ORTHOPAEDIC MEDICAL GROUP OF TAMPA BAY

Christopher T. Donaldson, MD
813.684.BONE (2663)

www.omgtb.com

Post-op PATIENT Instructions: OCD ORIF

Dressing: A dressing has been applied to your knee to absorb any fluid/blood. A small amount of blood on the dressing is expected. Leaving the steri-strips on the skin, replace the covering gauze dressing daily with new dry, sterile gauze (obtained from your pharmacy). Unless directed by your surgeon, **no salves, balms, or ointments (even antibiotic ointments) to the incisions.** Soreness and bruising is expected for several days afterward.

Showering (No bathtub): is permitted 72 hours after surgery with the incisions covered. After showering, gently dry the incision and apply a new dry dressing. ***Do NOT soak/submerge the incisions. No swimming/hot-tubs until cleared by your surgeon.***

Ice: Ice is a powerful anti-inflammatory. Icepacks/wraps will help to reduce swelling and pain. Use liberally (20-30 min./session), but remember to protect the skin from direct contact (and frostbite).

Activity: Crutches may be needed for the first several days after surgery. Unless specified otherwise you may **NOT bear weight** on your leg immediately. Foot and ankle motion (foot pumps) are encouraged and will help to reduce your chance of a blood clot. Additionally, tightening the thigh muscle and straight leg raises will assist your thigh muscle in returning its function faster. Bending the knee as soon as you are comfortable (unless otherwise restricted) is also encouraged. However, **no driving until permission is given by your surgeon.**

Pain: A nerve block has been performed for immediate post-op pain control by the anesthesiologist. It typically "wears off" at about 8-12 hrs. following surgery. A long-acting narcotic (every 12 hrs) used in combination with a shorter-acting narcotic (taken every 3-4hrs as needed for breakthrough pain) is given for your pain control. **Begin taking these pain medications when you BEGIN experiencing pain!** These meds can take 30-45 minutes to start "working". You do not want to play "catch-up" by letting your pain get out of control. Nausea, drowsiness, and constipation are common side effects of narcotics. Adequate fluid intake and a stool softener obtained over the counter from your local pharmacy is recommended to minimize constipation. Call the office if you are unable to tolerate your medication.

Precautions: If you develop temperatures above 101.5°F (38.5°C), uncontrolled pain, marked redness, persistent/discolored drainage, or significant swelling. Call the office **(813)-684-2663**

Follow-up: If you do not already have an appointment scheduled, call the office as soon as possible to schedule your first post-op visit.

Special Instructions: (Additionally, follow any indicated instructions below.)

☒ **Physical therapy:** ☒per attached prescription; to be scheduled as soon as able

☒ **Weightbearing (operative leg):** ☒ non-weightbearing; advance as PT protocol directs

☒ **Brace:**

ORTHOPAEDIC MEDICAL GROUP OF TAMPA BAY

Christopher T. Donaldson, MD
813.684.BONE (2663)

www.omgtb.com

☒ **Continuous Passive Motion (CPM) Machine:** Begin 0-60 deg. For 8hrs/day; advance 5-10 deg/day

ORTHOPAEDIC MEDICAL GROUP OF TAMPA BAY

Christopher T. Donaldson, MD
813.684.BONE (2663)
www.omgtb.com

PT/OT PRESCRIPTION: **OCD ORIF REHAB**

(Revised 5.1.15)

***MD Orders for the Therapist*:**

- Physical Therapy Prescription: 2-3 times per week x 6 weeks
- Follow this protocol *without substitution*. Contact my office with any questions.

_____
Christopher T. Donaldson, MD

PRECAUTIONS:

- Weight Bearing:
  - Non-WB for 1-2 wk, may begin toe-touch WB as below.
  - Begin toe-touch WB (approximately 20-30 lbs) at weeks 2-3; progress to partial WB (approximately 25% body weight) at weeks 4-5
- Brace: Unloader when ambulating. Full knee extension when weightbearing.
- All progression based on soft tissue healing

WEEKS: 0-6

- **ROM**
  - Immediate motion exercise day 1
  - Full passive knee extension immediately
  - Initiate CPM day 1 for total of 8-12 h/d (0°-60°); CPM ROM as tolerated 5°-10°/day
  - May continue CPM for total of 6-8 h/d for up to 6 wk
  - Patellar mobilization (4-6 times/d)
  - Passive knee flexion ROM at least 2-3 times daily as tolerated
  - Stationary bike (no resistance) ½ revolutions (at appropriate height)
  - **ROM Goals:**
    - 90° by weeks 1-2, 105° by week 3, 115° by week 4, and 120°-125° by week 6
  - Stretch hamstrings and gastroc
- **Neuromuscular Control/Strengthening**
  - Quad Sets: prone/supine
  - SLR: multiple planes
  - Pool may be initiated per WB guidelines (chest level = 25% BW)
- **Goals to Progress to Next Phase**
  1. Full passive knee extension
  2. Gradually improve knee flexion (~120°)
  3. Good quad set
  4. 20 SLR with minimal to no extensor lag
  5. Minimal to no edema
  6. No exacerbation with PWB

PHASE 2: TRANSITION PHASE: WEEKS: 6-12

- **Goals:**
  - Gradually increase ROM
  - Gradually improve quadriceps strength/endurance

- Gradual and progressive Progress to full weight bearing
- Gradual increase in functional activities
- Brace:Discontinue brace at week 6
- WB: Progress to full WB at weeks 6-8, discontinue crutches

- **ROM**
  - Gradual increase in ROM
  - Maintain full passive knee extension
  - Progress knee flexion to 125°-135° by week 8
  - Continue patellar mobilization and soft tissue mobilization, as needed
  - Continue stretching program
  - Stationary bike (no resistance), full revolutions.
- **Strengthening exercises**
  - Progress WB exercises
  - Initiate weight shifts week 6
  - Leg press at weeks 7-8
  - Mini-squats 0°-45° week 8
  - Toe-calf raises week 6
  - Progress balance and proprioception drills
  - Initiate front lunges, wall squats, front and lateral step-ups at weeks 8-10
  - Progress with stationary bicycle once have full ROM
    - Low resistance (gradually increase time)
  - Treadmill walking program at weeks 10-12
  - Continue use of electrical muscle stimulation and or biofeedback as needed
  - Continue use of pool for gait training and exercise
- **Functional activities**
  - As pain and swelling (symptoms) diminish, the patient may gradually increase functional activities (i.e. stairs, mini lunges, dynamic balance, etc)
  - Gradually increase standing and walking
- **Criteria to progress to phase 3**
  - Full ROM
  - No antalgic gait without use of assistive devise
  - Good quad set
  - No exacerbation with FWB and WB exercises
  - No reactive effusion
  - Able to stand on single-leg with moderate-good balance
  - **Single leg step downs 20-30% of contralateral extremity in 30 seconds with good form**
  - **Single leg squats 20-30% of contralateral extremity in 30 seconds with good form**
  - Able to walk 1- 2mi or bike for 30 min

PHASE III: REMODELING PHASE: WEEKS: 12-26

Goals

- Improve muscular strength and endurance
- Increase functional activities (i.e. walking on different ground, swimming, cycling)

  - Aqua jogging (progress from NWB to chest level, to waist level, etc)
- **ROM**
  - Patient should exhibit 125°-135° flexion
- **Strengthening exercises /Exercise program**
  - Leg press (0°-90°)
  - Bilateral squats (0°-60°)
  - Unilateral step-ups, progressing from 5 to 20 cm
  - Forward lunges
  - Walking program
  - Progress non-WB extension (0°-90°),
  - Continue progressing balance and proprioception
  - Bicycle, Stairmaster, Swimming, Nordic-Trak/elliptical
- **Maintenance program**
  - Initiate at weeks 16-20
  - Bicycle: low resistance, increase time
  - Progressive walking program
  - Pool exercises for entire lower extremity
  - Straight leg raises, Leg press, Wall squats
  - Hip abduction / adduction
  - Front lunges
  - Step-ups
  - Stretch quadriceps, hamstrings, calf
- **Functional activities**
  - As patient improves, increase walking (distance, cadence, incline, etc)
- **Criteria to progress to phase 4**
  - Full non-painful ROM
  - **Single leg knee bend 80%-90% of contralateral extremity**
  - **Single leg hop test within 75%-80% of contralateral extremity**
  - No pain, inflammation, or reactive swelling

PHASE IV: MATURATION: 6-24 MONTHS

- **This sports specific phase should transition from the rehab specialist in the clinic to athletic trainer in the field as appropriate**
- **Goals**
  - Gradual return to full unrestricted functional activities
  - After 6-9 months: jogging on treadmill to different ground
  - After 9-12 months: sports specific drills (cutting, jumping, etc.)
  - After 12 to 24 months: progress to return to sports (i.e. continuous increase in impact with jumping, cutting, and return to contact sports - basketball, volleyball, football, soccer, gymnastics)
- **Exercises**
  - Continue maintenance program progression 3-4 times per wk
  - Progress resistance as tolerated
  - Emphasis on entire lower extremity strength and flexibility

- Progress agility and balance drills
- Impact-loading program should be specialized to the patient's demands
- Progress sport programs depending on patient variables
- Emphasis on quad, hamstring and trunk dynamic stability
- Continue sport-specific agility exercises (utilize visual feedback to improve mechanics) – See above
  - Progress gradually to 100% per tolerance
  - Emphasis on power and change of direction
  - Utilize both indoor and outdoor surfaces

- **Functional activities**
  - Patient may return to various sport activities as progression in rehabilitation as cartilage healing allows.
  - Generally, low-impact sports, such as swimming, skating, rollerblading, and cycling, are permitted at about 6 mo;
  - high-impact sports, such as jogging, running, and aerobics,
    - 8-9 mo for small lesions
    - 9-12 mo for larger lesions
  - higher-impact sports, such as tennis, basketball, football, and baseball,
    - 12-18 mo
- **Goals to Return to Sport**
  - Physician clearance
  - Symmetry with functional testing (3 single-leg cross-over, etc)
  - No reactive effusion or instability with sport-specific activity