
Knee joint instability after anterior cruciate ligament reconstruction

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Conclusion Anterior cruciate ligament reconstruction is a common , but technically demanding, procedure. Predictable excellent results with inevitable return to sports are anticipated for the majority of patients (Eric et al, 2004). With an increasing number of ACL reconstructions requiring revision, awareness and understanding of this problem must be increased. To best approach this difficult and challenging problem, the causes of failed ACL reconstruction must be understood. The primary etiology is iatrogenic, poor surgical techniques. This compromised 60 % of all failures (Eric et al, 2004). When approaching revision surgery the surgeon must have an in-depth knowledge and proficiency of the available ACL reconstructive techniques to provide the best opportunity possible in obtaining a satisfactory result (Eric et al, 2004).

Summary The anterior cruciate ligament is an important component for normal kinematics of the knee joint. The primary function of the anterior cruciate ligament is to restrain anterior translation of the tibia on the femur in open chain activities and perhaps more importantly, restrain posterior translation of the femur when the tibia is fixed as in closed chain activity (Hiemstra et al, 2000). In today's world of motorcycle, football, increased fitness awareness and highly competitive sports, injury to anterior cruciate ligament has assumed increasing importance both from the diagnostic as well as therapeutic angle. Reconstruction of anterior cruciate ligament will balance the loading of the knee joint and reduce the incidence of meniscal damage and prevent early osteoarthritic changes (O'Brien et al, 1991). Revision surgery of the ACL has become an increasingly common procedure, since a failure rate of ACL surgery between 11 to 31% has been reported (Peter et al, 2004). A wide spectrum of factors have been recognized as etiologies for failure of an ACL reconstruction. Recurrent instability is often due to graft failure, which may be caused by either biological failures (lack or delay of graft incorporation), reinjury, technical errors (tunnel placement, graft impingement, graft tensioning, graft fixation, graft material), or lack of addressing combined instability patterns (secondary restraints) (Peter et al, 2004). However, these analyses of ACL graft failures were only performed in single bundle ACL reconstructions (Peter et al, 2004). It is clear that the results of RACL surgery are less favorable than the results of primary ACL reconstruction (Michael et al, 2006).