Comparative Analysis Of The Efficacy And Safety Of Single Anastomosis Duodenoileostomy With Sleeve Gastrectomy **(SADI-S)** Versus Sleeve Gastrectomy **(SG)**: A Systematic Review And Meta-analysis

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Background

This study aimed to evaluate and compare weight loss and perioperative bariatric outcomes of patients undergoing SADI-S versus SG.

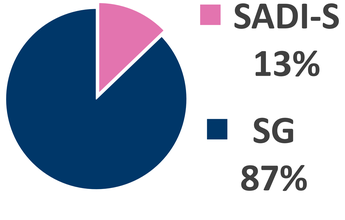
Methods

Systematic search of PubMed, Embase, Cochrane Library, Scopus, Web of Science, and Science Direct was conducted on April 15th, 2024, following PRISMA guidelines. Related articles comparing SADI-S and SG, reporting at least one clinical outcome of interest with follow up of 1 year, were selected and analyzed.

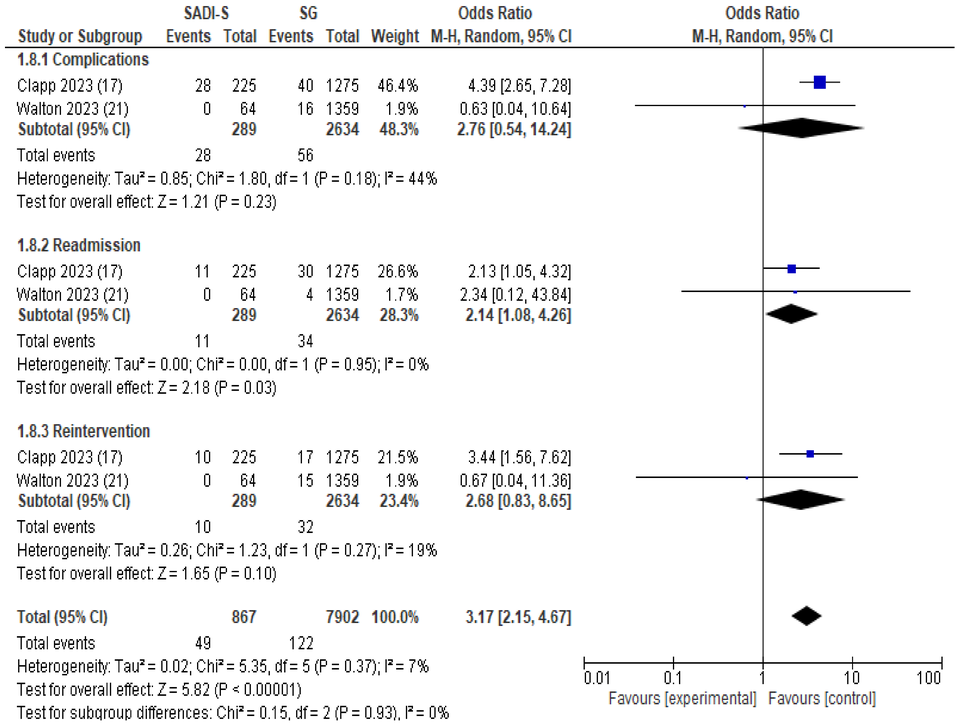
Results

Five studies published between 2019 and 2023 were included in the analysis, reporting data from **3,593 patients**.

Mean age 42.96 years
Female **89.6%**



- No differences in complications and reoperation rates between the groups.
- However, SADI-S had a significantly higher risk of readmission compared to SG (OR=2.14, 95% CI=1.08-4.26).



When compared with SG, SADI-S patients had:

- **Higher BMI** (MD=3.83, 95% CI=0.52-7.14, p=0.02)
- **Higher risk of having HTN** (OR=1.38, 95% CI=1.04-1.84, p=0.03)
- **Longer OT** (MD=65.97 min, 95% CI=61.71-70.25, p<0.001)
- **Longer LOS**(MD=1.03 days, 95% CI=0.70-1.37, p<0.001)
- **Higher %EWL** (MD of 12.42% , 95% CI= 0.92-23.92, p=0.03).

Conclusion

SADI-S demonstrates substantial improvements in weight loss and perioperative outcomes compared to SG. Overall, both procedures were found to be safe, demonstrating comparable rates of complications and reoperations.

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