

PHYSIOTHERAPY GUIDELINES FOR MR PIMPALNERKARS PATIENTS
FOLLOWING ACL RECONSTRUCTION

Patella tendon grafts

0 – 14 days

Goals:

1. 0 – 90° range of movement – active flexion
2. Gain and maintain passive straight knee
3. Minimise swelling
4. Ensure patella remains mobile

Action:

1. Weightbearing as comfortable with elbow crutches and splint if provided aiming for full weightbearing without elbow crutches by 2 weeks.
2. Cryo cuff applied for 20 minutes every 2 hours
3. Remove tubigrip after 48 hours
4. Arrange physio appointment for 7-12 days and provide contact number
5. Advise no driving for 6 weeks

Exercises: 10 reps 5 x daily

Mobilising

1. Active flexion 0-90° - heel slides in supine
2. Passive knee extension – rolled towel under ankle
3. Perform patella mobilisations as instructed

Strengthening: 10 reps 5 x daily

1. Static Quads
2. Hamstring curls in prone

14 – 28 days

Goals:

1. Maintain knee extension at 0°
2. Range of movement 0 – 110°
3. Full weightbearing without elbow crutches
4. Hamstring strength achieve 2 sets of 10 hamstring curls with theraband
5. Quads strength – 1 set of 15 reps 1/3 double leg squats

Action:

1. Begin weaning off splint as instructed by consultant
2. Aim for full weightbearing
3. Monitor and control swelling, use ice as appropriate

Exercises: 10 reps, holding for 20 seconds x 3 daily

Mobilising:

1. Passive knee extension – rolled towel under ankle
2. Prone knee hangs
3. Heel slides in supine
4. Wall slide – lie supine on floor, foot on wall, let gravity assist flexion
5. Hamstring stretches
6. Calf stretches

Strengthening 2 x 10 reps x 3 daily

1. Hamstring curl in prone
2. Seated hamstring curls with theraband around ankle
3. Floor bridging progress to single leg as appropriate
4. Weight transference in standing
5. ¼ double leg squats
6. ¼ double leg squats with ball between knees
7. Posterior gluteus medius in side lying
8. Resisted hip adduction with Theraband in standing
9. Calf raises

Proprioception:

1. Single leg stands

Additional options:

Stepper/ x-trainer/stationary bike (low resistance)

4 – 6 weeks

Goals:

1. Improve proprioception and balance
2. Range of movement 0° - 130°
3. Aerobic activity up to 20-30 minutes
4. Hamstring/Gluteal strength - 1 set of 20 double leg bridges on gym ball
5. Quads strength – 1 set of 20 1/3 single leg squats

Exercises:

Mobilising:

Exercises 1 – 6 as for 2-4 weeks + quads stretch

Strengthening: 3 x 10 reps 3 x daily

1. Prone hamstring curls and resistance
2. Double leg bridging on gym ball progress to single leg as able
3. Single leg ¼ squats progressing to single leg 1/3 squats
4. Double leg squats with theraband under feet
5. Double leg squats with gym ball against wall
6. Single leg calf raises

Proprioception:

1. Single leg stands on trampette/sit-fit

Additional options: As for weeks 2 – 4

1. Leg press
2. Hamstring curls (machine)
3. Pool walking programme and flutter kick

7 – 12 weeks

Goals:

1. Full range of movement
2. Up to 40 minutes aerobic activity
3. Hamstring/gluteal strength – 1 set of 20 single leg bridges on gym ball
4. Quads strength – achieve 3 x 10 reps of controlled step downs
5. Proprioception - 10 single leg squats on trampette

Exercises:

Continue with all stretches

Strengthening: Progress to 3 sets of 20, aim for 4-7 sessions per week

1. Progress single leg 1/3 squats to deep single leg squats (+/- ball against wall)
2. Controlled step downs
3. Static lunge + progress to dynamic lunge
4. Sustained bridge on ball with closed chain knee flexion + extension
5. Machine hamstring curls

Proprioception:

1. Single leg stands on trampette/sit-fit/throw and catch ball/eye closed.
2. Single leg dips on trampette/sit fit
3. Dynamic lunge on to sit fit

Plyometrics:

If at week 10 – 12 if patient has necessary control then progress them gradually on to plyometric work.

1. Speed skating
2. Jogging on trampette
3. High knees against resistance
4. Hopping 2 forward, 1 back with theraband around waist
5. Side to side step work – increasing speed
6. Forward hops on to step
7. Jump dips between cones
8. Slalom hopping

Additional options

At 9 weeks.	Biking outdoors Jogging in water
At 12 weeks	Progress to jogging on level ground Refer to return to sport class if appropriate
13 weeks Onwards	Progress to normal swimming and progress to gym work as appropriate. Start sports specific training eg: for racquet sports start lunge/pivoting activities, running/dribbling skills for football.

6 months post-op

- ◆ Return to sports training wearing brace as advised by consultant

12 months post-op

- ◆ Return to contact sports if indicted by consultant