

Summary of research proposal LROI



Title:

A comparison of short versus conventional stem hip prosthesis in the Netherlands; incidence, survival, revisions and patient reported outcome measures based on registry data

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Abstract:

Short stemmed total hip prostheses are considered a relatively new type of prostheses with the claim that they preserve the bone, which is especially appealing in younger more active patients. This is the first study to use LROI data on short stem hip prosthesis in the Netherlands. In this study, we will compare uncemented short vs. conventional stem hip prosthesis on incidence of THA per year, revision, and PROMs. We will include all primary THAs (non MoM) with an uncemented short-stemmed or conventional uncemented femoral component since 2009 in the Netherlands. A control group will be selected from the conventional stem group and matched through propensity score matching to the short stem group on age, gender, ASA score, diagnosis, and surgical approach. Crude competing-risk analyses per group will be used to determine risk of revision for any reason. PROM scores per group will be analysed with linear mixed models where time and group are fixed factors and patient is random factor. Lastly, the types of implants (e.g. conventional or larger) that are used during revision of short-stemmed THA are compared to those used during revision of conventional stem THA.

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