

PCL Injury Assessment & Management



Tim McGrath

Tim is the Senior Director of Player Health and Performance at the Washington Commanders in the NFL. Tim is also Director of Elite Rehab and Sports Physiotherapy in Canberra and the Founder of the 3D biomechanical consultancy service Pitch Ready.

Quick Takeaways

- The PCL has two distinct bundles - the anterolateral and posteromedial
- A kneeling stress radiograph is cheap, reliable and valid test to assess for side-to-side PCL laxity with >8mm differences indicating a high grade injury
- For non acute PCL presentations, be careful interpreting MRI scans as they can under report PCL injuries as the ligament is off-tension in extension
- Conservative bracing protocols commence with a period of locked extension and a gradual exposure into knee flexion typically across 6 - 8 weeks
- A conservatively managed, isolated high grade PCL injury often takes 14-16 weeks to return to play



Key Learnings

1 Knee flexion angles of 0-20 degrees cause very minimal strain on the PCL and therefore are safe to progressively load in the early stages post injury, preferably in a brace.

2 Bias hip dominant hamstring exercises post PCL injury for 6-12 months until good stability is restored. High load, knee dominant hamstring exercises are not recommended within the initial season post injury.

3 The risk with PCL injuries that are suboptimally managed is that they can cause accelerated degenerative changes on the medial femoral condyle. Caution with these injuries is recommended to prevent degenerative chondral changes.