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**About Billings Clinic**

Based in Billings, Montana, Billings Clinic is a community-owned health care organization consisting of a multi-specialty physician group practice, a 304-bed hospital, and a 90-bed skilled nursing and assisted living facility.

Billings Clinic is the only Montana MAGNET-designated health care organization and a member of the Mayo Clinic Care Network.

Billings Clinic is the community’s largest employer and serves patients in Montana, Wyoming and the Western Dakotas. With over 400 physicians and non-physician providers, these professionals work together to provide coordinated and complete care.

Billings Clinic is governed by a 12-member board consisting of nine community members, two physicians, and a physician CEO. Billings Clinic’s vision is to be a national leader in providing the best clinical quality, patient safety, service and value. Shared electronic medical records are one way we have worked towards that goal.

The electronic medical record helps both primary care physicians and specialists know the patients’ entire health history, the drugs that have been prescribed, and test results. This improves the overall quality, safety and cost of care.

Billings Clinic’s downtown campus consists of:

- A 304-bed hospital
- 14-suite Family Birth Center with a level III Neonatal Intensive Care Unit
- Level II Emergency & Trauma Center
- Inpatient cancer care unit
- Surgery Center
- Billings Clinic, the region’s largest multi-specialty group practice with more than 50 specialties
- Research Center, which includes an analytical lab, research kitchen and bone density machines
- John R. Burg MD Cardiac Center
- Bob & Penni Nance Pediatric Inpatient Unit
- SameDay Care

Off of the main campus are branch clinics which include:
- Billings Clinic Heights, including SameDay Care
- Billings Clinic West, including SameDay Care
- Aspen Meadows, our 90-bed skilled nursing and assisted living facility located on the West end of Billings

Billings Clinic ExpressCare retail clinics offer quick access to primary care for minor medical issues in convenient locations inside local Albertsons supermarkets:
- Rehberg
- Central
- Heights

Primary and specialty-care clinics are located in:
- Bozeman
- Columbus
- Livingston
- Miles City
- Red Lodge
- Cody, Wyoming
Using this Handbook

In order to have the most successful outcome from your joint replacement surgery, your Total Knee Pre-Operative Education book will help you plan and prepare for surgery. You will learn the following:

• What to expect each step of your journey
• What you need to do in order to be prepared for your surgery
• How to care for your new knee

Please keep in mind that this book contains general guidelines for your surgery. Your surgeon, physician’s assistants, nurses, and/or therapists may add to or change any of the recommendations. This is a reference to all of the details for your surgery and care. Please keep this book as a reference for at least the first year after your surgery.

Your Joint Replacement Team

Orthopedic Surgeon

Your orthopedic surgeon is the skilled physician who is able to repair damaged joints and bones.

Registered Nurse (RN)

Your daily care while in the hospital will be performed by the nursing staff. Your primary caregiver will be a registered nurse (RN) and under their direction a certified nurse’s assistant (CNA). Your RN will carry out head to toe nursing assessments and direct your care assisted by a CNA based upon orders from your surgeon including dressing changes, activity, pain control and hygiene.

Pre Admission Test RN (PAT Lab RN)

Before your surgery you will be scheduled with PAT lab, or Pre Admission Testing. Your PAT Lab RN will obtain your detailed health history, a physical assessment, information on what medications you are taking and at what dose, an electrocardiogram, blood work, and order other appropriate test as well as provide preoperative teaching.

Physical Therapist (PT)

Your physical therapist (PT) or physical therapy assistant (PTA) will assist in your return to safe mobility. They will train you and your coach in safe techniques for moving and walking using an assistive device such as a front wheel walker. They will also teach exercises designed to regain your strength and motion after surgery.
**Occupational Therapist (OT)**

The occupational therapist or occupational therapy assistant will assist in your return to activities of daily living (ADLs). They will instruct you in performing tasks such as dressing, bathing, toilet transfer, and tub/shower transfer. They may recommend special equipment for use in your home to increase safety including shower chair, long handled reacher, raised toilet seat, etc.

**Physician Assistant (PA)**

A physician assistant will participate in your care before, during, and after your joint replacement. Your PA will assist during your surgery and will also check in on you daily during your stay in the hospital. You may also see your PA when you are seen for your post-op checkups.

**Care Management/Discharge Planner/Admission Discharge Transfer RN**

A registered nurse and/or social worker will work with you and the orthopedic team to ensure all the necessary steps have been completed for discharge. They may help you plan for discharge prior to your admission if indicated by the team in the office.

**Orthopedic Care Navigator**

The orthopedic care navigator will be responsible for your care needs from the surgeon’s office, to the hospital and home. The orthopedic care navigator will:

- Obtain health database.
- Along with care management, review what you will need at home after your surgery, including support.
- Assess and plan your specific care needs such as anesthesia and medical clearance for surgery.
- Help coordinate your discharge plan to home or facility with additional support, with the help of our case management team.
- Act as your advocate throughout the course of treatment from pre-surgery to discharge. Answer questions and coordinate your hospital care with the Joint Replacement team members.

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**The Role of Your Coach, and Why it is Important**

It is important to involve your family and/or friend in the process of a joint replacement. We call this person your coach. He or she will have many roles in your recovery process. They will attend your pre-operative class with you, support you during exercise, and most importantly help you when you return home. They will monitor your home exercises and make sure your home remains a safe environment for your recovery.

**Preparing and Planning for Surgery**

**What is a Total Knee Replacement?**

A total knee replacement is a surgical procedure. A skilled orthopedic physician will replace the worn out surfaces of the knee with metal and plastic components. Over time, these surfaces or cartilage can be worn away. This can lead to pain or discomfort which can make the simplest of tasks, like walking, unbearable. Your knee replacement can reduce or eliminate pain; this will allow for easier movement and allow you to get back to your normal life.
Before Surgery

Insurance Instructions

Most insurance companies require pre-certification for non-emergent inpatient surgeries. In many cases, if you do not pre-certify your surgery you could be denied coverage or incur a financial penalty. We have included a few steps to help with this process:

- Ask your insurance company if you have coverage for outpatient physical therapy, home health services, skilled nursing facility (SNF), and durable medical equipment (DME) such as front wheel walkers and shower chairs.
- You will need to obtain an authorization from your insurance company prior to your surgery. Medicare Plans may require pre-authorization for your surgery. Please call your insurance company to determine what steps you need to complete.
- Your surgeon will notify you if they will prescribe Lovenox or Arixtra. Both are used for a limited time after surgery. These injections help reduce your risk of blood clots. Be sure when you call your insurance company, to ask if your prescription plan will cover these medications or if there is a required co-pay and how much it will be. The cost of these medications can be expensive, please be aware of this if you are paying on your own for this medication.
- Be sure to follow up with your insurance company 48 hours prior to your scheduled surgery to verify it has been authorized.
- Please call the pre-certification office if your insurance company needs any additional information.

To reach Billings Clinic pre-certification office call 406-247-6916.

Present a current insurance card for appointments and upon admission to the hospital. Also bring your drivers license or state issued ID and drug plan card, if different than your insurance card, with you to the hospital.

What are Advance Medical Directives?

By using advance medical directives you are communicating your wishes to all caregivers regarding your health care. When a patient is no longer able to express their wishes to the physician, family, or hospital staff, these wishes can be communicated through an advance medical directive. Examples are a living will or appointed health care agent. There are a variety of advance medical directives you can choose from. You may wish to consult your attorney regarding the legal implications of each.

Living Wills

A living will is a written set of instructions explaining your wishes regarding your health care in the event you have a terminal condition or an irreversible coma and are unable to communicate your wishes.

Appointment of a Health Care Agent or Medical Power of Attorney

The appointment of a health care agent, also known as medical power of attorney, is a document where you name a person or agent to make medical decisions on your behalf in the event you become unable to do so.

Health Care Instructions

Health care instructions communicate your specific choices in regards to use of life sustaining equipment, hydration and nutrition, and use of pain medications.
POLST-Provider Orders for Life-Sustaining Treatment

The POLST form facilitates the process of translating end of life discussions with patients into actual treatment decisions and provides security for the individual and physician that the expressed wishes will be carried out. It remains with you between care settings regardless of whether you are in the hospital, at home, or a skilled nursing facility. For further questions contact your primary care provider prior to coming to the hospital.

Upon Admission to the Hospital

Upon admission to the hospital, you will be asked if you have an advance directive. If you do, please bring current copies of the documents to the hospital. They will become part of your medical record. You are not required to have an advance directive to be admitted to the hospital.

Pre-Op To Dos

Once you have scheduled your surgery for a total joint replacement, there are a few things you need to complete prior to your surgery date for a successful outcome.

You may call 238-5200 and ask for your surgeon’s nurse if you have any questions before your surgery.

• Pre-Op appointment with your orthopedic surgeon or physician’s assistant
  a. Sign surgical consent with your surgeon.
  b. Notify your surgeon or admitting nurse of any allergies to lotions, metals, or jewelry.
  c. Ask any final questions.

• Primary care physician pre-op physical
  a. Will be set by your surgeon’s office unless instructed otherwise.
  b. Bring a list of your current medications with dosages and allergies.

  c. Lab work may be drawn and EKG completed, if you are over 45.
  d. Your primary care physician will clear you medically for surgery.

• Call your insurance company to let them know you are having surgery.
  a. Please refer to insurance instructions on page 3.

• Preadmission Testing (PAT) Lab
  a. Fill out medical history form.
  b. Bring a list of your current medications with doses and a list of your allergies.
  c. If labs and EKG were not performed by your primary care physician they will be performed during your PAT lab appointment.
  d. Night before surgery instructions will be given during your PAT lab appointment. Any questions you have will also addressed during this visit.

• Register for Pre-Operative Total Joint Class
  A class specifically for knee replacement patients will be held at least weekly. As your physician instructed, you will need to attend a class prior to your surgery. Clinicians from different areas of expertise will be present to answer any questions you may have about your upcoming surgery. You will be required to bring a coach, a close family member or friend who will be on this journey with you. Your coach is here to help you before, during and after your surgery. Please be sure to bring this book with you to the class.

• Emmi Educational Videos
  We also partner with Emmi Solutions, LLC, which provides programs that make complex medical information easy to understand and helps you prepare for your upcoming procedure or manage your chronic condition.

  Most Emmi programs take about 20 minutes
to complete. You can view them from the comfort of your home or anywhere that has internet access.

*These videos will take you step-by-step through:*
- Your condition
- Why your doctor has recommended surgery
- What to expect before surgery
- An overview of your procedure
- What to expect after surgery
- Alternatives

*Already have an Emmi Code?*
If you have already been registered for an Emmi program, log in and view your Emmi program.

*• Make sure you have a physical therapy appointment scheduled for after your surgery*

*• Pre-Op Dental Exam*
  a. A Pre-Op dental exam is extremely important and is done as protection against the development of a catastrophic joint infection. Some physicians feel that bad teeth are the most common source for late total joint infection. Please schedule this prior to your PAT lab appointment if you have not seen your dentist within the last 4-6 months or if you are experiencing any dental discomfort.
  b. Should you not receive a dental exam prior to admission, and have evidence of disease, your surgery may be cancelled.

*• Stop Medications That Increase Bleeding*
Some anti-inflammatory medications may cause increased bleeding. Such medications include, but are not limited to, Aspirin, Motrin®, Naproxen, Vitamin C, and Vitamin E. If you are currently taking a blood thinner, you will need special instructions for stopping this medication. Please refer to the preoperative packet you received. The preadmission testing nurses will provide instructions on how to discontinue use of other medications.

*• Stop Taking Herbal Medicine*
Some herbal medicines can interfere with medications you will be receiving for your surgery. You will need to notify your surgeon of any herbal medicines you are currently taking to determine if you need to stop taking them prior to your surgery. Please refer to the preoperative packet you received. Examples include, but are not limited to, echinacea, ginkgo, ginseng, ginger, licorice, garlic, valerian, St. John’s Wort, ephedra, goldenseal, feverfew, saw palmetto, and kava-kava.

*• Stop Smoking*
It is important to stop smoking prior to your surgery. Smoking impairs oxygen circulation to your incision site. Having proper oxygen circulation will assist with the healing process. Smoking will also increase your chance of clotting. It can also cause serious problems with your heart by increasing your blood pressure and heart rate. To increase your ability to heal from surgery you will need to quit smoking prior to your surgery. If you need help quitting, ask about hospital resources.

*Simple Tips to Help You Quit*
- Make the decision to quit.
- Choose the date.
- Limit where you allow yourself to smoke.
- Determine a reward for each day you go without cigarettes.
- When ready, throw away all cigarettes and ashtrays.
- Don’t allow smoking inside your home.
- Stay away from places others may smoke, like a bar or party.
- Remain positive; remember this can be done.
- Each morning is a new day; take one day at a time. If you slip, get right back to the decision to quit.
- You may need to consider an aid to assist you with quitting. Check with your doctor prior to starting any aids.
Billings Clinic is devoted to being a smoke free campus. You and your family and friends will not be permitted to smoke on any Billings Clinic grounds.

- **Start Exercises**

Please start leg exercises once you have attended the class. Many people with arthritis favor the painful leg. As a result, the muscles become weak making your recovery slower and more difficult. For this reason, it is very important to begin an exercise program before surgery to improve strength and flexibility to make your recovery process faster and easier.

*Please refer to exercises near the end of this handbook (pages 22-25).*

It is very important to not only strengthen your legs but your entire body. You also need to exercise your heart and lungs; you can do this with light endurance activities such as walking for 10-15 minutes each day.

If an exercise is too painful, consult your physician or physical therapist.

**Planning for Leaving the Hospital**

Being able to understand your plan for discharge is an important part of your recovery process. You can expect help from your care manager to develop a plan that meets your particular needs. You should expect to go directly home after discharge. Please ensure you have a ride who can take you home. Most patients are discharged the morning of post operative day two.

**Preparing Your Home for Your Return**

In order to create a safe environment for your return home, we suggest you do these simple tasks prior to your admission into the hospital:

- Place items you will need to use often in an easy to reach space. Examples include frequently used pots or pans.
- Check and make sure no railings are loose. If so, be sure to fix them prior to your surgery. Add rails to steps if possible.
- Clean, do laundry, and put it away.
- Change linens on your bed.
- Prepare meals and freeze them in single serving containers.
- Tend to your yard. If applicable, cut the grass; tend the garden, or any other yard work you may want to finish.
• Pick up throw rugs and tack down any loose carpeting.
• Remove all obstructions from usual walking area throughout and into your home. This includes, but not limited to, electrical cords, clutter, furniture, and other objects found in your usual walking areas.
• Install night-lights in bathrooms, bedrooms, and hallways.
• Place non-skid adhesive strips or mat in the bottom of your tub/shower and install sturdy grab bars.
• It is recommended that you use a shower chair or a tub transfer bench.
• It is advised you use a toilet riser with grab bars for comfort and to protect your hip placement.
• A long-handled shoe horn, reacher and sock aid are also recommended.
• Make arrangements for your pets and mail.
• If you plan to borrow equipment such as a front wheel walker and shower chair, make sure they are clean, damage free, and ready for use. Check the tips of front wheel walkers to make sure they are not worn through. Please note, used Cryocuffs are not allowed.
• Please purchase and set up bathroom equipment prior to surgery.

• C-PAP or Bi-PAP machine, if applicable
• Your coach

Please be sure to label any personal items with your name.

Please have a family member bring the following items once you are in your room:
• This handbook
• Any personal hygiene items you use, toothbrush, toothpaste, soap, shampoo, deodorant, razor, etc.
• Comfortable loose fitting clothing
• Well fitted slippers with non-slip soles
• Flat shoes, like a tennis shoe
• Any adaptive equipment you will need the day after surgery, like a front wheel walker or reacher
• A copy of a current advance directive, if applicable

Home Medications
In order to keep you safe in the hospital, do not bring your home medications with you, unless instructed to do so. Your nurse will be administering all medications per your surgeon’s orders. Your surgeon can track what medications you are taking, how often it is being taken and the amount you are taking. In the instance that you are on a rare medication that our pharmacy does not carry, you will be asked to bring this medication to the hospital on the day of surgery. Your medication will be checked by our pharmacy and kept at the nurses’ station. Please be sure medication is in its original container.

Pre-Op Instructions and Checklist
The morning of your surgery please report to Hospital Admitting. Your PAT Lab nurse will have shown you where to check in. There is a map on the inside back cover.
• You will be called after 1 pm the day before your surgery. If you have not heard from us by 3 pm please call Ortho PAT Lab at (406) 238-5241 or 1-800-332-7201, ext. 5241.
  – Time to be at hospital for surgery: ________

What to Bring with You to the Hospital
You will need upon check in:
• Glasses case
• Denture and hearing aid containers
• Your insurance card, driver’s license or photo I.D., drug plan card if different than insurance card, and any co-payment required by your insurance company
• Follow all doctors’ instructions. Thoroughly read your surgery packet prior to date of surgery if one has been provided.
• Do not eat after midnight.
• May have the following clear liquids up until 2 hours prior to check-in (apple juice, non-protein sports drink, black coffee, tea, clear Jell-O, Pedialyte) NO CREAM/MILK/DAIRY.
• No smoking or chewing tobacco after midnight the day of surgery.
• Leave all valuables at home or with a family member.
• Bring eyeglass case, hearing aid case and denture cup with you on day of surgery. If you will be staying overnight please have family bring overnight bag including toiletries and slippers in after surgery.
• If you have sleep apnea please bring your CPAP machine and mask with you.
• Chlorhexidine cloth prep per instructions.
• Brush your teeth.
• No contact lenses, artificial nails, make up, lotion, colognes, deodorants, jewelry, and remove any body piercing on the day of surgery. Wear comfortable clothing.
• Take the following medications with a sip of water the morning of surgery:
  - Famotidine (Pepcid) 20 mg or Ranitidine (Zantac) 150 mg. take one dose at bedtime the evening prior to surgery and one dose the morning of surgery with a sip of water. May need to purchase over the counter if you do not already have.
• Use your inhalers as needed the morning of surgery prior to admission.
• If you develop a fever, open sore, or other illness please notify your surgeon prior to your procedure.
• If you are diabetic, please let your nurse know, to ensure a blood glucose level is checked prior to your surgery.
• If you are on a blood thinner prior to surgery please consult your surgeon 5-10 days before your scheduled surgery.

**Anesthesia and What You Need to Know**

Anesthesia for Total Joint Surgery is geared toward keeping you safe during your surgical experience and minimizing pain and discomfort after the surgery. This means the anesthesiologist will recommend a spinal anesthetic combined with a peripheral nerve block and with general anesthesia. This technique attempts to maximize the benefits of pain control and comfort during and after surgery, while minimizing side effects such as nausea.

The spinal anesthetic usually contains a combination of local anesthetic (numbing medicine) and a very small amount of morphine that works at the level of your spinal cord to control pain. The morphine, an opioid medicine, used in this manner can help with your pain for many hours following surgery.

The peripheral nerve block, when possible, also increases your chances for better pain control after your total joint replacement. The anesthesiologist will use one of a variety of methods to deposit local anesthetic medicine near a group of nerves that distributes to your operative joint.

As with any anesthetic and surgical procedure, there are risks involved. Some of the anesthesia risks specific to the above mentioned techniques include occasional sore throat, nausea, vomiting, and pain. Less common risks include spinal headaches in less than 3% of patients, pin-prickly sensations or numb patches on the operative extremity, and extremely rare life-threatening circumstances that your anesthesiologist will be monitoring you for continuously throughout your surgery.

Your anesthesiologist will have the benefit of reviewing your electronic medical record prior to your surgery. Please feel free to share any particular concerns that you have with your anesthesiologist.
**Your Hospital Stay**

**Day of Surgery**

Please arrive at the admitting desk at your scheduled arrival time. Once you are checked in, you will go to the surgery check-in on the second floor above the cafeteria. You will be weighed and introduced to your pre-op nurse. Your nurse will finish any paper work needed, check your vital signs, and then you will be instructed to do your pre-op scrub. At this time your nurse will start your IV. You will be interviewed by your operating room nurse and your anesthesiologist. You will also meet with your surgeon and his assistant. During this time you can ask any final questions. He will mark your surgical site at this time. Prior to your going to the operating room, you will be asked to empty your bladder.

The surgery may be scheduled for 1½ hours by your MD. Please add 1½ hours on to that time. It takes about 45 minutes to prepare you in the operating room for your surgery and another 45 minutes afterwards to get you ready to transfer to the recovery room.

Directly after your procedure is done, you will be moved to a recovery area where you will remain for one to three hours. You should expect that your pain be managed, your vital signs monitored, and possibly an x-ray of your new knee. Some side effects you may experience from your anesthesia are blurred vision, dry mouth, and chills. You should expect the team to work to make you feel as comfortable as possible during this time.

When you wake up, you will have a cold therapy device on your new knee. Ice therapy keeps swelling down and minimize pain.

You will be taken to your room where your nurse will care for you. Only one or two very close family members or friends should visit you on this day. You might be receiving pain medication via oral medications.

**IPCs**

The primary functional aim of Intermittent Pneumatic Compression Devices (IPCs) is to squeeze blood from the underlying deep veins. An inflatable jacket (sleeve, glove or boot) encloses the limb, and pressure lines are connected between the jacket and the air pump. The pump fills the air chambers of the jacket in order to pressurize the tissues in the limb, thereby forcing fluids, such as blood and lymph, out of the pressurized area. A short time later, the pressure is reduced, allowing increased blood flow back into the limb. The IPCs should be on your legs whenever you are in the bed or sitting in the recliner while you are in the hospital.

It is very important that you begin ankle pumps on this first day. This will help prevent blood clots from forming in your legs. You should also begin using your incentive spirometer and doing deep breathing exercises.

Staff will assist you to begin activity such as sitting on the edge of the bed, standing or walking with the front wheel walker.

Nurses will address your discomfort and treat appropriately with repositioning and medications. For your safety, do not attempt to get out of bed without the assistance of a staff member.

You can lie on your back with a pillow lengthwise under your surgery leg to keep it straight and elevated. We encourage you to rest with your leg in a straight position to prevent contracture. You can also sleep on your side with your surgery leg up and supported by pillows.

**Blood Sugar Monitoring**

All total joint patients have their blood sugar monitored for at least 4 hours after surgery. You may be given insulin if your blood sugar is high.

**Understanding Pain**

During your stay, you can expect staff will work to keep your pain at a manageable level. During your recovery process, the type of pain you experience
may change. If you need more help with your pain management, talk to your nurse, PA, or surgeon.

**Pain Scale**

By using a number to rate your pain, it will help staff understand the severity of your pain. Staff will use this number to better manage your pain.

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<table>
<thead>
<tr>
<th></th>
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</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1-3</td>
<td>4-6</td>
</tr>
<tr>
<td>Mild Pain</td>
<td>Moderate Pain</td>
<td></td>
</tr>
<tr>
<td>7-10</td>
<td>Severe Pain</td>
<td></td>
</tr>
</tbody>
</table>

**Pain Management and Your Role**

Staff will ask you to rate your pain. Our scale starts with “0” meaning no pain and ends with “10” meaning the worst pain possible. Staff will make adjustment appropriately to make you comfortable. Billings Clinic pain expectation is in the range of “3” to “4.” You may experience up to a “6” with activity, such as working with your Physical Therapist. Be sure to communicate your pain level with staff on a regular basis. Approximately one hour before physical therapy, we suggest you get your pain medication to help with PT.

**Therapy**

Once you are in your room, you will be assisted to sit on the edge of your bed, transfer to a chair or possibly take a short walk.

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**After Surgery – Day One**

**Morning**

You will see your surgeon and/or physician’s assistant today. Occupational therapy will see you early in the morning to assist you with getting dressed and using adaptive equipment. Please have appropriate clothing available early in the morning. Refer to ADLs on page 26. You can expect to see your physical therapist, if you have not already done so, to complete your exercises and continue standing and walking. You may start going to the gym mid-morning for exercise with physical therapy. You may begin training on this day. Refer to exercises on page 22. Your coach is encouraged to be present as much as possible. When walking this first day, it is not uncommon to have your knee buckle due to the peripheral nerve block. Always have a staff member with you when walking. You may wish to take your pain medication before therapy.

**Afternoon**

Again, you will go to the gym for physical therapy to perform exercises and practice walking. Your coach is welcome to attend physical therapy with you. The case manager will visit with you regarding your discharge plan.

**Evening**

Visitors are welcome, preferably late afternoons or evenings, so they don’t interfere with your therapy progress.
After Surgery – Day Two

Today is the day you will likely go home. You can expect to leave the hospital before noon. You will have a shower and participate in daily activities such as dressing and grooming. Your nurse or occupational therapist will coordinate these activities. You will continue to work with physical therapy for exercise and walking. Your primary nurse or the discharge nurse will be talking to you about your discharge time and review your discharge instructions. Make sure you have this book with you and your coach arrives at the hospital early for instructions. The team will continue to evaluate for post hospital stay needs and will assist in arranging additional services.

Patient Lounge

The Patient Lounge offers a comfortable and convenient place for patients, some who have been discharged from the hospital and are awaiting transportation home.

If you are unable to leave the hospital within one hour of receiving discharge instructions, you can expect to wait comfortably in our Patient Lounge. In the lounge, you may relax, watch TV, read, use an iPad, or eat a light meal until your family member/friend arrives.

Please let your nurse know if you will require this complementary service.

The Patient Lounge is open Monday-Friday, 9 am to 5:30 pm with nursing staff available on-site for patient care and questions.

To reach the Patient Lounge, call (406) 657-4794. The Patient Lounge is located on the First Floor, North Atrium Entrance and adjacent to the cafeteria.

This location allows for ease of patient pick up, and the Patient Lounge staff will be happy to assist you and your family.

Meds-to-Beds Program

Meds-to-Beds is a bedside service offered at Billings Clinic to enhance your discharge process. The Atrium Pharmacy staff will deliver discharge prescriptions directly to you prior to leaving your hospital room. If you choose to participate in this program, your caregiver must arrive early the day of discharge with a credit card or check to pay for your medication.

You have the right to choose any pharmacy for your prescription services. Any hometown pharmacy can call the Atrium Pharmacy at (406) 238-2084.

Going Directly Home From the Hospital with Outpatient Therapy Services

You will need to arrange for someone to pick you up once you are discharged from the hospital. During the discharge process you will receive written discharge instructions concerning your medications, physical therapy, activity, etc. Most patients who are discharged will continue their physical therapy at an outpatient facility.

Going Directly Home From the Hospital with Home Health

There are home health agencies in Billings and in some regional areas who can provide skilled services in your home. We can arrange a referral to one based on your preference. These agencies have specific criteria that the patient needs to meet in order for insurance or Medicare to cover at home. Billings Clinic staff will discuss those criteria with you in more detail. These agencies do not supply care-giving assistance at home.
If you are interested in care several hours a day to assist at home, we can put you in contact with private agencies in Billings that you hire and pay on an hourly basis. These services would not be covered by insurance or Medicare.

**Going to a Skilled Nursing Facility (SNF)**

The expectation after surgery is that you will be able to go directly home. However, on occasion, your surgeon and therapists may recommend that you continue your rehabilitation at a skilled nursing facility (SNF). The decision will be made by you in conjunction with your surgeon, your therapists, care management and your insurance company.

If the decision is for continued rehabilitation at a SNF, the care manager will visit with you about options. The physician at the Skilled Nursing Facility will be caring for you in consultation with your surgeon. Your surgeon will fill out the transfer orders so the SNF will know what care and rehabilitation you need.

You will not be allowed to drive yourself to the SNF. The care manager will let you know if the accepting SNF has transportation available. Often times it is easier to make arrangements for transportation with family or friends just as you would for going home.

Please remember that SNF stays **MUST** be approved by your insurance prior to transfer. If you have Medicare, you must meet strict guidelines for Medicare to pay for your SNF stay. If you do not have an insurance benefit or do not meet the strict guidelines, you may pay privately. Be aware that your insurance company, including Medicare, does not consider social issues as a reason for SNF placement. These include, but are not limited to, lack of caregiver, animals to care for in the home, unable to clean or do laundry, no one to run errands. If these are issues, please have arrangements made to solve them prior to surgery.

### Discharge Instructions

**How to Care for Yourself at Home**

Upon discharge there are a variety of things you will need to know regarding your safety, recovery, and comfort.

**Be Comfortable**

- It is strongly recommended that you take your pain medication at least 45 minutes prior to physical therapy or exercise.
- Change your position every 45 minutes.
- Use ice or cold therapy to help control pain. Applying ice or cold therapy to your affected joint will help decrease discomfort. It is highly recommended that you use ice before and after physical therapy. Guidelines for cold therapy at home:
  - Use 20-30 minutes at a time at least four times a day.
  - Disinfect cuff if found on floor prior to using it.
  - Do not use cuff directly over skin – have a protective layer.
    - Telfa or ABD dressing -OR-
    - Clean dry washcloth -OR-
    - Clothing
  - Keep container full of ice water, add new ice every four hours.
  - Purchase or make extra ice before surgery.
  - Clean filter each week!
- Elevation is important to decrease swelling. Place pillows lengthwise under your lower leg to keep it straight and above the level of the heart.

**Cold Therapy Instructions**

**Why Use Cold Therapy?**

- Compression keeps swelling down.
- Ice therapy keeps swelling down and minimizes pain.
Cold Therapy Parts
The cuff is a pad which is filled with ice-cold water. The tube goes from the pad to the canister and is detachable. It allows the device to exchange the water in the pad. The canister holds ice and water.

How to Apply the Cold Therapy Device to the Knee
The cold therapy device will be applied to your knee, and the canister will be filled with ice water immediately after surgery.

1. Apply Insulation Barrier
   a. Always use an insulation barrier between the pad and skin.
   b. Do not let any part of the pad touch skin. If a sterile dressing has been applied to the treatment site that does not completely cover the skin under the pad, use an additional insulation barrier.

2. Set Up Unit

3. Skin Inspection
Inspect the skin under the pad (by lifting the edge) as prescribed, typically every 1 to 2 hours.

Stop using and contact your practitioner immediately if you experience any adverse reactions, such as: increased pain, burning, increased swelling, itching, blisters, increased redness, discoloration, welts, other changes in skin appearance, or any other reaction identified by your practitioner.

4. Ending Session
To stop the pump, disconnect electrical power. To disconnect the Intelli-Flo Pad from the pump hose, depress the two metal tabs on the hose coupling and gently pull apart.
**Body Changes**
You may notice a decrease in appetite. Be sure to drink plenty of fluids to keep you from becoming dehydrated. Eventually your appetite will return. You may also notice difficulties sleeping, this is normal. Make sure you are not napping too much during the day. You can expect to have your energy return within the month.

**Constipation**
Constipation is where your stool becomes too dry or large to pass easily. It can also mean stools that are too infrequent or irregular. Some medications, like opioids, can cause constipation.

**Simple Steps to Reduce the Risk of Becoming Constipated**
A stool softener is generally prescribed to prevent constipation. If you are not on a fluid restriction for a medical condition, it is beneficial to increase your fluid consumption and fruit and vegetable (fiber) intake. You may use over the counter laxatives. It is important not to become constipated as reduced activity and narcotic pain medications predispose you to constipation.
- Increase fiber intake.
- Drink plenty of liquids.
- Take a stool softener twice a day while taking opioids.
- Do not use laxatives regularly. They are ok to use on an occasional basis, however they do not correct the root of the problem.

**Blood Clots and Anticoagulants**
Your surgeon may determine you need a blood thinner to help prevent blood clots in your legs. It is important to take blood thinners as directed by your surgeon. Some examples of blood thinners your surgeon may prescribe are: aspirin, warfarin, enoxaparin, injector or reroziban depending on your individual risk factors and situations. If you take warfarin prior to your surgery, your surgeon along with your primary care physician will adjust your warfarin to maintain therapeutic levels.

**Blood Clots in Legs**
Surgery can cause blood to slow and coagulate in the veins of your legs; this could create a blood clot.

**Signs of Blood Clot in Legs**
- Swelling in thigh, calf, or ankle that does not go down with elevation
- Pain, heat, and tenderness in calf, back of knee or groin area
- Blood clots can form in either leg

**Prevent Blood Clots**
- Perform ankle pumps regularly.
- Walk several times a day.
- Take your blood thinner as directed.

If you suspect you may have a blood clot in your leg, please call your provider’s office. If a blood clot is suspected, you will be instructed to go to the radiology department adjacent to the Billings Clinic Commons or go to the ED for an ultrasound of the affected extremity. If the ultrasound is positive for a blood clot, you will be admitted to the hospital; if it is negative, you will need to go home and work hard on elevating and icing to reduce the swelling. Remember: “TOES ABOVE THE NOSE.”

**Pulmonary Embolus**
If a blood clot is unrecognized and breaks off from the vein, it can travel to the lungs. This is called a pulmonary embolism.

**Signs of a Pulmonary Embolus**
*This is an emergency, and you need to CALL 911 as soon as possible!*
- Sudden chest pain
- Difficult and/or rapid breathing
- Shortness of breath
- Sweating
- Confusion
Prevention of Pulmonary Embolus
• Prevent blood clots from forming in the legs.
• Recognize if a blood clot does form in your leg and call your physician immediately.
• Frequent ambulation and ankle pumps.

Silver Alginate Dressing
• A dressing called silver alginate will be placed on your incision while you are still in the hospital. This dressing is waterproof and you can shower with it in place.
• The silver alginate dressing will stay in place for 7 days, and then you will remove it.
• Notify your surgeon if there is any drainage, redness, pain, odor, around the incision after the dressing is removed. As long as the incision is dry do not replace the dressing.
• You may then shower without a dressing.
• If you feel warm or sick take your temperature. Call your surgeon office if it exceeds 101°F.
• Staples are usually removed in 10-14 days after surgery. If you notice yellow or green drainage, increased redness around incision, surrounding skin is hot to touch or an odor, please call your surgeon for further instructions.

Adhesive Dressing
With this dressing, your wound is closed with a strip of mesh and adhesive which keeps your wound closed. This dressing is applied in the operating room with gauze applied over the dressing. Prior to your discharge, the gauze will be removed leaving a strip about 1½ inches wide over the incision. You will not have stitches or staples. Do not remove this dressing. This dressing will stay in place until you are seen at your 2-week visit. If draining occurs from your incision, leave the adhesive strip in place and use gauze dressing to absorb fluid. Change the gauze daily. You may get in the shower with the adhesive dressing.

Preventing Potential Complications
• Take care of your incision as instructed.
• Antibiotics will be required when having dental work including teeth cleaning or other potentially contaminating procedures for your lifetime.
• Notify your physician and dentist that you have a joint replacement.
• Most dentists will prescribe the antibiotic you need before dental work.

Activities for First Few Weeks Post Surgery
You should be ready for discharge after your second night in the hospital. You will go directly home, unless your care team has determined added benefit in transferring to a Skilled Nursing Facility. During the first few weeks of your recovery, you can expect goals similar to the following:
• Continued use of front wheel walker to stand and/or walk. Your therapist will determine the best options for you
• Actively bending your new knee at least 90 degrees
• Straighten your knee completely
• Shower independently
• Independently dress yourself
• Slowly resume some household tasks
• Your physical therapist will provide you a list of exercises you should do at home
Depending on your progress, your therapist will help set appropriate goals for the weeks to come.
Dos and Don’ts for the Rest of Your Life

• Regardless if you have met all your goals in three months or not, you will need to have a regular exercise program to maintain the fitness and the health of the muscles around your new joint. Be sure to have your Orthopedic and Primary Care physicians’ permission to begin regular activity three to four times per week lasting about 20 to 30 minutes in length. High impact activities such as running or racquet ball may put too much stress on your new joint and is not recommended.

• You may be prescribed a preventative antibiotic to help reduce the risk of possible infection from dental work. If prescribed to take an antibiotic prior to dental work, please take an hour prior to your procedure. Though your risk is very low for a post-operative infection, it is important to realize that there is a risk. Your prosthetic joint could attract bacteria from another location in your body.

• If you develop a fever of more than 101 degrees or sustain an injury such as a cut or puncture wound, you should clean it to the best of your ability, place a sterile bandage on it and notify your surgeon. Occasionally, antibiotics may be needed. Notify your doctor if the area is red and/or painful.

• When traveling, stop and change your position regularly to help prevent your joint from becoming stiff.

Driving after Surgery

When you are no longer taking narcotic pain medication and you demonstrate enough flexibility and strength in your leg to safely drive, you will be allowed to drive again. If you have had a Total Knee Replacement on your left side, have an automatic shift, and have no complications following surgery, you may drive as soon as three weeks. If you don’t have an automatic shift then you may drive at six weeks.

If you have had a Total Knee Replacement on your right side, you may drive at six weeks or sooner if you are released by your surgeon.

Please keep in mind, these guidelines are monitored and directed by your physician.

Exercise

It is best to choose low impact activities. Activities can include the following:
1. Walks (on treadmill or outside)
2. Stationary bikes
3. Exercise at a fitness center
4. Golf
5. Bowling
6. Gardening
7. Dancing
8. Swimming
9. Water aerobics

Always be sure to check with your surgeon and therapist about returning to any specific sport activities.
**Helpful Resources**

**Blood Thinner**
As stated earlier in this book, it is very likely your surgeon will be prescribing a blood thinner. These medications are prescribed to help reduce the risk of developing a DVT or Pulmonary Embolism. Most patients are discharged on plain Aspirin. Some may be sent home with a prescription for Lovenox or Arixtra. These are injectable medications; your nurse will show you how to inject yourself properly. Your surgeon will determine how many days you will need to take this medication.

If you are currently on Coumadin your primary care physician may use both Coumadin and Lovenox or Arixtra after your surgery to ensure you have the proper clotting level. When you are discharged you will resume your Coumadin doses according to your primary care physician's direction. Your primary care physician will tell you how often you will need to complete lab work to determine if your clotting levels are appropriate.

**Lifetime Follow-Up Visits are Extremely Important**
Your surgeon will instruct you how often they would like you to see them for a follow-up visit. The following are good guidelines to follow post-surgery.
- Every year until instructed otherwise by your surgeon
- Anytime you have a mild pain for more than a week
- Anytime you have moderate or severe pain

You can expect during your routine follow-up appointments with your surgeon that he/she will assess your joint.

**Swelling Management**
You may experience swelling up to a few months after surgery. You will want to control your swelling as much as possible so you do not experience unwanted soreness and/or muscle weakness. The following are ways to help and/or prevent swelling:
- Keep your knee and ankle above the level of your heart. Keep in mind you need to keep your knee straight while in this position.
- Use ice, especially after activity or exercise.
  - Creams such as BenGay, Icy Hot, and other such products are not recommended for use.
- Use of an ace wrap when you know that you will be on your feet for an extended period of time can help with management of any swelling.

**Frequently Asked Questions**

**How soon can I get back to my regular activity?**
You can begin to get back to regular activity as your affected leg allows you to. Monitor pain and swelling to help you decide when you need to stop an activity, rest, elevate and ice.

**How long do I have to use my front wheel walker?**
There is no set time frame that you must use a walker. Once you have functional strength and coordination in your affected leg, you may advance to crutches, cane or no assistive device. Your physical therapist will help you decide.

**Can I kneel on my knee?**
You won't damage your knee by kneeling on it but most people require several months before they are comfortable to perform this activity.
Can I use a cane and/or crutches?
The first few days after surgery, it is typical to use a front wheel walker for safety and balance. Your physical therapist will help you decide if and when it is appropriate to progress to crutches or a cane.

What if I need more pain medication?
In order to get a refill or renewal of a prescription, you will need to contact your provider’s office, (406) 238-2136. We require a 72-hour turn around time to manage these requests. Due to DEA regulations, we cannot fax them to your pharmacy. You will either need to have someone pick them up at the Clinic in Billings, or we can mail them via certified mail to you.

Can a family member stay overnight in my room?
No, we do not allow family to stay overnight in patient rooms.

Will I need to bring a front wheel walker, cane, or crutches with me to the hospital?
Please have your coach bring your walker to your hospital room so that you can start using it for mobility, and the therapist can adjust it to the appropriate height for you.

Two nights in the hospital doesn’t seem to be much time, what if I need more time?
Your surgeon will determine if you need more time in the hospital for a medical reason such as nausea, increased pain, and/or blood transfusions. Insurance/Medicare do not pay for extraneous hospital days just for continued therapy since this service can be provided in a skilled nursing facility, at home or in an outpatient setting. Your surgeon will have the care manager assist you with alternative arrangements.

Why can’t I wear artificial nails or nail polish?
We use an oxygen sensor during surgery and the artificial nail/nail polish impairs the ability to get an accurate oxygen reading. Artificial nails can also harbor bacteria.

Why can’t I wear make-up?
We evaluate your color during surgery. Your eyes will also be taped closed; eye make-up could cause damage to your eye.

Why do I need to remove my body piercings?
You need to remove all jewelry prior to surgery to prevent injury during your surgery. Also all jewelry harbors bacteria and you need to do all you can to prevent infection.

Why can’t I wear my dentures, wig, etc. during surgery?
Some anesthesiologists need your dentures out during surgery. These will be removed right before you go to the OR.

How long will my legs be swollen?
The majority of the swelling will be gone in 6-8 weeks.

Will I bruise?
Most people bruise to some degree; how much depends on the individual.

Why does my thigh above my knee hurt?
During total knee replacement, a tourniquet is applied above the knee. This device tightens during surgery, preventing blood flow to the lower extremity. This allows your surgeon to do surgery with minimal blood loss. The pain is due to the tourniquet being tight throughout your surgery. This pain will go away with time. You may also notice bruising in this area; this is normal.
How long will I stay in the hospital? 
You can expect to leave within two days after surgery if it is safe and you are achieving your therapy goals. If you are discharged to a rehabilitation facility, your stay might be a little longer.

What is a Intermittent Pneumatic Compression Device (IPC)?
This is a machine that will push air in and out of sleeves wrapped around your legs. This compression system helps prevent blood clots while you are in the hospital.

What should I expect for pain?
There may be very little to no pain when you come out of surgery. The anesthesiologist will give you a nerve block for pain while you are in the operating room. This medication wears off over a period of hours and the pain will start to be noticeable. Your nurse will start other pain medication as soon as you start to have pain and if it is safe to do so.

When do my staples come out?
Typically staples will be removed at your 1st post op visit to the doctor’s office, 10-14 days after surgery.

When will I be able to get back to work?
When you will be able to go back to work depends on several factors, your job duties, i.e. standing or sitting, how well you recover from your surgery. Your surgeon and therapist will help you with your decision.

When can I have sexual intercourse?
There are no real restrictions. When you feel able to engage in sexual intercourse, you may.

How often will I need to be seen by my doctor following the surgery?
You will be seen 10-14 days after your surgery to have a checkup and staples removed, then at six weeks post op and again at 3 months.

I don’t know what to expect after I leave the hospital. Should I be okay to be home alone?
After your surgery and during your recovery, hospital staff will be working with you so that you will be able to walk safely and manage your daily activities. You may go home with a front wheel walker or other medical equipment. In addition to your other medications you may also receive pain medications to take. As you plan for this elective surgery in advance, you need to arrange for someone to drive you home and be with you when you first return, ideally for the first 5-7 days.

I live alone but have relatives who might be able to help, but I just want to go to rehab so I don’t bother them since they are busy. Can I do that?
A joint replacement surgery is considered ‘elective’, meaning it is not an emergency and can be planned for in advance. You will need to make contact with relatives or friends prior to scheduling your surgery so that you can line up assistance at home in anticipation of being released two days after surgery. There are also in home care agencies that Billings Clinic can put you in contact with in case you want to hire some help at home. This would be an out of pocket expense not covered by insurance or Medicare.

My doctor mentioned something about ‘rehab’. Do I get to go automatically?
Therapy staff, nurses, along with your surgeon will be evaluating your progress. Most insurances including Medicare require that a patient must meet certain skilled criteria for a stay in a rehab facility in order for the stay to be paid. This is not automatic.
What does “skilled” criteria mean?
If you meet criteria for a skilled stay, which is defined by Medicare, it means that you need the continued services of a physical therapist, occupational therapist, nurse, or other skilled medical professional. There is a difference between skilled need and getting help with what we call ‘custodial or non-skilled needs’. These would be things like meal preparation, doing laundry or light housekeeping. Insurances and Medicare do not pay for this kind of assistance in the home.

If I qualify for rehab when it is time for me to be discharged from the hospital, where can I go?
There are a number of local facilities where you could go for a skilled stay. We can contact them and provide clinical information and they will let us know if they have availability to provide rehab care for you. If you live outside Yellowstone County, our staff will assist you in finding available rehab options in your home community.

What is osteoarthritis and why does my knee hurt?
Osteoarthritis is the most common form of arthritis. It is a wear and tear condition that eventually destroys joint cartilage. Your joint cartilage is a smooth tissue that covers the ends of the bones in your knee. This cartilage is used to cushion the bones during movement. Because this tissue is smooth and slippery, it allows for that motion to occur with minimal friction. Osteoarthritis can be a result of trauma, repetitive movement, or for no apparent reason. When the cartilage in the knee wears down it leaves the bone ends exposed. Over time you can have bone-on-bone contact that can be very painful and lead to swelling and loss of motion. Osteoarthritis typically occurs later in life and may affect just one joint or many joints.

How long will my new knee last and can a second replacement be done?
Your new joint will have a limited life expectancy. The expected life of the new joint will depend on your age, weight, activity level, and medical conditions. Your surgeon will direct you in best practices to help extend the life of the new joint as much as possible. There is no guarantee that your joint will last for any specific length of time.

What are the major risks?
Most knee surgeries go very well and without any serious complications. Your surgeon will be monitoring you for blood clots and infections. To help avoid these complications your surgeon may use antibiotics and/or a blood thinner.

How long and where will my scar be?
Your surgeon will make their incision straight down the middle of your knee. Your surgeon will try to make the incision no longer than necessary.

Will my new knee set off security sensors when traveling?
You may or may not set off security sensors while traveling. Your replacement is made out of a metal alloy. Inform the security officer that you have a metal implant. Allow extra time at the airport.
Exercises

Ankle Pump
Bend ankles to move feet up and down, alternating feet.
Repeat __________ times. Do ________ sessions per day.

Quad Set
With operated leg straight, slowly tighten muscles on thigh, pushing knee down flat toward the bed. Hold for 2-5 seconds.
Repeat __________ times.
Do ________ sessions per day.

Hamstring Set
With operated leg bent slightly, push or dig heel into bed without bending knee further.
Hold 2-5 seconds.
Repeat __________ times.
Do ________ sessions per day.
**Short Arc Quad**

Lie on back with rolled towel (about 6 inches wide) under operated leg.

Lift foot to straighten knee. Hold 2-5 seconds, then lower.
Repeat __________ times.
Do __________ sessions per day.

**Heel Slide**

Lie on back with legs flat on bed.

Bend operated leg and slide heel toward buttocks. Hold 2-5 seconds. Return to starting position.
Repeat __________ times.
Do __________ sessions per day.

**Straight Leg Raise**

Lie on back with operated leg flat on bed and bend non-operated leg.

Raise operated leg 10 inches keeping knee straight. Slowly lower.
Repeat __________ times.
Do __________ sessions per day.
**Knee Flexion**

Sit in chair with feet on a smooth surface.

Slowly slide foot of operated leg back as far as possible. Hold 2-5 seconds, then return to starting position.

Repeat __________ times.

Do _______ sessions per day.

**Long Arc Quad**

Sit scooted back in a firm chair.

Lift foot and straighten knee of operated leg and hold 2-5 seconds. Slowly lower.

Repeat __________ times.

Do _______ sessions per day.
**Advanced Knee Stretch**

Sit in a chair with feet on a smooth surface. Cross the non operated leg over the operated leg at ankles. With non operated leg, gently push operated leg back until stretch is felt. Hold 15 seconds, then release.

Repeat __________ times.

Do __________ sessions per day.

**Advanced Knee Extension**

Sit in a chair and prop the foot of the operated leg up on a footstool. Tighten muscles on thigh, pushing knee down as flat as possible.

Repeat __________ times.

Do __________ sessions per day.

**Advanced Knee Flexion**

Sit scooted back in a firm chair. Bend operated leg back as far as possible and plant foot on floor. Scoot buttocks forward in chair until stretch is felt. Hold for 15 seconds. Release.

Repeat __________ times.

Do __________ sessions per day.
Activities of Daily Living (ADLs)

Getting Out of Bed and Into Bed

Remember: use a firm bed, avoid a low bed.

1. Sit down on the edge of the bed in the same manner as you would sit in a chair.
2. Using your arms, scoot backwards onto the bed until the edge of the bed is supporting most of your legs.
3. Rotate your legs until they are parallel with the edge of the bed and lift your legs onto the bed.
4. Lower yourself to your elbows, then let yourself down to the pillow.
5. When getting out of bed, reverse the above technique. Slide your legs toward the edge of the bed. Push up to your elbows, then onto your hands. Slide your legs over the edge of the bed.
**Stand Up with Front Wheel Walker**

1. **Standing Up:** Scoot toward the front of the chair or bed. Place your operated leg out in front. Place your hands on whatever you are sitting on (i.e. bed or chair), and use your arms to push up to stand. Once standing, take hold of the front wheel walker. Never pull up on the front wheel walker to stand.

2. **Proper Fit:** When standing straight with your hands on the grips of the front wheel walker, your elbows should be slightly bent.

3. **Sitting Down:** Back up to the bed/chair until the back of your legs touch the bed/chair. Remove your hands from the front wheel walker and reach back for the bed/chair and then sit. Never remain holding onto the front wheel walker as you sit.

4. **Walking:** When using a front wheel walker follow this sequence:
   - Advance the walker.
   - Advance your operated leg.
   - Push down with your arms and advance your non-operated leg.

5. **Weight Bearing:** Typically the weight bearing ordered by your doctor is **weight bearing as tolerated or 100% weight bearing.**
   - This means you can bear as much weight on your operated leg as is comfortable.
   - Your surgeon or therapist will educate you if you are supposed to put less weight on your operated leg.

6. **Going up and down stairs:** Use rails if they are available. Start off by putting your weight through your hands, and step up with your non-operated leg. Then bring your operated leg up to the same step. If you are using a cane or crutch then bring it up to the same step. When going down, put your crutch or cane down then your operated leg down. Be sure you are balanced, and then step down with your non-operated leg. Remember the saying “Up with the good, down with the bad.”
7. **Going Up and Down Curbs:** start off by placing the front wheel walker up on the curb. Put your weight through your hands and step up with your non-operated leg. Then bring your operated leg up to the same level. To step down, place the front wheel walker down off the curb, put your weight through your hands and step down with your operated leg. Then bring your non-operated leg down to the same level.

3. Reverse the procedure for getting up, using the handles to push yourself up.

**Toilet Transfer**
You will likely require the use of a raised toilet seat (which comes with or without handles) to accomplish this task safely and independently.

1. Back up to the toilet until you feel the back of your knees touching it. Move your operated leg out in front of you. Reach back for the handles and slowly lower yourself onto the toilet, keeping your operated leg out in front.
2. Bend your knee and hip on the non-operated side as you lower yourself onto the seat.

**Bathing**
It is recommended that you initially use an adjustable shower chair in a step-in shower or a tub transfer bench for a bathtub/shower combination. A long-handled bath sponge is also recommended so you can reach your feet during bathing. You may also want to consider installing a safety rail or grab bar as well as a non-slip mat. A hand-held shower attachment may also increase safety and independence during bathing.

*The following transfer instructions are guidelines. Your therapist may instruct you in a different method than listed below depending on your progress.*
**Tub Transfer:**

**Using a Tub Transfer Bench:**

1. Using the walker, walk to the side of the bathtub. Stop next to the transfer bench and turn so that you can easily reach back and sit down safely on the transfer bench.
2. Move your operated leg in front of you. Reach back with one hand for the back of the transfer bench while keeping the other hand on the walker. Sit down on the transfer bench.
3. Lift your legs over the side of the bathtub and turn to face the faucet. This must be done while following your precautions.
4. To get out of the bathtub, turn on the transfer bench while lifting your legs over the side of the bathtub. Stand up on the outside of the tub, by pushing off from the transfer bench while keeping your operated leg out in front.

**Walk-in Shower Transfer:**

**Getting Into the Shower:**

1. Using the walker, walk to the side of the shower ledge facing the faucet.
2. Position walker so that it is not in the way of stepping into the shower.
3. Side step into the shower and sit down on chair.

**Getting Out of the Shower:**

1. Repeat above steps in reverse to get out of the shower.

**Getting Dressed**

**Pants and underwear:**

1. You should sit on the side of your bed or in a chair and use the equipment that your therapist has recommended to you such as a reacher.
2. Put your pants and underwear on your operated extremity first and when taking off your clothes, remove them from the non-operative leg first.
**Socks and stockings:**
1. Your occupational therapist will train you in the use of a reacher and sockaid if assistance is required in this area.

**Shoes:**
1. It is suggested that you use slip-on shoes or use elastic shoelaces to make it easier to dress. You may need the use of a reacher or long handed shoehorn that you will be trained to use if necessary.
**Car Transfer**

**Getting into and out of the car:**

1. Push the passenger seat all the way back; recline the seat back to allow access.
2. Back up to the car until you feel it touch the back of your legs.
3. Hold onto an immovable object, like a car seat or dashboard; slowly lower yourself to the car seat.
4. Lean back as you swivel and lift your legs into the car.
5. Raise the car seat if you had it reclined before the vehicle is moving.

Reverse the process to get out of the car.

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**Helpful Household Tips**

1. Carry hot liquids in containers with covers.
2. Slide objects along the countertop rather than carrying them.
3. Sit on a high stool when doing countertop tasks.
4. Avoid reaching backwards while standing with your walker. Position yourself to reach side to side.
5. Use a reacher to grab objects on the floor.

6. Walker bags, which are hung from walkers, can be used to carry items, including plates, silverware, food in sealed containers, and mail. Do not overload bags.

7. Remove throw rugs from the floor to avoid tripping over the cords.

8. Be careful of electric cords.

9. Use a utility cart to carry items from place to place. Push it ahead of the walker this will free up your hands and will reduce the number of trips you will need to make to complete a task.
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