



NAPOLI
2023

Comparison of 5 year weight loss outcomes of
Primary OAGB and Revision OAGB after LSG,
a Single Surgeon study.

SHAH POONAM, KHARAT SUSHIL, SHAH RADHIKA, SHAH SHASHANK

Dr. Poonam Shah

MD Medicine

Director- *Laparo-Obeso Centre*, India.

NABH Accredited for Bariatric and Laparoscopic

Centre Of Excellence – OSSI, IEF

Ex- Integrated Health Member – IFSO

Ex- Joint Secretary- AIAARO

Affiliate Member- OSSI

Life Member- Asso Of Physicians of India

- AIDS soc of India

- RSSDI , DiabetesIndia



Background:

One Anastomosis Gastric Bypass (OAGB) has become popular as a Primary procedure, with acceptable long-term weight loss outcomes.

OAGB is also being used as a Revision procedure after Restrictive procedures.

This study compares weight loss outcomes of **Primary OAGB (PGB)** and **Revision OAGB (RGB)**, after **LSG**, at **1** and **5** years.



Objective- Compare only weight loss outcomes of PGB and RGB.

Methods- Retrospective analysis of prospectively collected data of PGB and RGB, performed by a single surgeon, from January 2012 to December 2018, Which was evaluated statistically and compared.

Weight & BMI was compared at **Base line, 1 year/ minimum & 5 years** for both groups.

This study focuses only on weight loss outcomes, since it is a predictor of many comorbidities.



Baseline characteristics

	PRIMARY OAGB PGB	REVISION OAGB RGB
NUMBER	74	35
MALE : FEMALE	35 : 39	15 : 20
AGE	20 TO 70	23 TO 73

Baseline characteristics

	PGB (PRIMARY OAGB)	RGB (REVISION OAGB)
Mean Baseline Weight In Kg	110.60	111.09
Mean Baseline BMI Kgs/m ²	40.67	40.63

Baseline characteristics

RGB – 35 patients

Initial BMI @ Lap. Sleeve Gastrectomy - Mean 58.9

14

**Inadequate weight loss
Revision @2 to 3 years**

21

**Weight regain
Revision @ 6 to 8 years**

***From 2005 to 2012/2014 → LSG → RYGBP**

***From 2012/2014 ONWARDS →**

LSG → RYGBP if GERD/HIATUS HERNIA

LSG → OAGB for the rest

Procedure Details – Single Surgeon

	PRIMARY OAGB PGB	REVISION OAGB RGB
Bougie Size	36 fr	Re-sleeve to 36 fr
Bilio-Pancreatic Limb Length	150 cm	150 cm
Stomal size	5 cm	5 cm

BOTH GROUPS COMPARABLE AT BASELINE

	PGB (PRIMARY OAGB)	RGB (REVISION OAGB)
Mean SD Baseline Weight In Kg	110.60	111.09
Mean Baseline BMI Kgs/m ²	40.67	40.63

There is no significant difference between Mean weight at Baseline prior to OAGB Surgery (p-value > 0.05).

OBSERVATIONS AT 1 year

	PGB (PRIMARY OAGB)	RGB (REVISION OAGB)
Mean (SD) for Weight 1st year	74.92	84.38
Mean BMI at 1 yr	27.74	32.17

There is significant difference between Mean weight at 1 year.
There is significant change in weight at 1 year for PGB (p-value < 0.05).

OBSERVATIONS at 5 years

	PGB (PRIMARY OAGB)	RGB (REVISION OAGB)
Mean SD Weight In Kg at 5 years	80.80	91.51
Mean BMI Kgs/m ²	29.69	33.74

At 5 year, there was more weight loss at 5 years in the PGB group but the difference was not statistically significant , but clinically significant..

Weight & BMI Trend

	WT baseline	WT 1 yr / Min	WT at 5 yrs	Change in WT at 5 yrs
PRIMARY OAGB (PGB)	110.29	74.92	80.80	30.10
REVISION OAGB (RGB)	111.09	86.38	91.51	15.99

	BMI Baseline	BMI 1 yr / Min	BMI at 5 yrs	Change in BMI at 5 yrs
PRIMARY OAGB (PGB)	40.60	27.74	29.69	11.1
REVISION OAGB (RGB)	40.63	32.17	33.74	5.37

	PGB (PRIMARY OAGB)	RGB (REVISION OAGB)
Change in Weight at 5 years	30.10	15.99
Change in BMI at 5 years	11.01	5.37
% Change in Weight at 1 Year	31.79	21.64
% Change in Weight at 5 year	26.85	15.64
% Change in BMI at 1 year	32.33	25.18
% Change in BMI at 5 year	26.62	14.59

There is significant difference in percentage (%) change in weight loss at 1 year and at 5 years in PGB and RGB groups-

So the Mean % Change in Weight is significantly more in PGB than RGB group.

Limitations

- * Only weight loss was evaluated in the study.**
- * Even though the baseline BMI before OAGB was same in both the groups initial BMI in the revision group was very high making them less comparable.**
- * Complied results of weight loss with all comorbidities was beyond the scope of this abstract but will be reported and published.**

Conclusion / Clinical application

1. Revision OAGB for inadequate weight loss or weight regain after sleeve gastrectomy (LSG) is safe and effective for weight loss up to 5 yrs but less effective than Primary OAGB.
2. Biliopancreatic limb should be more than 150 cm in patients undergoing revision OAGB.
3. Larger and more comprehensive studies are needed to understand the mechanisms behind less effectiveness of the same procedure when used as a revision procedure .

THANK YOU!



NAPOLI
2023