PURPOSE

To better prepare you and your family for your upcoming total joint surgery through education on both the pre-operative and post-operative course of treatment.

CAMPBELL CLINIC MISSION STATEMENT

To provide unsurpassed patient care while being recognized as a leader in teaching and research in the profession of orthopaedic surgery. As one of the world's premier practicing and teaching orthopaedic centers, we dedicate ourselves completely to the advancement of orthopaedic techniques in order to better serve our patients.

DISCLAIMER

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ANATOMY

- The hip is one of the largest weight-bearing joints.
- It is a ball-and-socket type of joint.

Components of the healthy hip

Ball (femoral head)

• Top of the thigh bone (femur)

Socket (acetabulum)

• Ball fits into the round socket in your pelvis (acetabulum)

Ligaments

- Bands of tissue that connect the ball to the socket
- Provide joint stability

Articular cartilage

- Covers bone surfaces of the ball and socket
- Cushions bone surfaces
- Allows ease of movement

Synovial membrane

- Covers all remaining surfaces of the hip joint
- In the healthy hip, synovial fluid lubricates the joint to decrease friction and allow movement.



The Problem Hip

- Cartilage becomes worn and no longer serves as a cushion.
- Roughened bones rub together like sandpaper.
- The ball can "grind" in the socket and this leads to pain and stiffness.



X-ray: patient with right hip osteoarthritis

Common Causes of Hip Pain

• *The most common cause of disability/dysfunction is arthritis.

Osteoarthritis (OA)

- o Usually occurs in people 50 years and older
- o Usually a family history of arthritis
- The cartilage that cushions the bones softens and wears away, resulting in the "bone on bone" terminology.
- o PAINFUL

• Rheumatoid Arthritis (RA)

- o Autoimmune disease
- Synovial membrane becomes inflamed and thick, producing too much synovial fluid that damages the articular cartilage.
- Pain and stiffness

• Traumatic Arthritis

- o Serious hip injury
- o Fracture
 - Can cause osteonecrosis (bone death)
- o Articular cartilage is damaged.

Indications for total hip arthroplasty

- 1. Hip pain that limits your everyday activities (walking, bending, sleeping)
- 2. Hip pain that continues while at rest (groin, buttock pain, etc.)
- 3. Stiffness in the hip that limits your ability to move or lift the leg
- 4. Little pain relief from anti-inflammatory medications
- 5. Harmful or unpleasant side effects from hip medications
- 6. Failed conservative treatment including PT or ambulating with assistive device (cane) or activity modification
- If you have experienced these indications, you are a candidate for a total hip arthroplasty.

Contraindications for total hip arthroplasty

- 1. Infection
- 2. Medical co-morbidities (illness)
- 3. Neuropathic joint disease
- 4. Neurological dysfunction
- 5. Morbid obesity

TOTAL HIP ARTHROPLASTY

- Surgical procedure in which the diseased parts of the hip are removed and replaced with new, artificial parts.
- The Centers for Disease Control and Prevention (CDC) reports that more than 300,000 total hip arthroplasties (THA) are performed every year in the United States; this number is increasing every year.
- The American Academy of Orthopaedic Surgery (AAOS) reports that THA was first performed in the US in the 1960s.
- Results of THA are good
 - 90% to 95% of patients experience complete or nearly
 complete pain relief compared to their pre-operative pain

Goals of THA

- Pain relief
- Improved hip range of motion (ROM)
- Increased hip strength
- Standing and walking that are not limited by the hip
- Improved functional status

Components of the new hip

- Many different types
- Acetabular component
 - o Usually plastic liner inside a metal socket
- Stem
 - o Placed into the femur for stability
 - Usually titanium
- Ball
 - o Replaces the head and neck of the femur
 - o Usually cobalt, chrome, or ceramic





NEW HIP COMPONENTS



Orthopaedic evaluation

- 1. Detailed medical history
- 2. Full evaluation from your general practitioner and any other specialist key to your overall health
- 3. Physical examination

Hip mobility

Strength

Alignment

Leg length

4. X-rays or other tests required by your orthopaedic surgeon

MRI

Bone scan

Bone density test

Blood tests

Your surgeon will choose the implants BEST suited for your condition. He/she will review all components, benefits, and risks for your condition.

Different surgical approaches and post-operative precautions

• Posterior-lateral

- o No hip flexion greater than 90 degrees
- o No hip internal rotation (toes in) past neutral
- o No hip adduction (crossing midline) past neutral

• Anterior-lateral

- o No hip extension
- No hip external rotation (toes out)
- No adduction
- o No FABER (flexion, abduction, external rotation)
- o Step-to gait



• Direct anterior (discussed in detail on page 15)

- o No extreme extension
- o External rotation beyond 40 degrees



Risks and Complications of THA

- *Reminder:* <u>ALL</u> surgical procedures have risks.
- If complications occur, MOST are successfully treated.
 Complications may prolong or limit full recovery.
- Serious complications occur in less than 2% of patients.
- Chronic illness may increase the risk for complications.

This is not a complete list of complications and risks. Please take notes and discuss with your family, friends, primary physician, and, most important, your orthopaedic surgeon.

Risks

- Pain
- Blood clots (deep vein thrombosis, DVT)
- Fracture
- Anesthesia reaction
- Infection
- Loosening of a component
- Dislocation of the hip
- Heart attack

- Stroke (cardiovascular accident, CVA)
- Death
- Urinary tract infection
- Leg-length discrepancy (LLD)
- Limited range of motion (hip flexion contracture)
- Paralysis or damage to nerves or blood vessels in and around the hip

Pain

- Temporary pain is common after surgery.
- Some patients receive a spinal block (single injection).
- Pain management (medications and other treatments)
 - o Keeps you more comfortable
 - o Improves early mobility
 - Allows you to begin physical therapy more quickly and improves progress.
- Take medication as directed (discuss medication with your MD).
- Get on a schedule to take pain medication with a meal 30 minutes to an hour before physical therapy.
- You may use ice and elevation for 10 to 15 minutes at a time to prevent swelling and decrease pain.
 - o *Remember*: swelling and bruising in the leg and numbness around the incision are to be expected.
- Pain usually decreases over the first few days after surgery and gradually disappears after a few months.

Blood clot (deep vein thrombosis or DVT)

- Most common complication after hip replacement surgery
- Occurs in the leg veins
- Can dislodge and cause a blocked artery in the lungs causing pulmonary embolism (PE)
- If you experience any symptoms of DVT (listed on page 25) while in the hospital or at home, call you doctor ASAP!

Anesthesia reaction

- It is important to tell both the surgeon and the anesthesiologist if you have ever had a reaction to anesthesia or pain medication in the past, or if you have any known allergies, to decrease your risk of a reaction.
- Newer and safer drugs, along with advances in monitoring equipment, make anesthesia safer than ever before.
- 1 in 3,000 people have a reaction.
- Risks are related to your general medical condition and function of your heart, lungs, and kidneys.
- You are *required* to have medical clearance from your primary care physician before surgery.

Infection

- Most feared complication with any surgery
- Ratio is 1:250 to 1:500 (CDC)
- May occur in the wound or deep around the new joint
- Antibiotics are given before, during, and sometimes after surgery to reduce the risk of infection.

• Most common causes

- Bacteria that enters the bloodstream during dental procedures, urinary tract infections, or skin infections
- o Bacteria can lodge around the implant, leading to infection.

Minor infections

o Treated with antibiotics and/or local wound care

• Major (deep) infections

- o Rarely occur
- o May require more surgery or removal of the artificial joint

Loosening and/or dislocation of the new joint

- Loosening and/or dislocation of the new joint within the bone is rare.
- Both may cause increased pain, but dislocation is emergencyroom pain (10 on a scale of 0 to 10)
- Follow precautions and perform exercises as directed to help avoid dislocation.

• Causes of dislocation

- o Extremes of motion (e.g., yoga)
- o Falls
- Pivoting sports (e.g., racquetball, tennis)
- Contact sports

Causes of loosening

- o Running
- Being overweight
- Heavy labor
- o Fracture
- o Wearing away of the bone around the prosthesis (osteolysis)

• Prevention of loosening/dislocation

- o Prevent falls
- Follow directions and precautions prescribed by your MD and PT.
- Follow AAOS guidelines for safe exercises and recreational activities (listed on page 46).



Leg-length discrepancy (LLD)

- Do NOT worry about this.
- Surgeon will take this into account.
 - o *Remember:* the arthritis before surgery made the surgical leg shorter and the surgery is restoring a more normal joint height.
- May occur or seem worse after hip replacement
 - Cannot truly assess until full strength and mobility have been restored
- May require a shoe lift after surgery

Revision surgery

- THA is a successful surgery, especially for pain relief and return to function, BUT the wear and tear over time may cause changes that require further surgery, such as a revision.
- Most artificial joints last 15 to 20 years.
- Because more people are having joint replacement at a younger age, revision surgery is becoming more common.

• Revision is considered if:

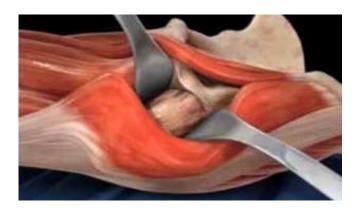
- Medication and lifestyle changes do not relieve pain and disability.
- X-rays show bone loss, wearing of the artificial joint surfaces, or prosthesis loosening.

• Other reasons for a revision:

- o Fracture
- Dislocation of artificial parts
- o Infection

DIRECT ANTERIOR APPROACH

- Less invasive, fewer hip precautions
- Muscle-sparing procedure in which muscles are stretched and not cut
- Faster recovery time (those who meet the criteria may have surgery on an outpatient basis)
- Remember: Everyone heals at a different rate



Pre-operative checklist

	Complete physical examination by a primary care physician
	Tests before surgery
	Blood and urine
	Electrocardiogram (EKG)
	Chest x-ray
	Preparing skin/leg
	No current infection or irritation
	No chronic swelling
	Medications
	Take a list of your current medications to your MD appointment
	to be advised if you need to discontinue any of the medications
	before surgery.
	Dental evaluation
	Incidence of infection after THA is low. Bacteria can enter the
	bloodstream and cause infection. It is recommended that
	treatment for significant dental disease or dental work be
	completed before surgery.
	Follow MD-specific pre-operative guidelines
	Appropriate body mass index (BMI)
	Controlled diabetes
	Smoking cessation
	Complete Campbell Clinic pre-hab program

	nat do i take to the hospital.
	Insurance cards, proper identification, and other pertinent paperwork
	Walker or other assistive device fitted by your physical therapist.
	Write name on each item
	Pants, pajama pants, or shorts that are easy to put on
	Rubber-soled shoes with a back (NO slide-on slippers)
	A list of all medications. (including vitamins and supplements)
	Personal hygiene items (underwear, toothbrush, hairbrush, etc.)
	If applicable, glasses, hearing aid, CPAP
	Cell phone, charger, change for vending machines for those assisting
	you
	Any other item noted on your surgical paperwork from MD
	Do NOT take valuables (e.g., jewelry, cash, etc.)
	Do NOT take any of your own medication unless directed to do so by
	your MD.
Note	es:

Pre-operative social planning

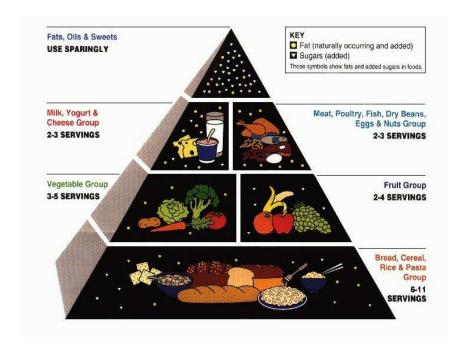
What do I take to the hospital?

- If you live alone, make arrangements before surgery.
 - You <u>must</u> make arrangements in advance to have someone assist you.
 - You will need a driver for 2 to 6 weeks, depending on the operative leg and your functional status
- After surgery, we **do not** recommend a stay in an extended-care facility.

- *Reminder:* Each patient is different and most do not need around-the-clock care.
- You will be able to walk with a walker or a cane soon after surgery,
 but may need assistance for several weeks with tasks such as driving,
 shopping, cooking, bathing, laundry, etc.

Nutritional considerations

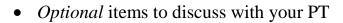
- You will not always feel hungry, but we recommend eating frequent small meals following the American Heart Association guidelines (see references).
- Try to eat a balanced diet that includes iron rich foods and plenty of fluids.
 - If you have a medical condition that requires a special diet, follow your MD's guidelines
- To prevent upset stomach, try adding a carbohydrate (piece of toast, crackers, bagel, etc.) when taking pain medication.



Pre-operative home planning:

We suggest you make modifications before surgery to ease navigation of your home after surgery.

- Move loose rugs, cords, and furniture to allow you to move freely and safely through the house with a walker.
- Temporary living space or a bedroom on the first floor is recommended by some physicians.
- Add handrails to stairs and in the shower if needed for safety.
- Add nightlights for safety, especially in the bathroom.
- Place phone next to chair or bed.
- Add non-skid mats in the bathroom (tub/shower/floor).
- Use a stable chair with arms and firm seat cushion to allow ease in sit-to-stand transition.



- o Not required for anterior approach
- Toilet chair/riser
- o Shower/tub chair
- Hip kit (reacher, sock aid, long-handled sponge, elastic shoe laces, long-handled shoe horn)



Shower modifications: handrail, stool, adjustable shower



Hip kit

The night before surgery, follow all guidelines provided by your MD.

THE OPERATION

- *Remember*: Any total joint surgery is considered MAJOR surgery.
- Our goal is to ensure that you are well informed and well prepared.
 - o If you have ANY questions, please ask your MD or PT.
- The procedure takes 1 to 2 hours or less.

Before surgery

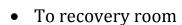
- You will be admitted to the hospital or, if you are a candidate, you will have surgery at the Campbell Clinic Outpatient Surgery Center.
- Surgery preparations
 - o Number of measurements are taken
 - o Surgery leg identified
 - o Meeting with anesthesiologist

THE PROCEDURE

- An incision is made on the front of the hip and the hip flexor muscles are stretched apart.
- The ball (femur) and socket (acetabulum) are prepared.



- The new ball and socket are implanted.
 - Surgeon checks for good range of motion and stability.
- The incision is closed.
 - Stitches will be on the inside with skin glue on the outside. A surgical bandage of the MD's choice may be placed over the incision.







RECOVERY ROOM

Will stay in recovery for 1 to 2 hours for monitoring

- *Remember:* You will have a surgical dressing, compression boots to increase blood flow, and possibly a pillow on the outside of your leg to prevent you from turning your toes out until the anesthesia wears off.
- A physical therapist (PT) will assist you in walking with your assistive device either in the recovery room or when you get to your room.
- You will be discharged the SAME day as your surgery, or, if the MD finds it necessary, you will stay ONE night.

Exercise

- Begin as soon as you awake from surgery ankle pumps
- To avoid lung congestion, breathe deeply and cough frequently to clear your lungs.
- Your exercises will be based on your individual needs and will be provided by your PT.
- Please refer to your handouts for your prescribed exercises.







Anterior Total Hip After Surgery Exercises

Early Post-operative Exercises (1-2 Weeks)

Total Hip Replacement Anterior Approach

- These exercises will improve your range of motion, aid in preventing blood clots, and restore early mobility in preparation for physical therapy.
- Our goal is to speed your post-operative recovery.
- These exercises should be performed daily on both legs for best results.
- Only perform the checked exercises provided by your physical therapist (PT).
- Remember to change positions frequently. Refer to pre-hab book for safe sitting, sleeping, transitioning, etc. Use the appropriate assistive device to prevent falls.
- If you have pain, please talk to your PT about how to modify the exercise. Swelling and soreness in your leg is expected after surgery.
- Remember to respect the healing process.

^{*}please follow MD and PT specific guidelines. Not every patient performs all exercises noted on this handout. PT will highlight specific exercises during prehab and post-operatively.

Ankle Pumps



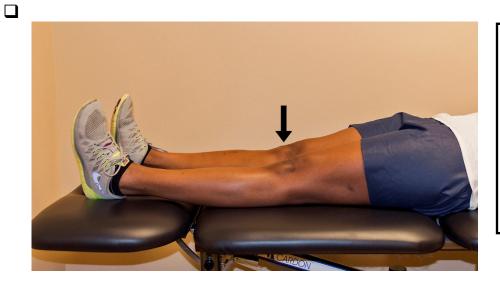
Repeat: 10 times
Perform throughout
the day to increase
circulation and

prevent blood clots.



- 1. Lie flat on your back with legs straight and toes pointed towards the ceiling.
- 2. Move feet up and down, as if you are pushing a gas pedal.

Quad Sets



Hold: 5 seconds
Repeat: 10 times
Sets per session: 3
Sessions per day: 2-3

- 1. Lie flat on your back with legs straight and toes pointed towards the ceiling.
- 2. Push your knees down, tightening thighs.

Glut Squeezes



Hold: 3-5 seconds Repeat: 10 times Sets per session: 2-3 Sessions per day: 2-3

- 1. Lie flat on your back with toes pointing towards the ceiling (you also may do these sitting).
- 2. Tighten the buttock muscles.

Short Arc Quad (Terminal Knee Extension)



Repeat: 10 times Sets per session: 2-3 Sessions per day: 1

- 1. Lie flat on your back with your uninvolved leg bent.
- 2. Take a ball or pillow and place it under the knee of the involved leg.
- 3. Let the leg relax over the ball or pillow.

4. Slowly straighten the knee by tightening the muscles on the top of the thigh, while keeping the back of the knee on the ball or pillow.

Knee Extension (Long Arc Quad)



Repeat: 10 times Sets per session: 2-3 Sessions per day: 1

- 1. Sit on the edge of a bed, mat, or chair.
- 2. Slowly straighten the knee then lower slowly.
- 3. Exercise can be done with up to 5 lbs. of weight or without weight, keeping in a pain-free range.





Repeat: 10 times Sets per session: 2-3 Sessions per day: 1

- 1. Hold onto a stable object (kitchen counter or walker). Point your toes forward.
- 2. Rise up on the balls of your feet and back down to the ground.

Weight Shifts





Repeat: 10 times Sets per session: 2-3 Sessions per day: 2

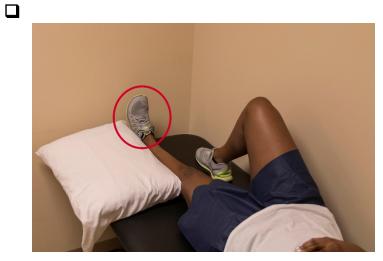
- 1. Stand, hold onto a stable object (kitchen counter or walker), point your toes forward, and shift weight side to side.
- 2. May shift weight in different directions as prescribed by PT.



Time : 10-15 minutes Sessions per day: at least 2x per day early
on

- 1. Elevate leg lengthwise on pillows (do not let the toes turn out).
- 2. Place ice pack over the surgery hip and rest for 10-15 minutes
 - Place pillowcase between ice and skin.
- 3. Do NOT ice longer than 15 minutes.

Sleeping Positions



- 1. Lie on your back with pillow on outside of surgery leg to prevent leg from turning out.
- 2. Place pillow between knees for side lying.



DIRECT ANTERIOR APPROACH PRECAUTIONS

Please discuss with your MD and PT, because you may have individual precautions.

NO EXTREME HIP EXTENSION

- Do not take a large step backwards with your operative leg.
- Walk with your normal stride.

NO EXTERNAL ROTATION (ER) PAST 40 DEGREES

- Do not turn your toes out.
- Place a pillow next to your lower leg (knee and ankle) while in bed (see next page).
- Avoid bending your leg back and out when getting out of the bathtub.
- Avoiding bending your leg back and out when putting on shoes and socks (no crossing legs).







NO TWISTING OR PIVOTING

• Lift and turn your leg

KNEELING

• You may kneel on both knees, but avoid single-leg kneeling.

SLEEPING

- Place a pillow on the outside of your leg to prevent toes from turning out.
- When ready to roll to your side, place a pillow between your knees to support your hip and spine.





How long do I have to follow these precautions?

- Typically, most procedures require strict precautions for 6 weeks. You should always ask your MD and PT.
- Extremes of motion or hip position should be avoided forever; for example, avoid extreme extension and turning the toes out.
 - o Example: yoga



SIGNS OF DVT (blood clot)

- Severe calf or thigh tenderness or soreness
- Redness, swelling, and warmth around the incision and lower leg that does not decrease with rest and elevation

SIGNS OF PULMONARY EMBOLISM (PE)

- Difficulty breathing or shortness of breath
- Coughing with pain in the chest

HOW DO I PREVENT A BLOOD CLOT?

- Ankle pumps and other leg exercises that increase blood flow.
 Pump your ankles up and down, as if you are pushing a gas pedal.
 Repeat for 20 to 30 repetitions and repeat every 15 to 30 minutes throughout the day, especially while immobilized.
- 2. Periodic elevation of the legs
- 3. Medication to thin blood (anti-coagulants) as prescribed by your MD Aspirin, Heparin, and Lovenox are most commonly used.
- 4. Compression boots (plastic boots that inflate with air to compress leg muscles)

You will wake up in the recovery room with these on your feet and will use them until you are walking.







WARNING SIGNS OF INFECTION

- Fever over 101° Fahrenheit measured with a thermometer
- Severe joint pain or increased joint pain
- Incision draining longer than 7 days

- Increased drainage
- Increased redness
- Odor
- Increased warmth around incision

Many of these symptoms are common with normal recovery, but you should notify your MD if you experience any of them.

INFECTION PREVENTION

- Please refer to discharge instructions on your specific surgical dressing.
- Keep incision clean and dry.
- If you have a waterproof dressing, you may shower and pat dry.



- If you do NOT have a waterproof dressing, you may remove the bandage to shower per MD orders. After shower, ensure incision is dry (pat dry with a clean towel) and replace light gauze dressing.
- If excessive drainage is soaking through gauze type dressing, notify
 MD assistant and change surgical dressing.

ACTIVITIES OF DAILY LIVING (ADLs)

After pre-hab, practice all ADLs in your own environment before surgery.

How do I get out of bed?

- NEVER try to get out of bed the first time without help from the hospital staff.
- Always wear non-skid socks or a pair of rubber-soled shoes with a back.
- *Remember*: Your leg will feel heavy and difficult to lift and may be bruised and swollen.
- If you need a stool to get out of bed, please let your PT know.
- 1. Scoot to the edge of the bed.
- 2. Use your arms to push up to a sitting position.
- 3. Use the uninvolved leg and arms to bring your surgical leg off the side of the bed. (DO NOT twist the leg, turn toes out, or let your leg go behind you into extension.)





- 4. Place the involved leg slightly in front of the uninvolved leg.
- 5. Push up from the bed with your arms. DO NOT pull up on the walker.
- 6. Stand for 30 to 60 seconds to get your balance.
- 7. You are now ready to walk.



How do I get into bed?

- 1. Get close to the head of the bed.
- 2. Back up until you feel the bed against the back of your legs.
- 3. Place the involved leg slightly in front of the uninvolved leg.
- 4. Reach down for the bed with your arms and lower yourself slowly to the edge.
- 5. Turn your body with the help of your arms supporting the involved leg until you are straight in the bed.
 - You may use your uninvolved leg to assist the involved leg into bed.
 - Do not turn your toes out.

How do I get into a chair or onto the toilet?

- 1. Back up until you feel the chair or toilet against your legs.
- 2. Slide your involved leg forward and reach back with your opposite hand. Follow with your other hand to slowly lower yourself to the chair/toilet.
 - Use the arms on the chair to assist.
 - Use safety bars in the bathroom, if available.



How do I get off of the chair or toilet?

- 1. Slide to the edge until both feet are on the floor.
- 2. Slide the involved leg forward.
- 3. Push yourself up with your arms and uninvolved leg.
 - One arm can be on the chair/toilet and one on the walker OR place both arms on the chair/toilet to push. Reach one hand at a time to the walker.
 - DO NOT pull up on the walker.











How do I walk with a walker?

- 1. Standing in the walker, roll the walker forward.
- 2. Step with the involved leg first.
- 3. Then step with the uninvolved leg.
- 4. Stay close to the walker and stand up straight. Try to walk as normal as possible.
 - Do not step past the front of the walker.

The walker is the most stable base and decreases the risk of falls. Your PT will get you off the walker as soon as you have sufficient strength and balance.

Quick PT summary: roll walker → surgery leg → uninvolved leg, trying to walk heel-to-toe.



How do I negotiate a curb or a single step with a walker?

(have someone assist you, if needed)

Down

1. Roll walker close to the curb.



2. Place walker down first.



3. Step down with the involved leg.



4. Follow with the uninvolved leg.



Up

Option 1:

1. Back up until you feel the curb on the back of your heels.



3. Follow with the involved leg.



5. Take a few small steps backwards.

2. With your hands on the walker, step up with the uninvolved leg.



4. Slowly bring the walker up.



6. When you begin to walk, turn towards your uninvolved side to avoid twisting.

Up

Option 2: Acceptable only if you feel safe.

- Do not let the walker roll out from under you.
- Have someone assist you.





- 1. Face the curb.
- 2. Roll the walker up until it hits the curb.
- 3. Place the walker onto the curb.
- 4. With your arms pushing down onto the walker, place your uninvolved leg onto the curb.
- 5. Bring the involved leg up.

Quick PT summary: Take your time. "Step up with your good leg → down with your bad leg."

How do I negotiate stairs?

Sideways: handrail on involved side

• Requires assistant to carry walker

Up

- 1. Turn sideways and face the handrail. Hold handrail with both hands.
- 2. Push through the handrail, as you would the walker to step up with the uninvolved leg.
- 3. Follow with the involved leg. Take your time climbing one step at a time.
- 4. Have assistant carry the walker to the top of the stairs and open it for you.



Down

- 1. Turn sideways and face the handrail.
- 2. Place both hands on the handrail.
- 3. Step down sideways with the involved leg.
- 4. Follow with the uninvolved leg.
- 5. Have assistant carry the walker and unfold it at the bottom of the stairs.

Rolling walker and handrail

Assistant recommended

Up

- 1. Fold the walker
- 2. Hold on to the handrail with the walker in the opposite hand.
- 3. Step up with your uninvolved leg, while pushing the walker and pulling up with the handrail.
- 4. Bring the walker and involved leg up at the same time.

Down

- 1. Hold onto the handrail with one hand and hold walker in the other hand.
- 2. Place walker down first.
- 3. Follow with involved leg, then uninvolved leg.
- 4. Someone may assist you in stabilizing the walker as you descend the stairs.







Rolling walker without handrail

- Not preferred, but sometimes there is no choice.
- **MUST** have an assistant for safety.
- Please notify your PT if you have no handrail, and he or she will train you on the safest way for your home.





How do I negotiate stairs with a cane?

- When advised by PT
- Use handrail if available.

Up

- Place cane in hand opposite of surgery hip.
- 2. Advance uninvolved leg first.
- 3. Follow with involved leg and cane together.







Down

- 1. Cane goes down first.
- 2. Advance involved leg down.
- 3. Follow with uninvolved leg



How do I get into a walk-in shower or step-over tub?

• You will not be able to soak in a bathtub until your MD allows.

In/Out

- 1. Walk up to the shower with the walker.
- 2. Turn sideways and hold onto the wall, bar, or walker.
- 3. Side step uninvolved leg into the shower.
- 4. Use hands if needed to lift involved leg into the shower.

Helpful hint: If balance is unstable, have a chair outside the bathtub to assist with transfers. Bend your knee to avoid pain in the hip as you clear the threshold.







What if I have a bath chair?

(Optional)

- Recommended if you are unstable on your feet.
- Ask PT based on your bathroom layout, tub style, and type of bath chair.

How do I get dressed?

- Your MD may add additional precautions, so please follow his or her recommendations.
- Do not cross your legs when putting on your pants, socks, or shoes.
- It's OK to place the foot on a stool (see picture on next page).

Pants

On

- Seated on the edge of the bed or chair,
 place the involved leg into pant leg first.
 You may lean forward to help pull up
 your pants.
- 2. Use of a reacher is optional; discuss this with your PT.

Off

- 1. Remove the uninvolved leg first.
- 2. You may bend forward to reach pants from the floor, but DO NOT turn your toes out.



Shoes/Socks

- 1. Sit on the edge of the bed or chair.
- 2. Bend forward to reach your foot.
- 3. *Helpful hint:* You may place your foot on a small stool in front of you or have someone assist you until you regain flexibility.
- 4. Remember to keep toes straight.
- 5. Sock aid is optional; discuss with your PT







How do I get in and out of the car?

• Push the seat all the way back and recline if possible.

In

- 1. With your walker in front of you, back up to the car until you feel the car seat on the back of your legs.
- 2. Reach back with one hand at a time for the car seat and then slowly lower yourself to a sitting position.
- 3. Swing your legs into the car one at a time.

 *Remember: you may have to use your hands or uninvolved leg to lift involved leg into the car.

DO NOT turn your toes out.







Out

- 1. Lift your legs out one at a time so you are facing out of the car.
- 2. Scoot to the edge of the seat until your feet are flat on the street with the involved leg slightly in front.
- 3. *Remember* to avoid twisting or turning your toes outward (keep foot pointed straight ahead).
- 4. Driver or assistant will place your walker in front of you.
- 5. Push yourself up with your arms and legs and place your hands on the walker one at a time.







Other helpful hints

- Avoid carrying objects.
 - o Attach a bag or basket to walker.
 - o Wear a fanny pack or cross-body purse.
 - o Slide objects along the counter in the kitchen or bathroom.



- Wear rubber-soled shoes with a back to prevent slipping. Elastic shoelaces or Velcro closings may be helpful.
- To pick up objects off the floor, <u>DO NOT</u> swing surgical leg back into extension. Instead, try to squat or use a reacher if recommended by PT.



Optional: use of reacher to pick up items off the floor

When can I drive?

- When cleared by your MD
- When your hip bends sufficiently and your reaction time has returned to normal
- No pain medications, no walker
- Ranges between 2-6 weeks
- Dependent on the hip replaced. Patients with left hip replacements tend to drive sooner than those with right hip replacements.
- In the early weeks, please do not deprive yourself of pain medication just so you can drive.
 - o Pain control is important to exercising efficiently in physical therapy.



When can I return to normal ADLs?

• Patient dependent, but it can take up to 3 to 6 months to return to all ADLs.

To enhance recovery time

- Know what to expect before and after surgery.
- Perform prescribed exercises as soon as you wake up from surgery.
- Work hard at home and with physical therapy, but respect the healing process.
 - o Walking is great!
- Do not sit more than 45 minutes at a time early after surgery to prevent irritation of the hip.

PHYSICAL THERAPY

How long will I need physical therapy?

- Typically, 4 to 8 weeks, 2 to 3 times a week, as prescribed by MD/PT or until all goals are met and you have returned to a safe level of independent function.
- When discharged from formal physical therapy, continue your home program so that you can resume all normal activities by 3 to 6 months after surgery.

• Progress depends on

- 1. Patient's age
- 2. Motivation
- 3. Fitness level before surgery
- 4. Pain level
- 5. Compliance with home program

PROLONGING THE LIFE OF YOUR HIP

Exercise after recovery

To prevent wear and tear on the prosthesis, follow the recommendations from the American Academy of Orthopaedic Surgeons (AAOS)

Recommended low-impact activities

- Recreational walking
- Swimming
- Elliptical
- Cycling
- Dancing
- Rowing
- Golf, typically can start putting and chipping at 6 weeks
- Return to gym and lighter weights as prescribed by PT

Activities to <u>avoid</u>

- High-impact sports, such as running and jumping, for the rest of your life to prolong the life of the hip.
- Exercise with extremes of motion (e.g., yoga)
- Vigorous walking or hiking
- Water or snow skiing
- Repetitive lifting over 50 pounds or as noted by MD
- Repetitive aerobic stair-climbing (step aerobics or running stairs)
- Singles tennis

Long-term

- AVOID falls.
- Follow precautions.
- Continue finalized PT home exercise program to maintain strength.
- Notify your dentist that you have a total hip replacement.
 - o Dentist may require you to take an antibiotic before treatment
 - o Dental surgery will require you to take an antibiotic
- See surgeon periodically for a follow-up examination and x-rays

REMINDER TO PATIENTS

Total joint replacement is a major surgery. You may go home the same day or may stay only one night in the hospital. You must respect the healing process. Soft-tissue healing occurs in the first 6 weeks after surgery. Bone healing takes longer and depends on multiple factors. To avoid hip irritation, please do NOT progress yourself faster than recommended by your MD or Physical Therapist.



TAKE ACTION NOW

After completing the Campbell Clinic pre-hab program, you will schedule your postoperative Physical Therapy evaluation for 2 or 3 days after surgery.

MD	MD assistant		
Date of surgery Location PT evaluation location	Arrival time		
		Questions	
Medication list			
To-do list			
Notes			

Resources

American Academy of Orthopaedic Surgeons (AAOS)

http://orthoinfo.aaos.org/topic.cfm?topic=a00377 OrthoInfo - Total Hip

http://orthoinfo.aaos.org/topic.cfm?topic=a00213 Osteoarthritis

http://orthoinfo.aaos.org/topic.cfm?topic=a00303 Exercise Guide

http://orthoinfo.aaos.org/topic.cfm?topic=a00356 Activities after THA

Campbell Clinic

http://www.campbellclinic.com/patient-resources/campbell-surgery-center/outpatient-hip-replacement-at-csc/

eorthopod

http://eorthopod.com/artificial-joint-replacement-of-the-hip-anterior-approach/

http://eorthopod.com/artificial-hip-dislocation-precautions/

American Association of Hip and Knee Surgeons

http://www.aahks.org/care-for-hips-and-knees/do-i-need-a-joint-replacement/total-hip-replacement/

National Institute of Arthritis and Musculoskeletal and Skin Diseases

http://www.niams.nih.gov/health_info/hip_replacement/

Other

http://www.emedicinehealth.com/total hip replacement/article em.htm

https://www.uptodate.com/contents/total-hip-replacement-arthroplasty-beyond-the-basics

www.heart.org. American Heart Association

Joint Understanding: A Comprehensive support program for hip/knee replacement surgery for patients and providers by Aventis.