

NECK OF FEMUR FRACTURE: TOTAL HIP REPLACEMENT OR BIPOLAR HEMIARTHROPLASTY?

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Introduction: Total hip replacement (THR) is recommended for neck of femur (NOF) fracture in patients who were able to walk independently out of doors, are not cognitively impaired and are medically fit for anesthesia and procedure according to NICE Guideline 2011. However, bipolar hemiarthroplasty (BH) still remains popular in this country. The aim of this study was to compare the outcomes between these two operative managements.

Methodology: This retrospective study included 84 patients above 60 years old with NOF fracture from 2009-2014. 54 patients underwent BH while 30 patients underwent THR. All of them came for follow-up for at least 5 years under Penang General Hospital. Both BH and THR are compared in terms of 5-year survival rate, 8-year survival rate, post-operative complications and post-operative ambulation.

Discussion: A total of 84 cases were identified as suitable candidates for analysis. 3 components are involved in this analysis. They are survival rate, post operative ambulation method and post operative complication. 5 years survival rate for THR is 90%, BH is 81.5%. For 8 years survival rate, THR is 70%, and BH is 64.8% For post operative ambulation, 43.3 % of THR patient and 44.4% of BH patient ambulate without aid. 30% of THR and 31.5% of BH patient ambulate with aid. 26.7% of THR and BH consist of 24.1% are either bed ridden or wheelchair bounded. In comparison of post operative complication, 6.6% (THR) and 3.7%(BH) were involved in dislocated implant. No protrusion THR patient but 3.7% in BH patient. 3.3% of THR patient involved in infection while BH recorded a number of 1.9%.

Conclusion: Even though Western guidelines suggest that THR is the recommended management for ADL independent NOF fractures, BH still holds a role and should be considered as one of the treatment options for NOF fractures.