### Mr David Gordon MB ChB, MRCS, MD, FRCS (Tr & Orth)

## **Consultant Orthopaedic Surgeon**

www.davidgordonortho.com







Personal Assistant: Helen Sellars

T: 0207 993 2373

F: 01582 647 901

E: helen@davidgordonortho.com

# Big Toe Joint (1<sup>st</sup> MTPJ) Replacement Post Operative Rehabilitation Protocol

#### **Operative Summary**

A hemi-arthroplasty (half joint) replacement, resurfaces the proximal phalynx. A cheilectomy (removing the dorsal bump of bone) is also performed.

#### Day of Operation (week 1)

Rigid post-operative sandal - mobilise full weight bearing (with 2 crutches only if needed)
Home the same day
Strict elevation
Move toes, ankle, knee and hip

#### Weeks 1 – 2 Post Operatively

Strict elevation at the level of the chest, for 23 hours a day for 14 days (for pain relief and wound healing) Ice for 10 minutes every hour, on top of bandage
Move toes, ankle, knee and hip
Straight leg raises

#### Week 3 Post Operatively (after 2 weeks completed)

Clinic review by Mr Gordon - wound inspection, removal of sutures Into a normal shoe (will need to be wide and soft) Commence exercises

#### Week 3-4 Post Operatively - Exercises - 3 times/day

- 1. Seated heel raises x 20: Sit with foot flat on floor, knees bent  $90^{\circ}$  keeping toes on floor, raise heel to the limit of pain and return
- 2. Toe lifts x 20: Sit with foot flat on floor, raise toe as far as possible to ceiling and return
- 3. Toe bends x 20: Sit with toes resting over the edge of a phone book, bend toes towards the floor
- 4. Toe pulls x 20: Pull toe up with hand to pain and hold for 3 seconds, relax
- 5. Toe pushes x 20: Push toe down with hand to pain and hold for 3 seconds, relax

## **Big Toe Joint Replacement Rehabilitation Protocol**

#### Week 5-6 Post Operatively - Exercises - 3 times/day

- 6. Standing both heel raises x 20: Stand close to a wall for balance, raise heels to the limit of toe pain and hold for 3 seconds
- 7. Standing single heel raises x 20: Stand close to a wall for balance, stand on one leg, raise heel to the limit of toe pain and hold for 3 seconds
- 8. Continue exercise 3, 4 and 5

#### Week 7-8 Post Operatively - Exercises - 2 times/day

- 9. Toe flexor stretch in standing. Roll up a towel and place it in front of a step. Place your toes of the operated foot on the towel and the ball of your foot on the floor, so that your toes are bent upwards. Bend the knee forwards over the edge of the step. Hold 1 minute
- 10. Walking training. Ensure your weight is moving through the big toe at push-off. Practice rolling backwards and forwards in this position
- 11. Balance retraining. Practice balancing on 1 foot on a balance board or a pillow/cushion for 2 min
- 12. Walk at a moderate pace on the flat for 10 minutes. Gradually increase time to 20 minutes then introduce hills or stairs. Note: a graduated return to normal activities and sport is recommended. Start slowly and add only 1 new activity per week. If you have done too much, you may not feel it until the next day





Post Operative X ray of the BioPro Great Toe Hemiarthroplasty

#### References

Giza, et al. First Metatarsophalangeal Hemiarthroplasty for Grade III and IV Hallux Rigidus. Techniques in Foot and Ankle Surgery 4(1):10–17, 2005