# **Another Step To Prevent PCL Reconstruction Failure**

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## **INTRODUCTION:**

Isolated PCL injury is a rare injury with annual incidence of 2 cases per 100,000 individuals<sup>1</sup>. Posterior cruciate ligament (PCL) reconstructions are uncommon and challenging, with lack of knowledge regarding failure of PCL reconstruction persisted to date.

# **MATERIALS & METHODS:**

A 21 years old female, presented with exposed implant over left thigh of 1 week duration after 5 months post left knee arthroscopic all inside PCL reconstruction using hamstring autograft for isolated PCL partial tear. The surgical procedure was uneventful.

She had a fall at 3 months post operation. The pain and swelling worsened. She developed fever and noticed implant exposed subsequently. Clinically, implant button exposed with serous discharge. Laboratory investigation revealed raised CRP and TWBC.

Intra-operatively, Attachable Button System (ABS) button was exposed over the anteromedial aspect of left thigh with pus collection superficially but slough tracking into the knee joint.

Intraoperative culture yielded MRSA, she was treated with intravenous Vancomycin for 6 weeks for deep surgical site infection (SSI) with left knee septic arthritis.

## **RESULTS:**

At follow up, wound was well healed. Left knee range of motion was 0-110 degree. Patient was ambulating well despite grade 3 PCL laxity.



Figure 1. Preoperative image: exposed ABS button



Figure 2. Intraoperative image: Superficial pus collection with slough.

## **DISCUSSIONS:**

Factors contributing to failure of PCL reconstructions are similar to that of ACL reconstruction with failure to restore associated ligament instabilities and incorrect tunnel placement being the confounding factors<sup>2</sup>.

Our patient had a fall, subsequently complained of pain, swelling and fever. This could suggest of an infected haematoma leading to infection and implant failure, which can be prevented with early detection.

## **CONCLUSION:**

Infected haematoma leading to deep SSI is a factor causing implant failure. It could be prevented with early detection and appropriate treatment

# **REFERENCES:**

- 1. G. S. E. Dowd. Reconstruction of the posterior cruciate ligament. J Bone Joint Surg [Br] 2004;86-B:480-91
- Noyes, M.D., Frank & Barber-Westin, Sue. (2005). Posterior Cruciate Ligament Revision Reconstruction, Part 1: Causes of Surgical Failure in 52 Consecutive Operations. The American journal of sports medicine. 33. 646-54. 10.1177/0363546504271210.