

## Non-Operative Knee Arthritis Protocol

The following is an outline of the non-surgical approach to helping patients with arthritis control knee symptoms and lead productive lives, your physician will review your individualized treatment program with you.

### Phase I Mild Arthritis

- A. Lifestyle change
  - a. Weight control
    - i. Diet
    - ii. For every pound lost, 4-6 pounds of pressure are taken off your knees
    - iii. See appendix A
  - b. Activity Modifications
    - i. Activity may need to be changed or substituted pending the extent or location of the knee arthritis
    - ii. Decrease activities by 50% can help with pain
    - iii. Cross train – find other ways of exercising that can benefit the body and not aggravate the knee
    - iv. See Appendix B
- B. Mild analgesics
  - a. Anti-inflammatory (Aleve, Advil, Motrin)
  - b. Acetaminophen (Tylenol)
  - c. Ice after activities or sports
    - i. Ice needs to be done on a regular basis to get the best results
      - 1. 2-3x/day x 15 minutes
- C. Physical Therapy
  - a. PT may be prescribed to help improve flexibility, range of motion, strength, balance and/or endurance
  - b. Patients that are compliant with their therapy have better results
- D. Glucosamine Chondroitin
  - a. 1 of 3 say their symptoms are improved

### Phase II/III Moderate to Severe Arthritis

- A. Lifestyle Change
  - a. Weight control – See phase 1
    - i. Diet (see appendix A)
- B. Activity Modifications
  - a. Avoid aggravating activities
  - b. Low impact activities (water aerobics, cycling, etc.)
  - c. Upper body conditioning
  - d. Decrease activities by 75% to help pain
  - e. Cross train – find other ways of exercising that can benefit the body and not aggravate the knee
  - f. See appendix B
- C. Moderate analgesics
  - a. NSAIDS – Mobic, Voltaren
  - b. Ice after activities or sports
    - i. Ice needs to be done on a regular basis to get the best results
      - 1. 2-3x/day x 15 minutes
  - c. Injections
    - i. Cortisone
    - ii. Synthetic lubricants (Synvisc, Euflexxa)
    - iii. Platelet-Rich Plasma (PRP)
    - iv. Stem Cells (BMAC)
- D. Physical therapy
  - a. Similar to Phase I
  - b. PT will help prepare for surgical intervention if it should be needed in the future
- E. Glucosamine Chondroitin
  - a. 1 of 3 say their symptoms are improved

#### Appendix A: Diet

- Decrease portion size
- Decrease fat intake
- Keep track of calories
- Avoid unhealthy snacks and sweets
- Low carbohydrate diet
- Meal supplements (slim fast, ensure, etc.)
- Seek professional help/weight watchers

#### Appendix B: Activity Modification

- It's important to stay active, but you may need to substitute activities according to the nature of your arthritis
- Use pain and swelling as a guide