65. ROBOTIC VERSUS LAPAROSCOPIC SLEEVE GASTRECTOMY OUTCOMES: A SYSTEMATIC REVIEW AND META-ANALYSES

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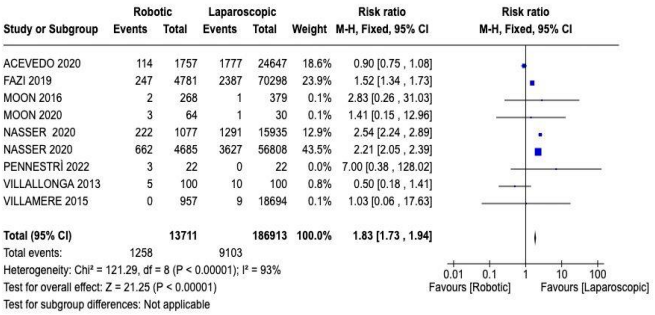
BACKGROUND: Among the various bariatric procedures, sleeve gastrectomy is a highly effective intervention for achieving significant and sustained weight loss in morbidly obese patients. In recent years, advancements in surgical techniques have introduced robotic-assisted procedures alongside traditional laparoscopic methods, promising improved precision and outcomes. This meta-analysis was conducted to assess the operative outcomes and complications of these two techniques. **METHODS:** We systematically searched PubMed, Embase, Web of Science, and Cochrane, including systematic reviews, meta-analyses of randomized controlled trials, cohort studies, and case-control studies comparing robotic surgery with laparoscopic procedures in patients located in England, Italy, Japan, USA and Germany. **RESULTS:** 9 studies with 1, 203, 901 adult patients were included in this systematic review and meta-analysis. Overall complications of the laparoscopic group were 1.94 [1.82, 2.06] (P < 0.00001). The operative time were significantly less in time in the laparoscopic group 28.28 [19.74, 36.82] (P < 0.00001). **CONCLUSION:** This meta-analysis indicates that laparoscopic sleeve gastrectomy is associated with a lower complication rate as well as a shorter operation time.

Figure: Comparative Risk Ratio of Complications: Robotic vs. Laparoscopic Sleeve Gastrectomy Based on Meta-Analysis Data.



Key Words: Laparoscopy, Gastrectomy, operation, remote robotics.