

Case Report: Unexpected Case of Steal Syndrome

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INTRODUCTION:

Steal syndrome, a complication resulting from abnormal redirection of blood flow (“steal”), often associated with vascular access for hemodialysis, can present with symptoms and severity ranging from coolness, pallor, mild paresthesia, and pain during dialysis[1]. The patient in this case exhibited manifestations that progressed rapidly throughout admission and had gone through transradial amputation.

REPORT:

A 42 years old gentleman, with underlying poorly controlled diabetes mellitus, hypertension, dyslipidaemia, and end-stage renal failure with history of failed left brachiocephalic fistula which was created five months prior presentation, was admitted under Medical unit treated for catheter-related bloodstream infection from his internal jugular catheter. Patient complaint of blackish discolouration over his pulp of left thumb (Figure 1), alleged trapped in door few days prior presentation. He was treated for dry gangrene of left thumb.



Figure 1: Left thumb

On day three of admission, noted worsening of left thumb discoloration (Figure 2) and case was referred to Vascular unit, impression of left steal syndrome (grade IV) was made. Decision of left below elbow amputation was decided and agreed by patient. Left transradial amputation done. Intraoperatively, noted radial and ulnar arteries harden with atherosclerotic plaque.



Figure 2: Left hand on day 3 of admission

Post-operatively, observation revealed the amputation stump wound was clean and pink, with capillary refill time less than two seconds on the surrounding skin (Figure 3), adhered with daily saline dressing. Day-to-day examination indicated that the wound was progressing well, demonstrating an optimal healing process.



Figure 3: Transradial amputation stump

CONCLUSION:

Steal Syndrome is a serious condition that requires prompt attention. Early detection is crucial to prevent complications and, in some cases, even save lives. It is important to take this condition seriously and prioritize timely intervention for better outcomes.

REFERENCE:

1. S. Mascia. Ischemic steal syndrome in a hemodialysis patient: The roles of Doppler ultrasonography and dynamic Doppler studies in diagnosis and treatment selection. J Ultrasound. 2010 Sep; 13(3): 104–106.