heart rate, breathing and oxygen levels; and
- Gives medications to control pain.

General anesthesia is similar to a deep sleep. During surgery, you will not feel, see or hear anything. Serious complications from anesthesia are rare. Anesthesia is much safer and more effective than ever before.

 Nausea and vomiting may occur as the result of narcotic pain medicine, certain types of procedures, or the patient's history of nausea or motion sickness. There are several medications available that decrease the incidence of nausea and vomiting.

- Dental injury may be unavoidable. A tooth, cap or bridge may become chipped or loosened when the anesthesiologist is managing your breathing.
- Sore throat is common along with some tongue or lip swelling after surgery.
- Serious complications like heart or lung failure are most often related to the patient's preexisting health and medical condition.
- Heart and lung disease, high blood pressure, diabetes, smoking and severe obesity increase the risk of these complications.

Your anesthesiologist looks forward to meeting and taking care of you. Before your procedure, you will meet your anesthesiologist to discuss and finalize the best anesthetic plan for you. Your anesthesiologist makes this decision in consultation with your surgeon. He or she bases this decision on what is needed for your surgery, your medical history and health, and your wishes.

If you smoke, we encourage you to stop smoking. You can get help from the State of Maryland Quit Line at 1-800-QUIT-NOW (1-800-784-8669).

Post Anesthesia Care Unit

- After surgery, you will be transferred to a recovery room (PACU)
- We will continue to monitor your heart rate, blood pressure and other vital signs
- If you are staying overnight, PACU will let you know when you are being moved to your room

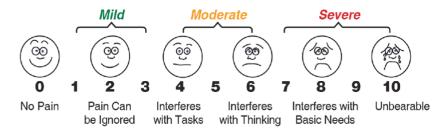




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Measuring Pain

- Think along the lines of under control as opposed to no pain
- Your nurse will ask about your pain level using a scale from 0 to 10



 Be proactive by using ice and frequent repositioning. Ask for pain medication when the pain starts to interfere with mobility.

Effective pain management helps prevent complications and allows you to fully participate in your recovery



Visitor Waiting Area

- At Holy Cross Hospital, your coach will wait in the hospital's main lobby area
- At Holy Cross Germantown Hospital, your coach will wait in the 2nd floor waiting area
- Your surgeon will update your coach after surgery





Private Room

Includes:

- Room-service-style meal delivery
- Free wireless
- Flat Screen TV







Your Most Important Challenges

Breathing

- ✓ Coughing and Deep Breathing
- √ Using the Incentive Spirometer 10x/hour



Moving

✓ Increase circulation by performing Ankle Pumps, Quad & Glut sets while in bed



- √ Walking moves air through your skin and lungs (with assistance)
- ✓ CALL DON'T FALL



- ✓ Use of ice
- √ Frequent repositioning
- √ Walking with assistance
- √ Timely pain medication



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During Your Stay, Your personalized care plan will consist of:

Nursing care

- Vital signs
- Labs
- Sequential Compression Devices (SCDs)
- Dressing changes
- Catheter
- Knee immobilizer as directed by surgeon(for total knee replacement only)
- Hip positioning as directed by your surgeon

Discharge planning

- Discharge in the am
- Needs for home including 24 hr. care from coach at least for the first few days
- Follow-up appointment with your surgeon within two weeks of discharge
- Discharge instructions including surgical site care, post-op pain control and post-op nutrition



Knee Replacement Pathway - Day of Surgery

	tus:
	EXPECTATIONS
ACTIVITY:	 Surgery Transfer from your recovery room to your private patient room. Use your incentive spirometer every hour. Sit/stand at the bedside with assistance. Complete calf/ankle exercises while in bed. Wear your knee immobilizer while in bed.
NURSING:	 Start eating a diet as tolerated. Your vital signs will be taken routinely. Your intake and output will be monitored. Wear your pneumatic stockings to prevent clots. Work in collaboration with your nurse to manage your pain. You may have blood drawn or other lab work/tests.
PHYSICAL THERAPY (PT):	Start physical therapy today.
OCCUPATIONAL THERAPY (OT):	Start occupational therapy today.
DISCHARGE PLANNING:	Discharge planning continues
ADDITIONAL NOTES:	

Knee Replacement Pathway - Post Surgery Level 1

Date:	Weight Bearing Status: Diet:
	EXPECTATIONS
ACTIVITY:	 Sit out of bed/in chair for all meals. Walk to the bathroom with assistance. Use your incentive spirometer every hour. Wear your knee immobilizer. Complete exercises while in bed. Begin anticoagulant (blood thinner) education.
NURSING:	 Your vital signs will be taken routinely. Your intake and output will be monitored. Pneumatic stockings will be removed. Work in collaboration with your nurse to manage your pain. You may have blood drawn or other lab work/tests. Review patient education sheets.
PHYSICAL THERAPY (PT):	 PT evaluation at a.m. PT at p.m. You will work on: Increasing the range of motion of your knee Transfers Walking Exercises Learning to use an assistive ambulatory device
OCCUPATIONAL THERAPY (OT):	 OT evaluation at a.m. as schedule permits. You will work on: Transferring on/off the toilet Activities of daily living (ADLs) (such as bathing, dressing, shower, tub transfer)
DISCHARGE PLANNING:	Evaluation and review for discharge.Start coordinating equipment and home health needs.
ADDITIONAL NOTES:	

Knee Replacement Pathway - Post Surgery Level 2

Date:	Weight Bearing Status: Diet:
	EXPECTATIONS
ACTIVITY:	 Sit out of bed/in chair for all meals. Walk to the bathroom with assistance. Use your incentive spirometer every hour. Complete exercises while in bed. Continue anticoagulant (blood thinner) education.
NURSING:	 Your vital signs will be taken routinely. Your intake and output will be monitored. If you still have IVs, they may be discontinued. Remember to ask for pain medication 30 minutes prior to your PT/OT sessions and as needed. You may have blood drawn or other lab work/tests. Review patient education sheets.
PHYSICAL THERAPY (PT):	 PT evaluation at a.m. PT at p.m. You will work on: Increasing the range of motion of your knee Transfers/walking Stair training Exercises Practice using an assistive ambulatory device Reviewing a home exercise program
OCCUPATIONAL THERAPY (OT):	 OT evaluation at a.m. as schedule permits. You will work on: Transferring on/off the toilet Activities of daily living (ADLs) (such as bathing, dressing, shower, tub transfer) Reviewing strategies for doing ADLs at home
DISCHARGE PLANNING:	 Review discharge needs. Discuss equipment ordered and home care services. Review discharge procedure.
ADDITIONAL	

NOTES:

Knee Replacement Pathway - Post Surgery Level 3

Date:	Weight Bearing Status: Diet:
	EXPECTATIONS
ACTIVITY:	 Discharge home. You will go home once cleared by your physician. Goal is to be picked up by 11 a.m. You will be transported downstairs by wheelchair.
NURSING:	 Medicate for pain as needed. REVIEW PATIENT DISCHARGE INSTRUCTIONS. Precautions Medications Pain medication Activity Care of surgical site Anticoagulation
PHYSICAL THERAPY (PT):	 PT at p.m. You will work on: Increasing the range of motion of your knee Transfers/walking Stair training Exercises Practice using an assistive ambulatory device Reviewing a home exercise program
OCCUPATIONAL THERAPY (OT):	 OT at a.m. as schedule permits. You will work on: Transferring on/off the toilet Activities of daily living (ADLs) (such as bathing, dressing, shower, tub transfer) Reviewing strategies for completing ADLs at home
DISCHARGE PLANNING:	 Review discharge needs. Confirm equipment. Review home care services for RN and/or PT/OT. Review discharge procedure.
ADDITIONAL NOTES:	

Therapy at the Hospital will see you the same day!

Physical Therapy

- Transfers including from sitting to standing, and bed mobility
- Walk with an appropriate assistive device
- Practice stair safety
- Exercise and work on range of motion
- Education on fall precautions and joint precautions

Occupational Therapy

- Work on bathing, dressing and personal care
- Recommend adaptive equipment and show you how to use it
- Education on home safety and fall precautions







The rehabilitation gyms at Holy Cross Germantown Hospital (left) and Holy Cross Hospital (right).

Outpatient Pharmacy

Holy Cross Hospital has an outpatient pharmacy located on the first floor. The following insurances are NOT accepted:

- UnitedHealthcare
- Priority Partners
- Amerigroup

- Medicare Part A or Part B
- Medicare Part D
- Some Aetna carriers

Holy Cross Germantown Hospital does not have an outpatient pharmacy.

Home Safety After Surgery

- Keep items you use often within easy reach
- Sit in a chair with arms rests and avoid low chairs
- Remove throw rugs and loose carpeting
- Move electrical cords out of the way and keep walking paths clear of clutter
- Wear proper footwear to prevent slipping
- Secure pets to avoid tripping

HC HOLY CROSS

Secure handrails on all stairways

Bathroom Safety After Surgery

- Hand-held shower head for easier bathing
- Long-handled sponge to wash hard to reach areas and maintain precautions
- Grab bars in your shower or tub as shown in picture
- Bath bench or shower chair as recommended by your therapist
- Commode chair, raised toilet seat or safety frame for safety

Adaptive equipment that may help with mobility and safety after surgery















Items that may improve your bathing safety

- Showers are generally permitted, but not tub soaks.
- Your discharge instructions should tell how to protect/care for your incision during showering.
- The first few times you shower, have a family member or caregiver stay close enough to assist if needed.



into the shower, sit or stand at the sink to sponge bathe.

If you don't feel safe getting

 You may want a shower seat to use in the shower.



 Have nonskid surfaces on the bathtub and shower floors.



 A long-handled sponge or brush makes it easier to wash your legs and feet.





Pre-op Home Safety Assessment (301)557-4663 (HOME)



- Holy Cross Health has teamed up with Holy Cross Home Care to offer a preop assessment of your home.
- Performed by a physical therapist prior to surgery
- This is a concierge service currently not covered by insurance.
- The hospital and homecare share the cost of the visit to help you prepare your home for safer recovery after surgery.
- This is recommended not required to assist you in planning for your recovery at home



Holy Cross Homecare (301)557-CARE

Pre-op Home Safety Assessment



PRE-OPERATIVE HOME & FUNCTIONAL SAFETY ASSESSMENT

Getting ready for surgery

offers a pre-operative home assessment visit conducted by a Holy Cross Home Care therapist.

This assessment will identify equipment needs or environmental concerns that you may face following your

Post-op Homecare





Holy Cross Physical Medicine and Rehabilitation (301)754-7340

Holy Cross Hospital offers in-person as well as virtual outpatient physical and occupational therapy.









"Physical therapy can at times be painful, but the people here make it pleasant, and the atmosphere makes it conducive to healing...I especially appreciate having one-on-one sessions with the same therapist."

- Myrna, physical therapy patient.

Congratulations!

Completing this class is an important step toward a successful joint replacement surgery!

To learn more about Holy Cross Health's Joint Program, visit HolyCrossHealth.org/joints or call 301-754-7774.

For additional information: Laura Collins PT,DPT Joint Coordinator Holy Cross & Holy Cross Germantown Hospital (301) 754-7341 collil@holycrosshealth.org

Holy Cross Hospital in Silver Spring Leesa Wishart, BSN, RN, CPN Director, Joint and Spine Center 301-754-7648 wisharle@holycrosshealth.org



Sue is back on her bike after joint replacement surgery.

"I was up and around right away with physical and occupational therapy the day of my surgery [and] each day in the hospital, I could do more and more. The best thing was that every staff member on the floor cheered me on with every step I took."

Read patient stories at HolyCrossHealth.org/patient-stories-joint-replacement.



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Pre-Operative Home and Functional Safety Assessment

Holy Cross Home Care offers a Pre-operative Home and Functional Safety Assessment to evaluate and overcome any barriers to safely returning directly home after joint replacement surgery. A licensed physical therapist can visit your home prior to surgery and help you identify what level of support, assistance and equipment you need, as well as suggest other preparation for recovering safely at home. This program is optional and has a cost to you of \$50. To schedule an assessment, call 301-557-HOME (4663).