

Sleeve Gastrectomy vs Roux-en-Y Gastric Bypass For Type 2 Diabetes and Morbid Obesity Psychology and Quality of Life

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Te Whatu Ora - Waitemata, New Zealand**

XXVII Ifso World Congress



Melbourne 2024

Disclosures

Fuel vouchers funded by our trust account:

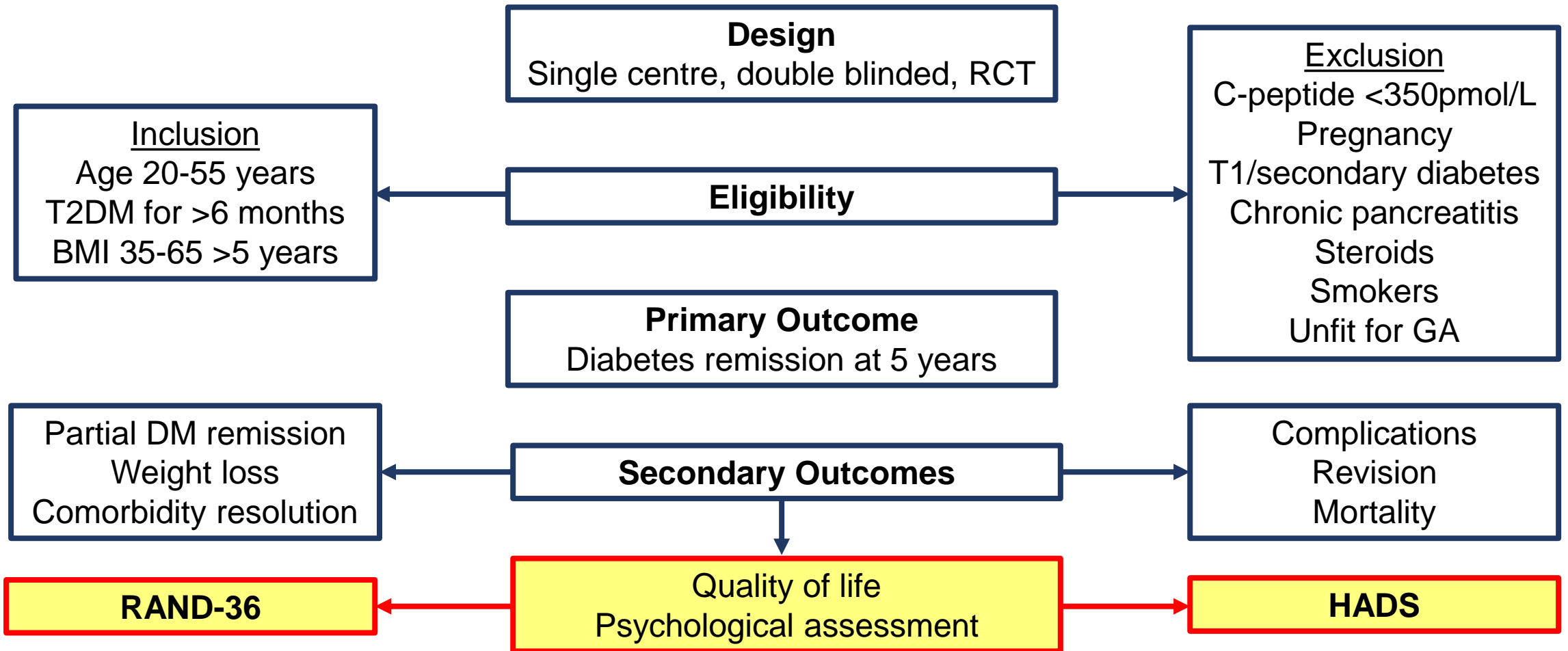
Johnson and Johnson

Medtronic

Obex

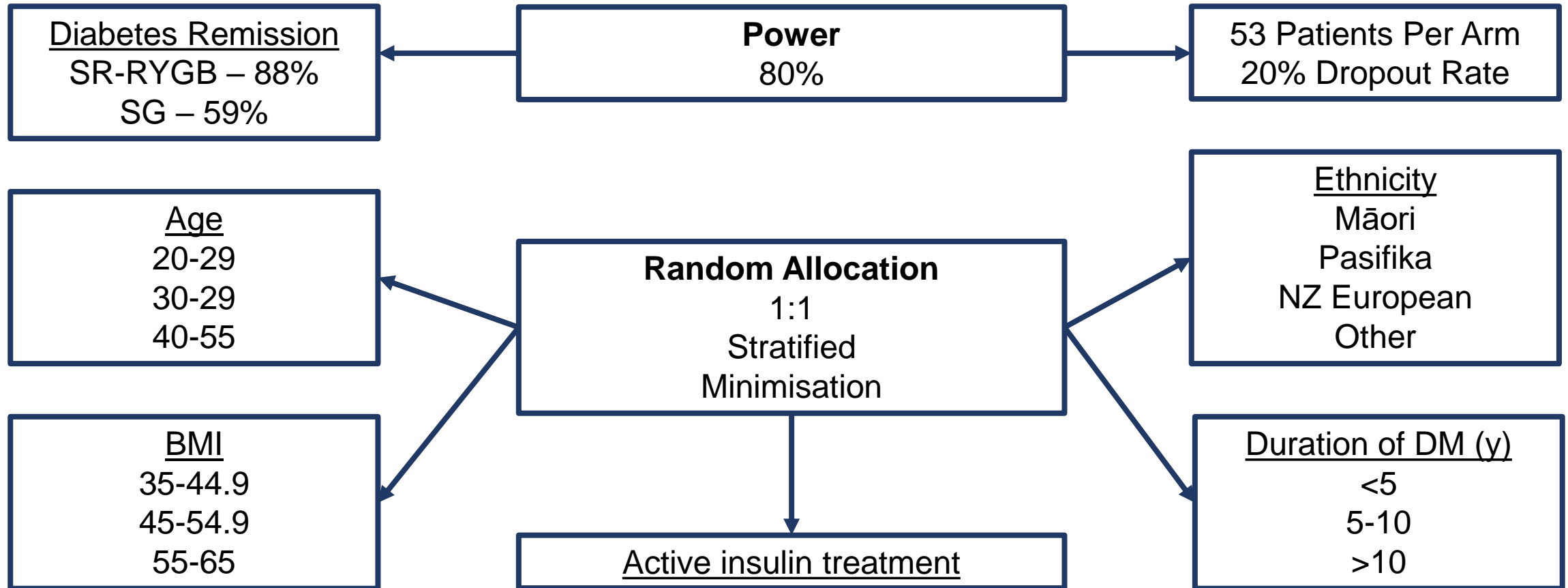
Auckland Medical Research Council

Methods



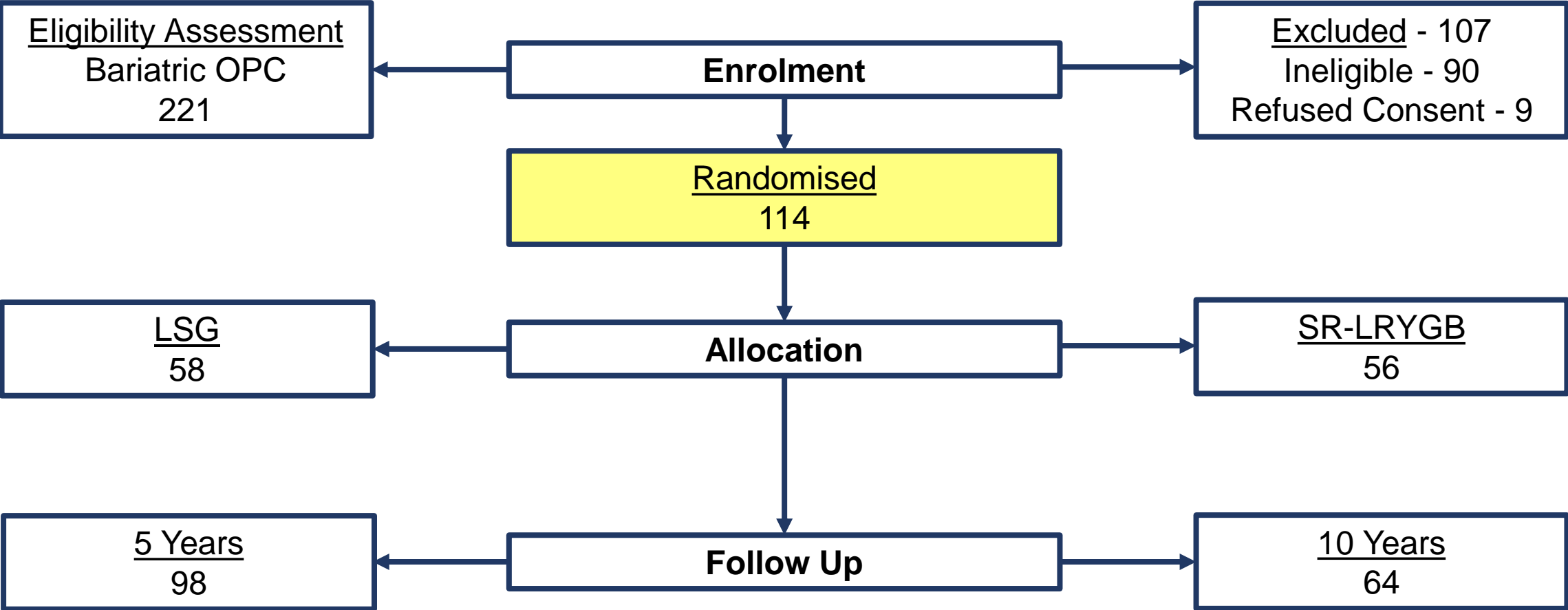
Murphy et al 2016 BMJ Open

Methods



Murphy et al 2016 BMJ Open

Participant Journey



Murphy et al 2018 Obesity Surgery, Murton et al 2023 Obesity Surgery

Baseline Information

	LSG	SR-LRYGB
Characteristic	n=58	n=56
Age, year (SD)	45.5 ± 6.4	46.6 ± 6.7
Female sex – n (%)	26 (45)	33 (59)
Duration of diabetes – n (%)		
<10 years	41	39
≥10 years	15	17
Glycalated haemoglobin – mmol/mol	61.9 ± 12.8	64.5 ± 18.1
Body weight - kg	126.7 ± 24.3	123.4 ± 21.3
Body mass index (kg/m ²) – n (%)		
35 – 44.9	41 (77)	43 (77)
45 – 54.9	15 (26)	9 (16)
55 – 65	2 (3)	4 (7)

Murphy et al 2018 Obesity Surgery

Baseline HADS

*	LSG	SR-LRYGB
HADS Scales, mean (SD)	n=30	n=34
Anxiety	6.1 (5.0)	4.1 (3.3)
Depression	3.6 (3.5)	3.1 (2.7)

* Includes only those that completed 10 year follow up

Baseline RAND-36

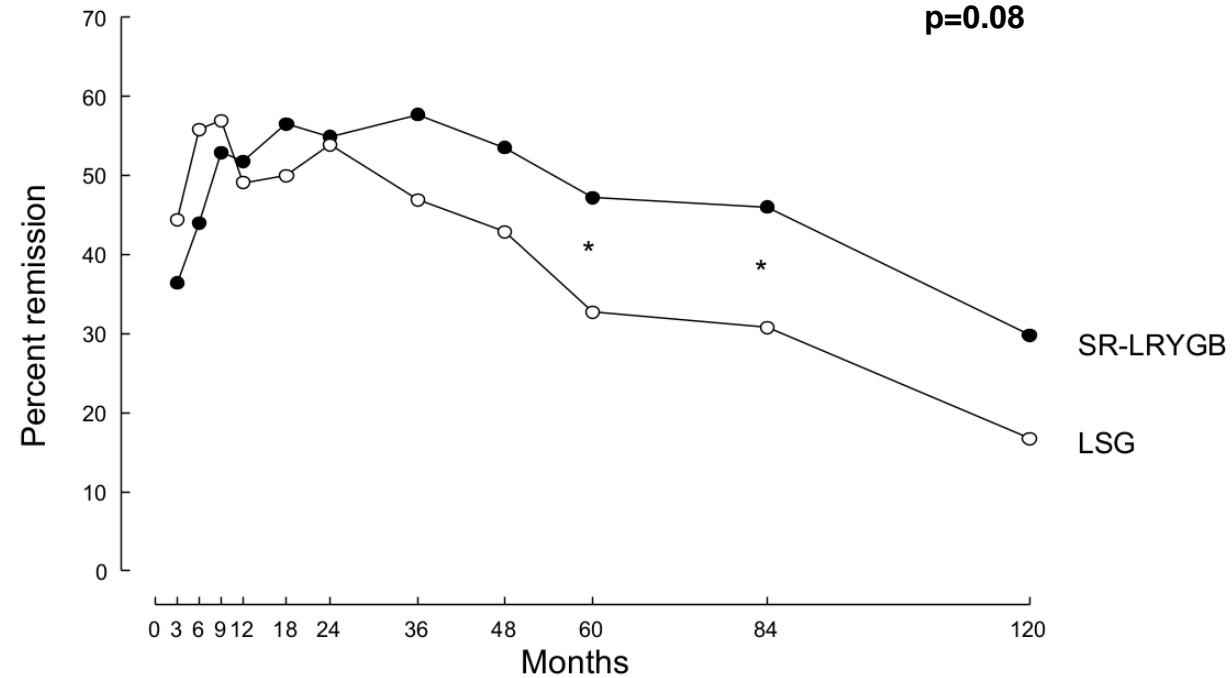
*	SG	SR-RYGB
RAND-36 Domains, mean (SD)	n=30	n=35
Physical Functioning	76.0 (21.2)	70.3 (14.4)
Role Physical	79.3 (31.4)	72.9 (35.5)
Role Emotional	86.2 (27.5)	89.5 (39.3)
Vitality	59.3 (20.9)	63.3 (20.6)
Mental Health	77.2 (20.8)	86.2 (20.8)
Social Functioning	81.3 (20.7)	85.7 (20.9)
Bodily Pain	78.7 (19.6)	74.3 (25.7)
General Health	56.4 (24.7)	54.9 (18.2)

* Includes only those that completed 10 year follow up

Main Outcomes 10 Years

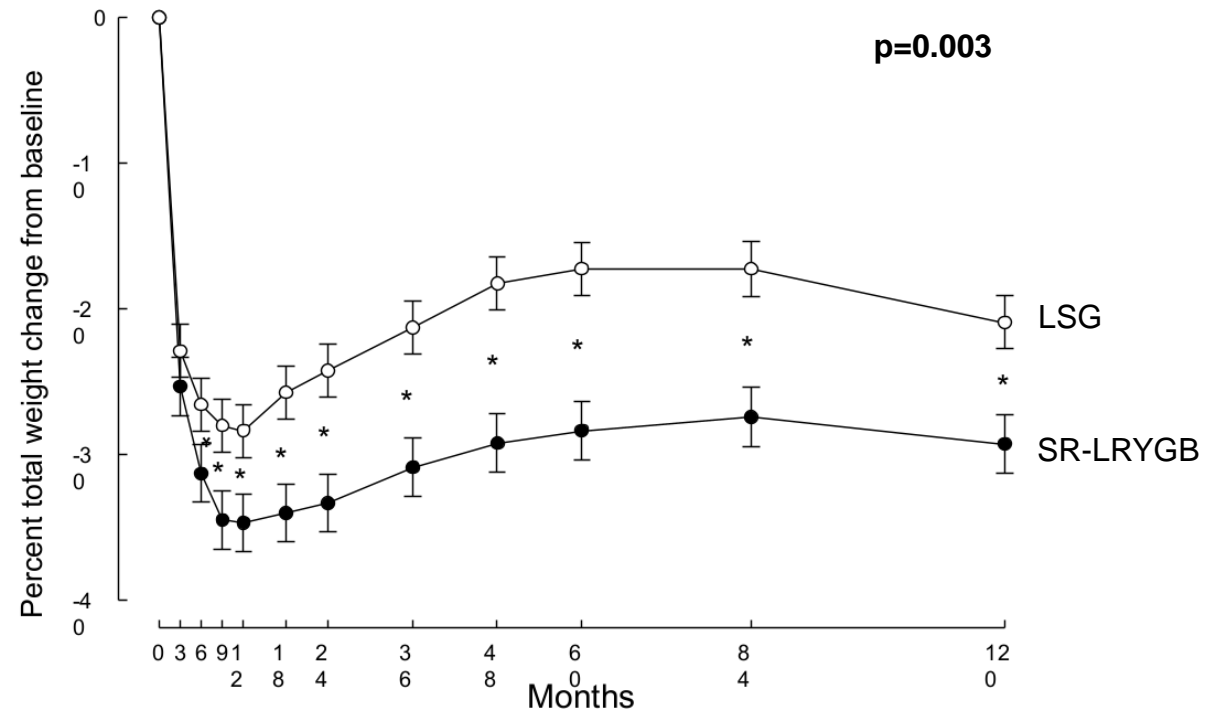
Diabetes Remission

p=0.08



Weight Change

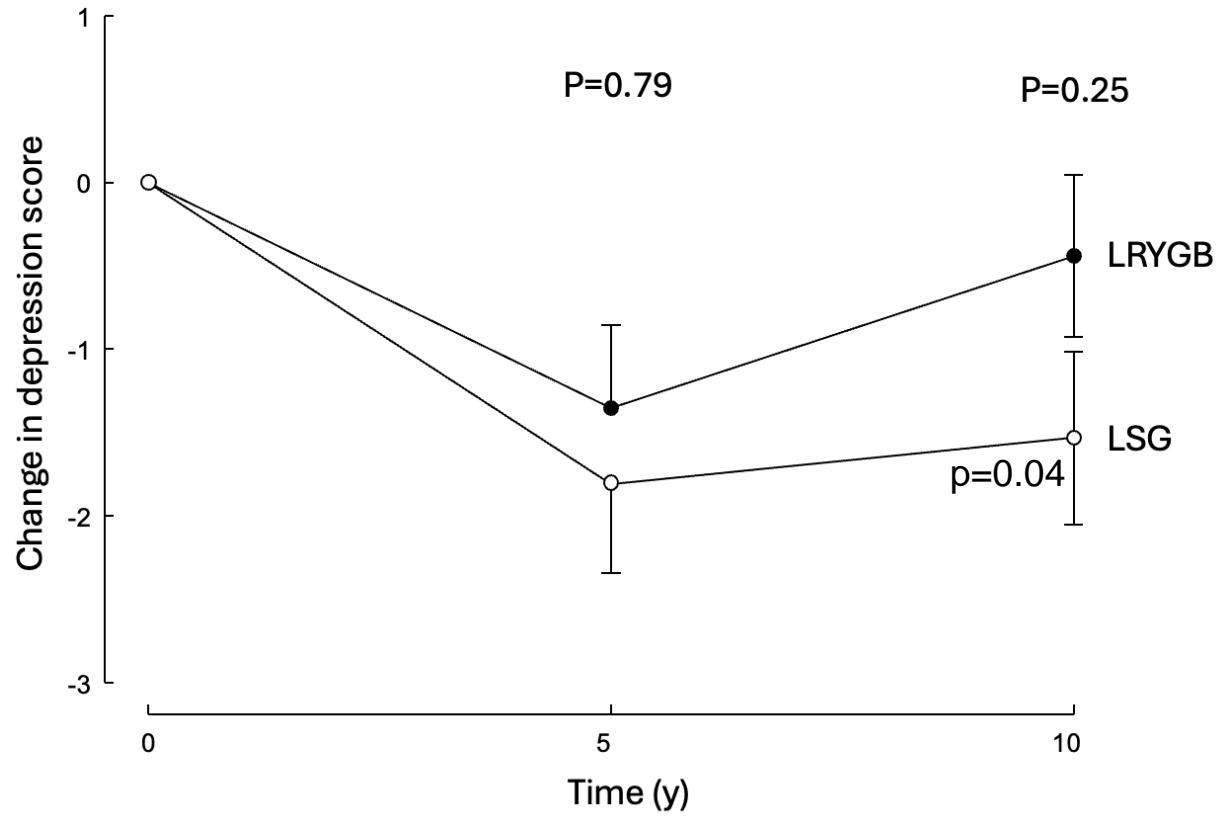
p=0.003



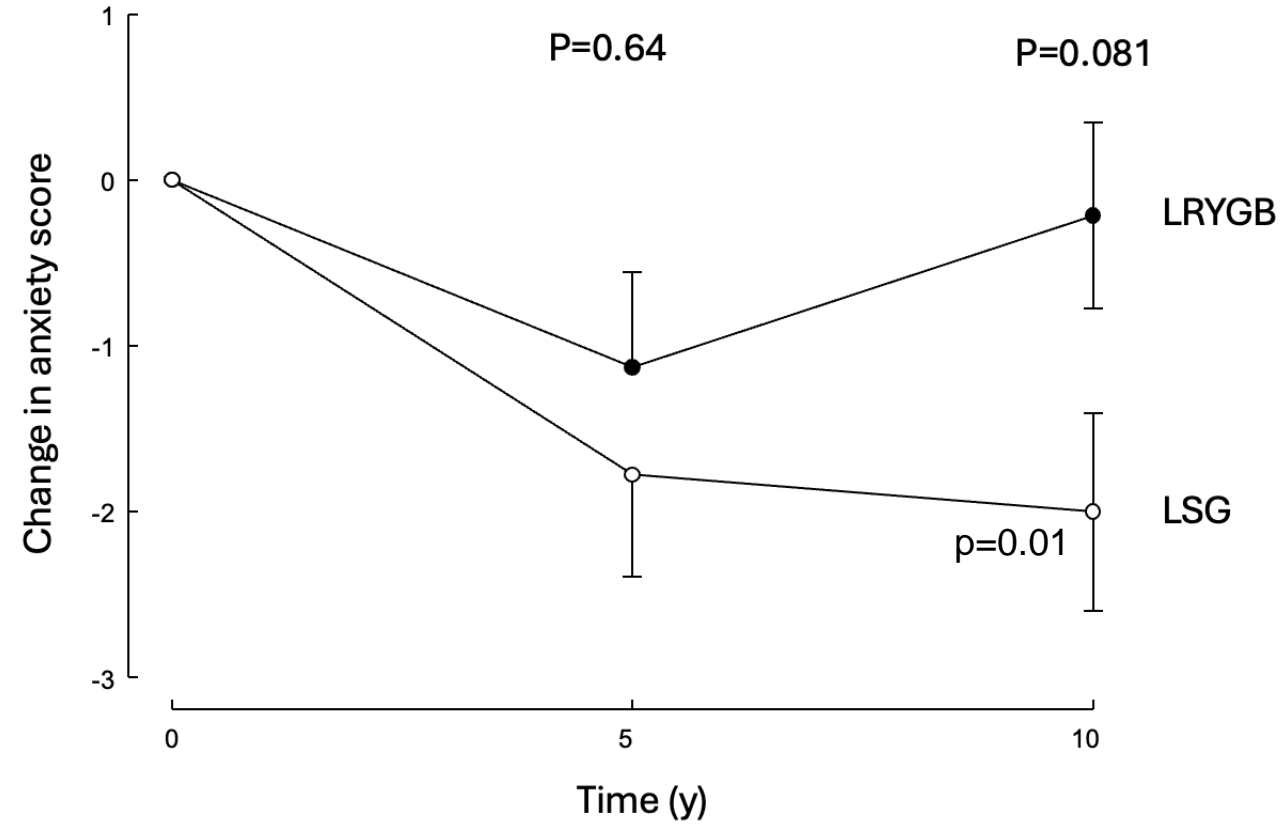
Murton et al 2023 Obesity Surgery

HADS

Depression Scores

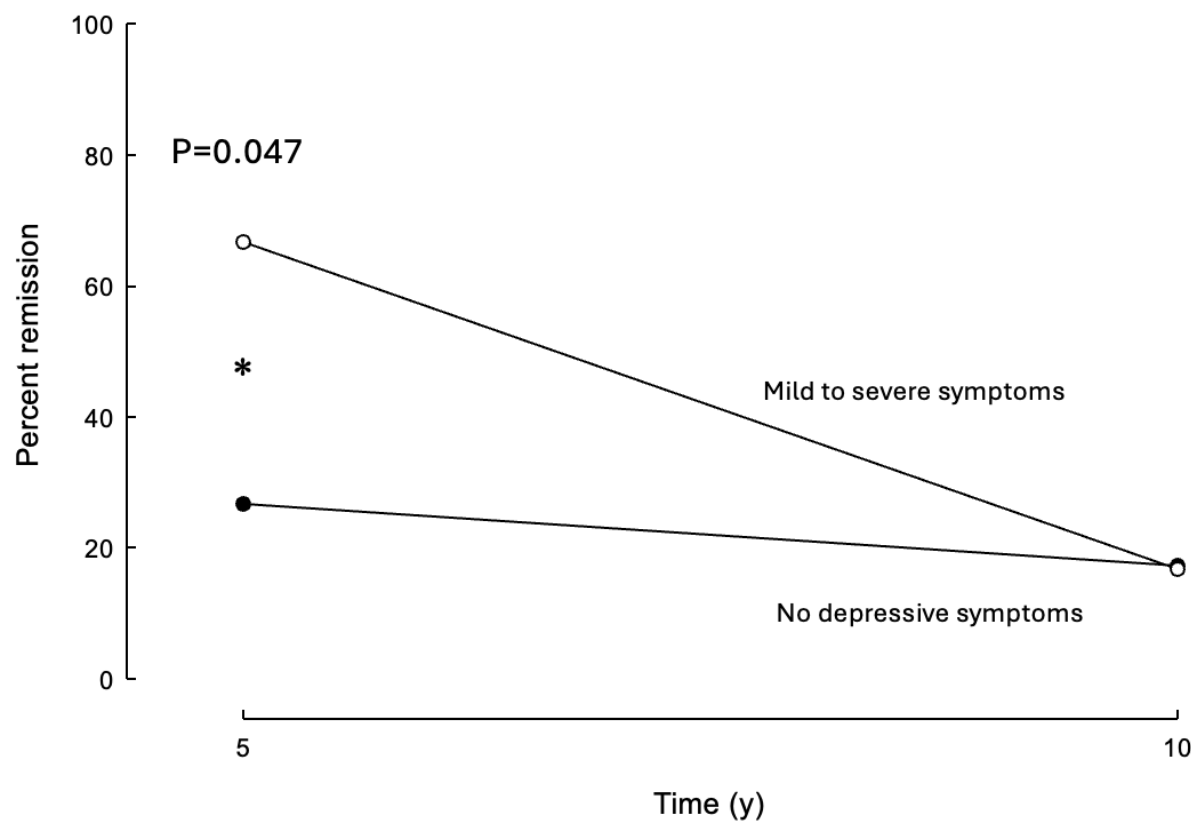


Anxiety Scores

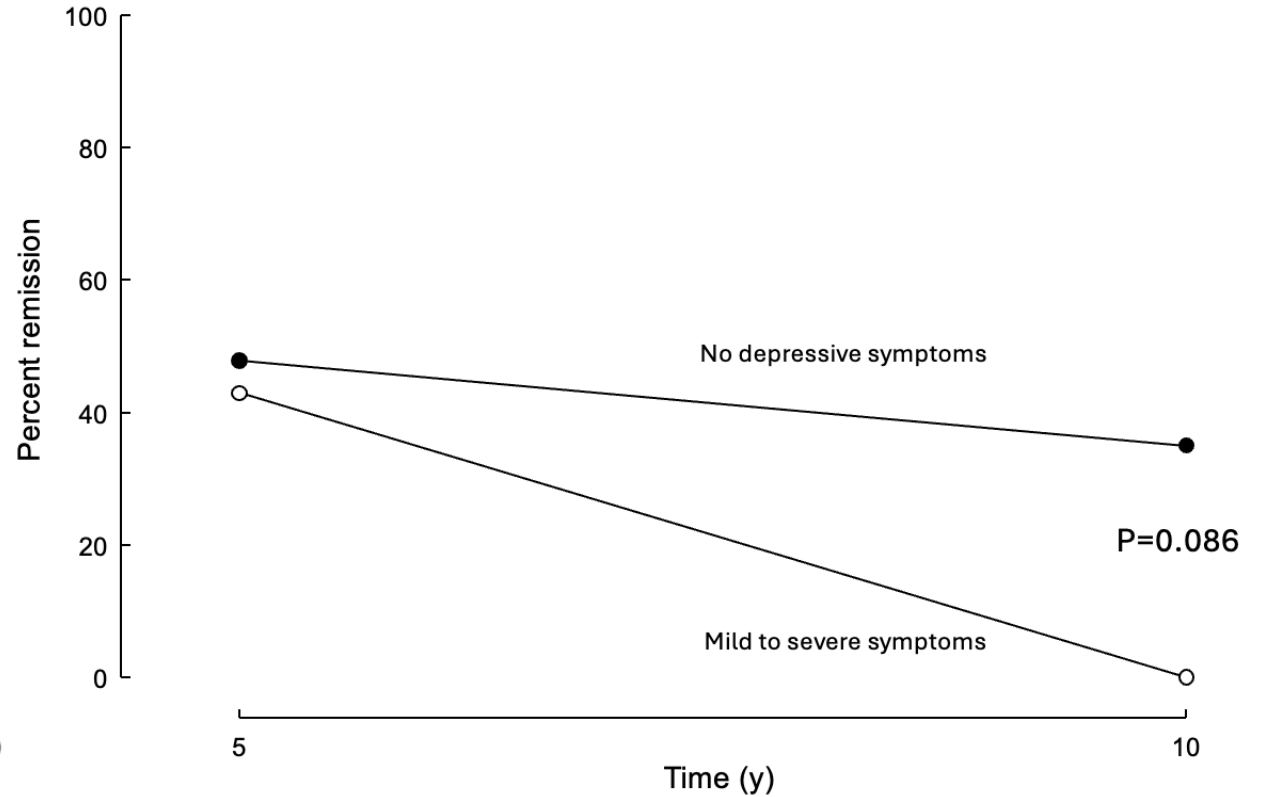


Diabetes Remission and Depression

LSG

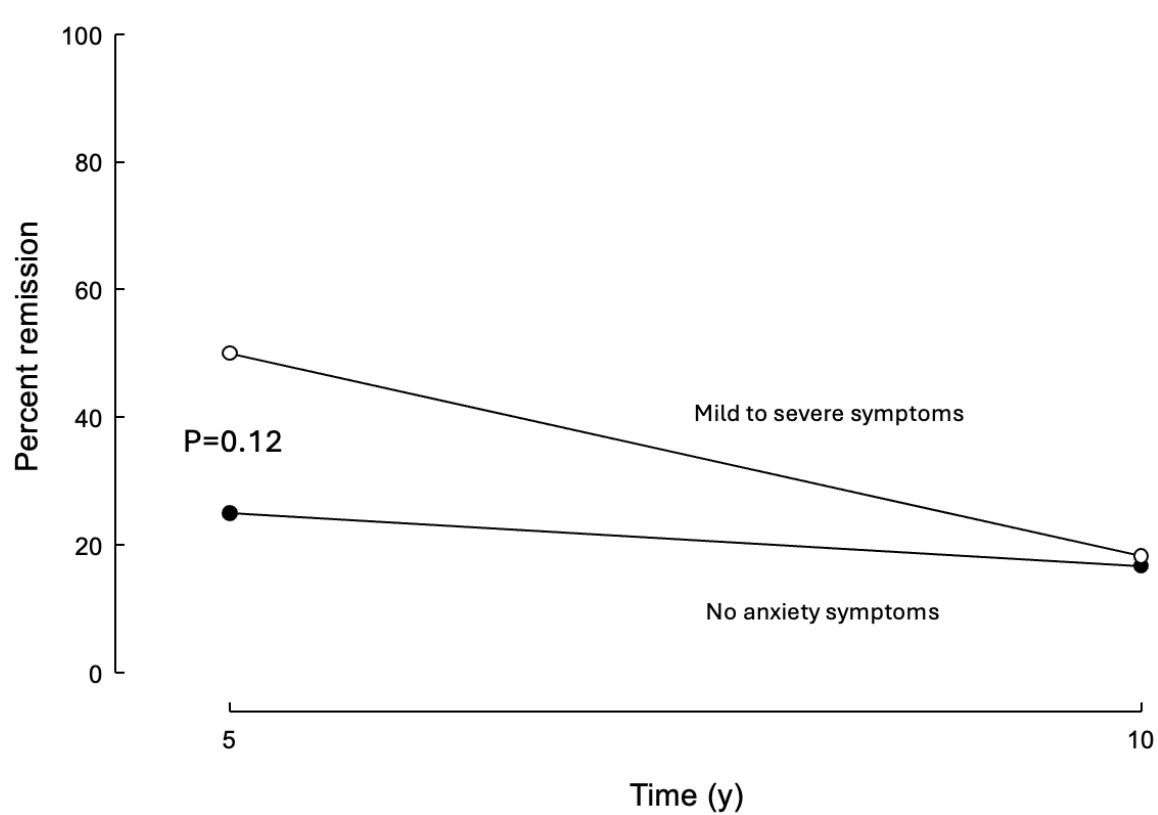


SR-RYGB

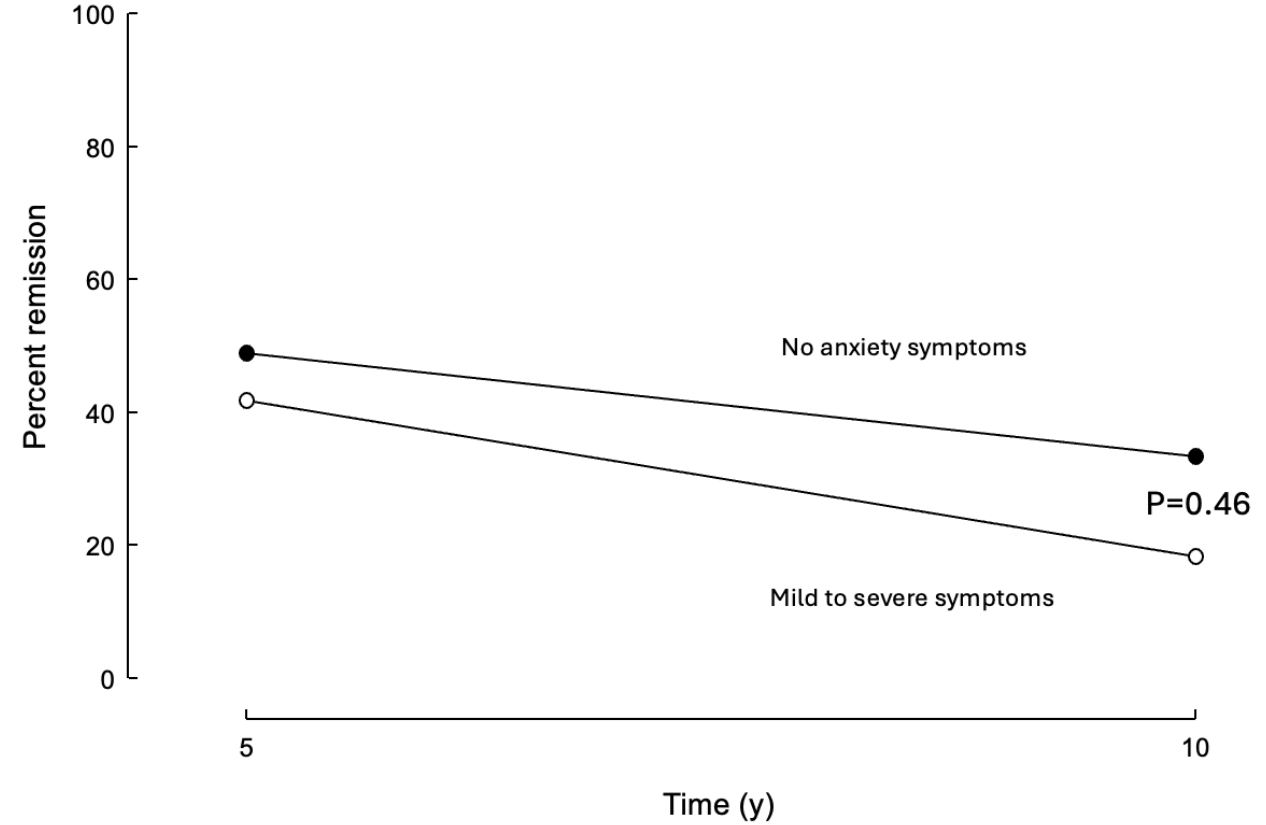


Diabetes Remission and Anxiety

LSG

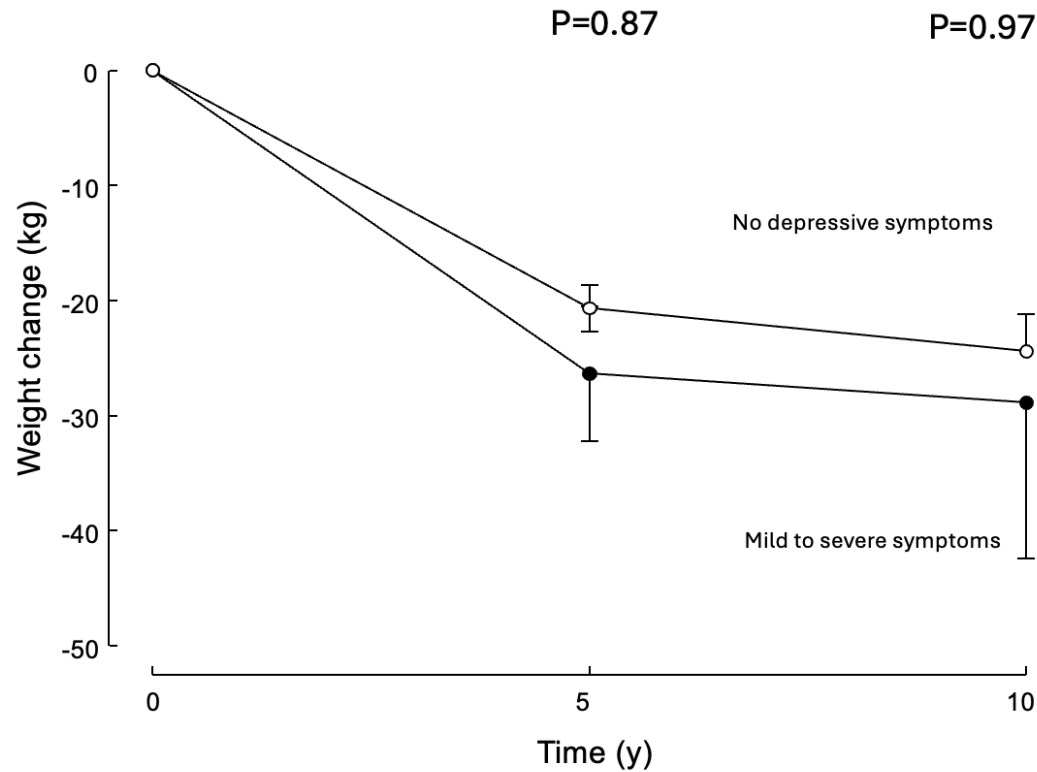


SR-RYGB

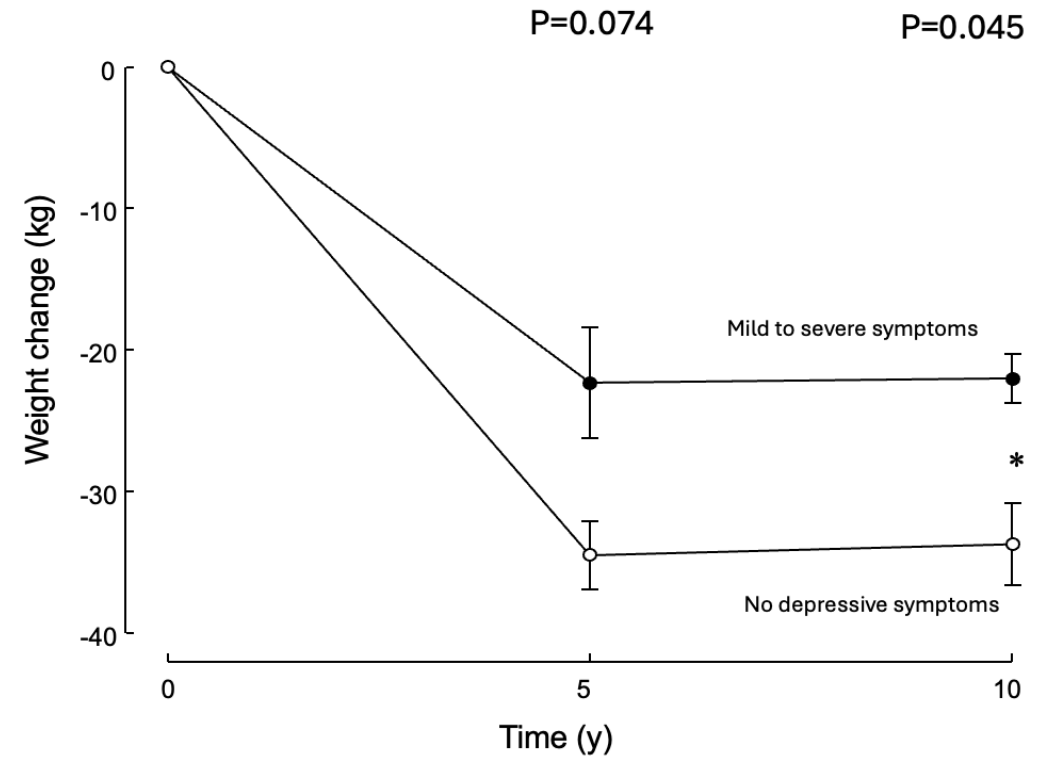


Weight Loss and Depression

LSG

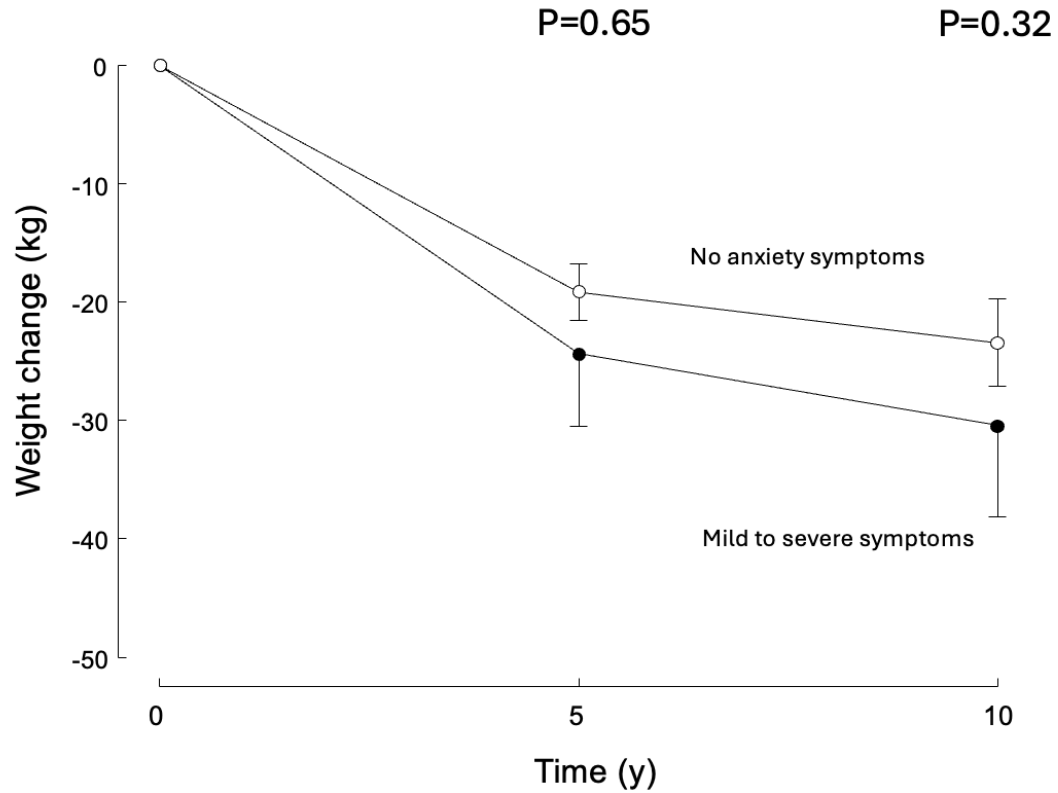


SR-RYGB

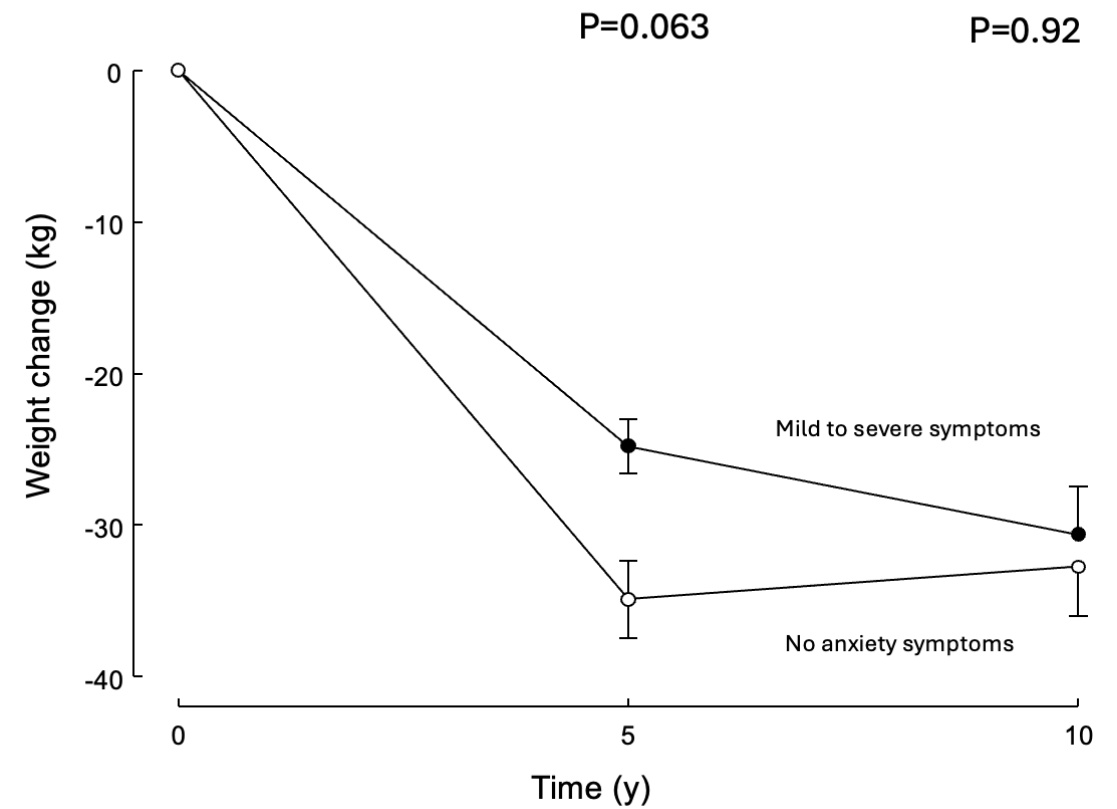


Weight Loss and Anxiety

LSG

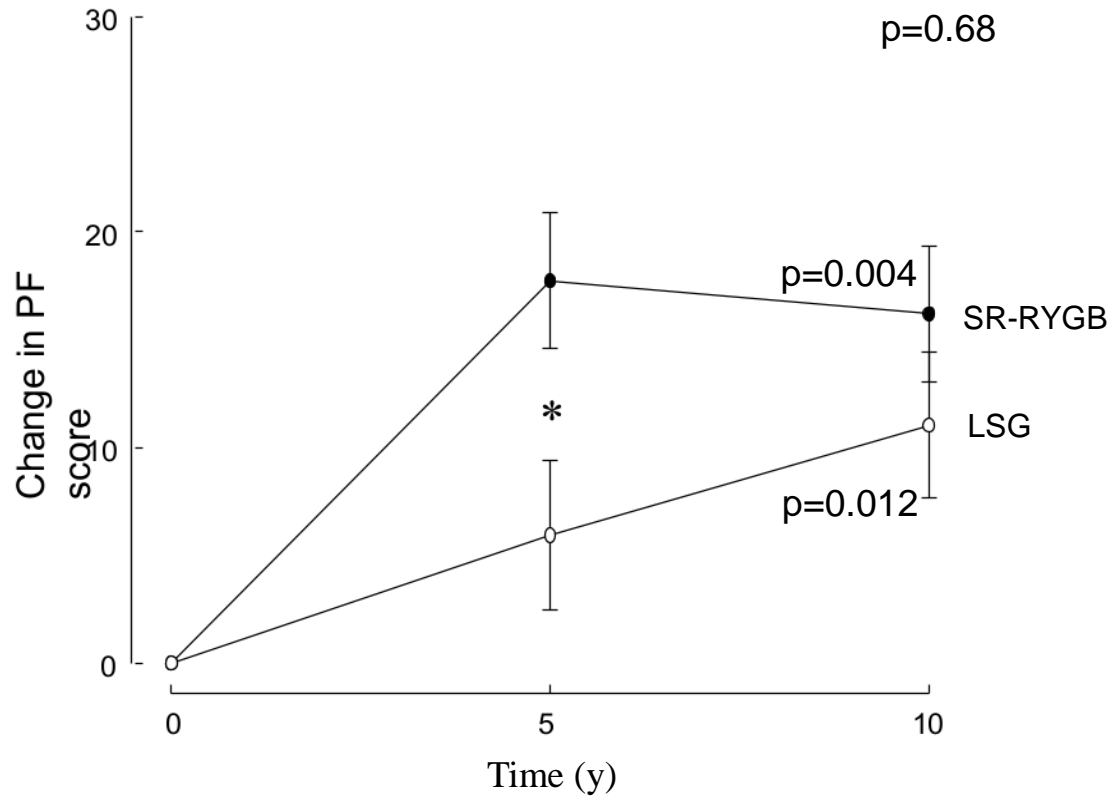


SR-RYGB

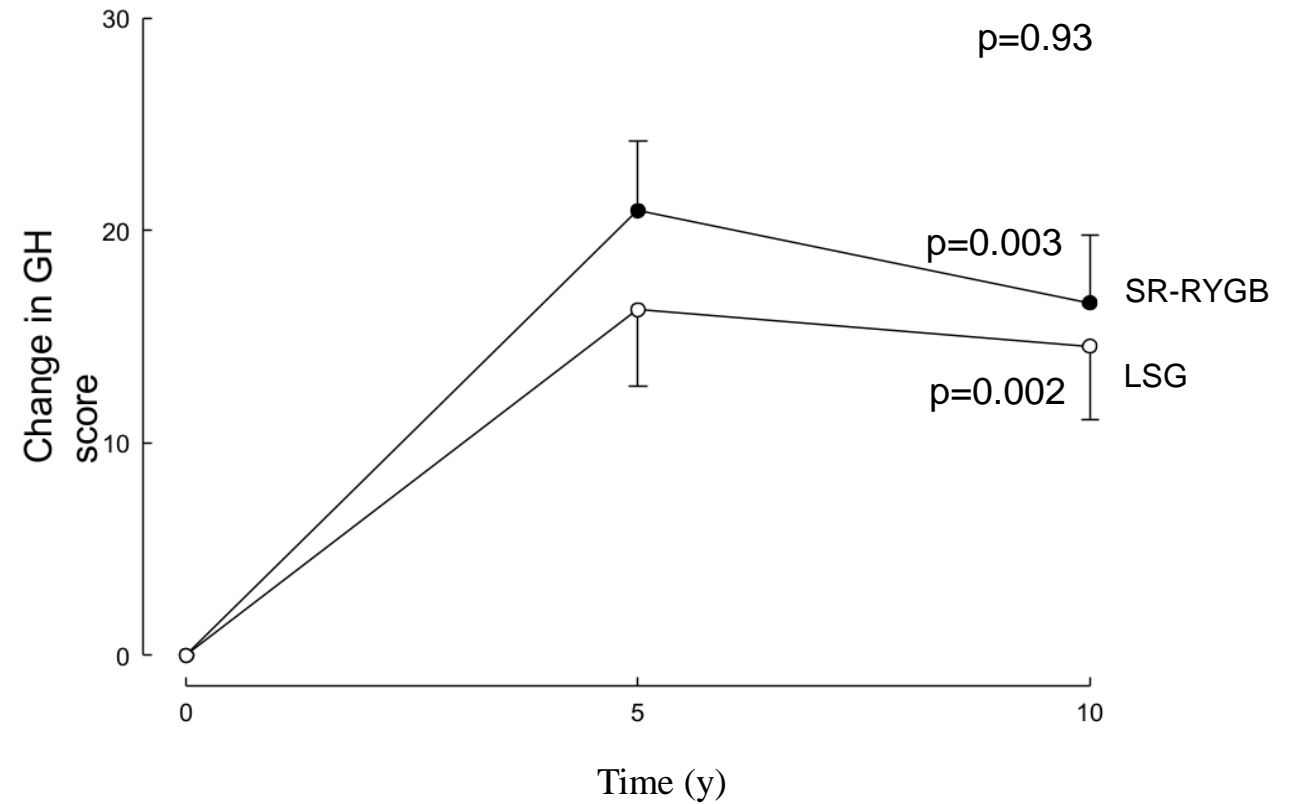


RAND-36

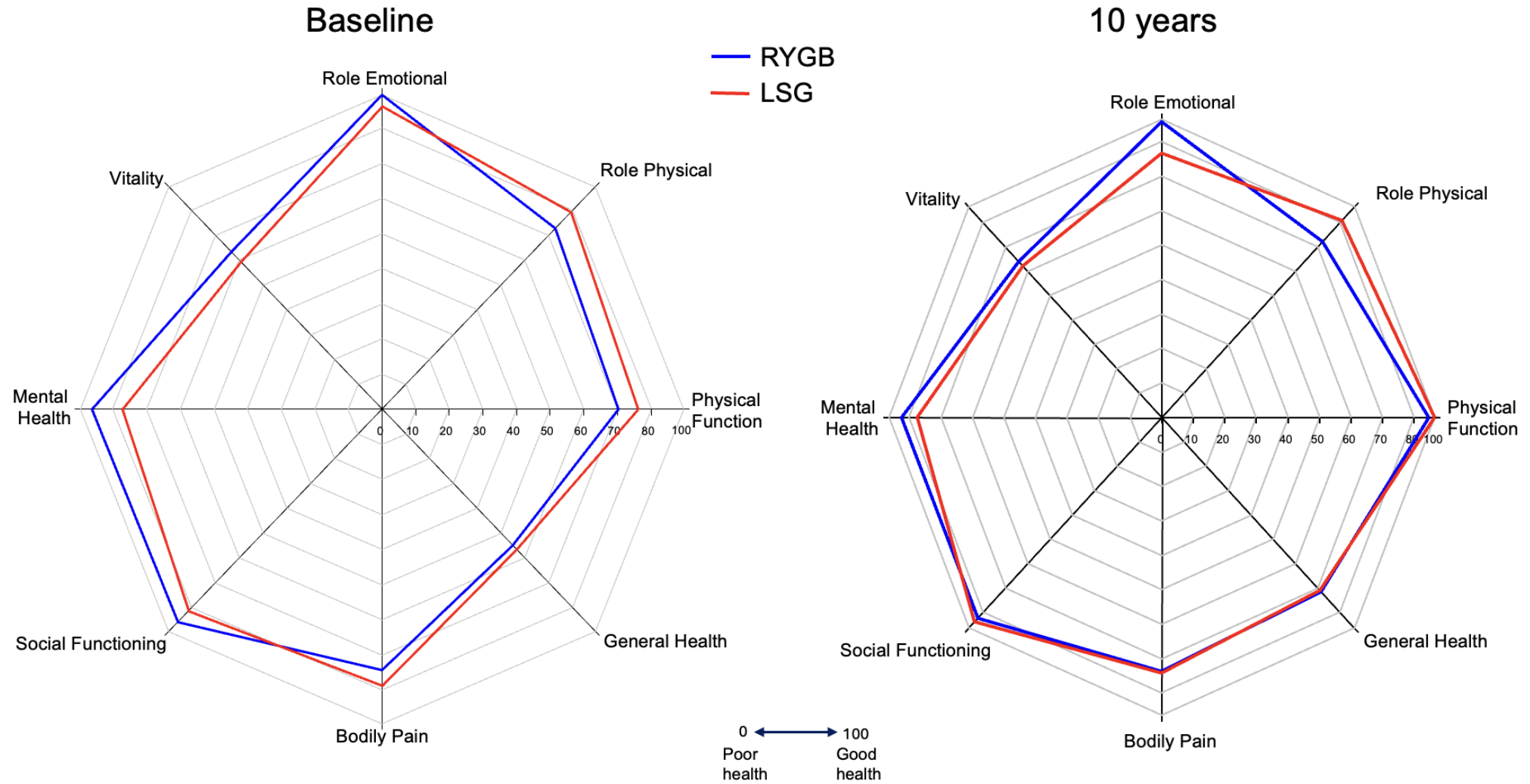
Physical Function



General Health



RAND-36



Conclusion

Bypass

Greater diabetes remission, weight reduction and improvement in QOL

Sleeve

With pre-existing depression and anxiety symptoms
Patients did better for diabetes remission and weight reduction

Should depressed and anxious patients get sleeves
?

References

1. Murphy R, Evennett NJ, Clarke MG, et al. Sleeve gastrectomy versus Roux-en-Y gastric bypass for type 2 diabetes and morbid obesity: double-blind randomised clinical trial protocol. *BMJ Open*. 2016;6(7):e011416. Published 2016 Jul 4. doi:10.1136/bmjopen-2016-011416
2. Murton LM, Plank LD, Cutfield R, et al. Bariatric Surgery and Psychological Health: A Randomised Clinical Trial in Patients with Obesity and Type 2 Diabetes. *Obes Surg*. 2023;33(5):1536-1544. doi:10.1007/s11695-023-06537-y
3. Murphy R, Clarke MG, Evennett NJ, et al. Laparoscopic Sleeve Gastrectomy Versus Banded Roux-en-Y Gastric Bypass for Diabetes and Obesity: a Prospective Randomised Double-Blind Trial. *Obes Surg*. 2018;28(2):293-302. doi:10.1007/s11695-017-2872-6