High Mortality Averted: Catastrophic Injury with Traumatic Hemipelvectomy

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INTRODUCTION:

Traumatic hemipelvectomy (hindquarter amputation) is an injury that linked with high rate of mortality and morbidity, associated with massive blood loss pre and intraoperatively and post operatively. We report a case on a young survival lady.

CASE REPORT

An 18 years old lady, met with motorvehicle right accident, with hip ioint hyperabduction and external rotated. She had a degloving wound along inguinal canal, labial majora and anus. Direct compression was done by paramedic team. Hemorrhagic shock noted with low Hb at 8.2g/dL and lactic acidosis. Hence resuscitated with Iv crystalloid, colloid, and inotrope while transporting to tertiary centre, subsequently transfused with packed cell. Multidisplinary teams were involved including surgery, orthopaedic anaesthesiology team. Pelvic ring injury Tile C with symphysis pubis and right sacroiliac joint was totally disrupted.





2 cycles of massive transfusion protocol was activated. She underwent hemipelvectomy by orthopaedic surgeon and exploratory laparotomy with stoma creation by general surgeon. Intraoperatively, noted sacral plexus disrupted, right external iliac artery, external iliac vein, and femoral nerve totally transected. Inferior vena cava, vagina and anus were repaired. Post operatively, she was nursed in ICU with extended antibiotics and successfully extubated on day 3 post op. She able to sit upright, psychologically stable, with rehabilitation team closely follow up.









DISCUSSIONS:

As per Ludwig Labler et al, traumatic hemipelvectomy is most severe pelvic ring injury, associated with pelvic vessels injury, 88% with extension to genitourinary tract and intestine. Majority succumbed to death in first 4 hours of resuscitation due to uncontrollable of bleeding. First surgery should be targeted to achieve homeostasis, secondly remove contamination, thirdly reconstruct genitourinary and gastrointestinal system, Short transition from pre hospital care to casualty, and operation theatre multidisciplinary approach.

CONCLUSION:

Patient's survival with traumatic hemipelvectomy can be maximized by multidisciplinary team effort from pre hospital, triage, emergency department and until hemostasis achieved.

REFERENCES:

Labler, L., Trentz, O. & Keel, M. Traumatic Hemipelvectomy. Eur J Trauma 31, 543–550 (2005).