00093 Effect of Early Ambulation on Length of Stay and Clinical Outcomes in Total Knee Replacements.

Teo Shao Jin[1], Tan Hwee Chye Andrew[2], Phua Kia Sheng Jonathon[1], Teo Jun Xiong Bryon[2]

[1]National University of Singapore, [2]Singapore General Hospital

Aims: The aims of this paper are:
1) To ascertain the effect of early ambulation on the length of stay (LOS) in patients undergoing
Total Knee Replacement (TKR).
2) To ascertain the effect of early ambulation on outcomes in patients undergoing TKR.

Methodology: This is a single - centre, single - surgeon retrospective study. 79 patients with total knee replacement done were identified to have undergone early ambulation on the first postoperative day following a change in surgeon practice towards early ambulation. They were matched for gender, age and pre - operative function scores at a 1:1 ratio, to patients who underwent ambulation on the second post - operative day before the change in practice. Patients who had adverse post - operative events unrelated to the procedure leading to prolonged LOS were excluded. The function scores studied are the Knee Society Function Score (KSFS) and the Oxford Knee Score (OKS), which were recorded at the 6 - month and 2 - year intervals. Statistical analysis was performed using SPSS.

Result: The mean LOS was significantly shorter in the early ambulation group (3.92 vs 4.59, p = 0.007).

At 6 months, the early ambulaters performed better in the KSFS, although this was just shy of significance (74.19 vs 69.32, p=0.062) while there were no difference in the OKS (19.18 vs 19.01, p=0.814). Patient satisfaction with the treatment received was largely similar (2.41 vs 2.43, p=0.863).

At 2 years, both the KSFS (83.18 vs 75.19, p=0.113) and OKS (16.79 vs 17.88, p=0.248) were similar in both groups. Patient satisfaction at this point had no significant differences (1.92 vs 2.35, p=0.117).

Conclusion: Early ambulation on first post - operative day leads to shorter LOS with its attendant cost savings, and possible short term benefits to functional recovery. However, there is no difference in the long - term patient outcomes and satisfaction.