The banded sleeve gastrectomy revisited: long-term experience from a single centre.

M Orizu[a], LA Pearless[b], MWC Booth[a,b]

[a]Department of General Surgery, North Shore Hospital, Waitemata District Health Board, Auckland, New Zealand.
[b]Surgical Weight Solutions, Auckland, New Zealand.

Introduction

- Obesity remains a worldwide epidemic with serious ramifications for associated morbidity and mortality.
- Surgery remains the only recognized intervention with proven long-term and durable weight reduction and elimination or remission of obesity related co-morbidity.
- Sleeve gastrectomy (SG) is now an established procedure but its Achilles heel is weight regain[1].
- Placing a silastic ring (SR) around the sleeve has been suggested as a means to limit gastric distension and hence, weight regain.[2,3]

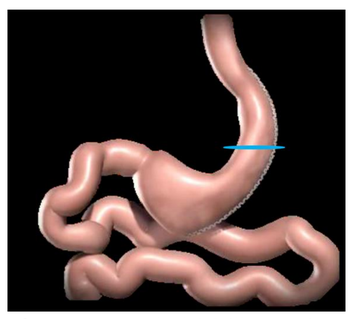

Figure 1. Banded SG illustration.

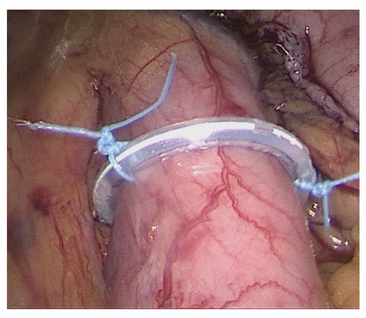

Figure 2. Completed silastic ring

Aims

- To review our long-term experience of patients who had a silastic ring placed around a gastric sleeve.
- Primary endpoint is amount of excess weight los.
- Secondary endpoints include re-intervention rate, co-morbidity resolution, adverse events and patient satisfaction.

Methods and Materials

Retrospective review of a prospective bariatric database.

A single centre in Auckland, New Zealand.

Patients underwent laparoscopic sleeve gastrectomy with SR of between 6.5 to 7.5cm circumference.

Institutional ethics approval was obtained prior to commencement.

Questionnaires and case records were assessed to obtain patient weights and relevant clinical data.

Results

- 53 patient records were available for review.
- Long-term (10years) data was available for 24 patients (45.3%).
- Mean (median) follow up was 146.25months (146months).
- Median patient satisfaction score was 9 (out of 10).
- **Mean weight loss at 10yrs was 25.77kg (7.9 - 45.8kg)**
- **Mean % excess body weight loss at 10yrs was 81.16% (24.75 - 161.14%)**
- **70.8% of patients reported %EWL >50**

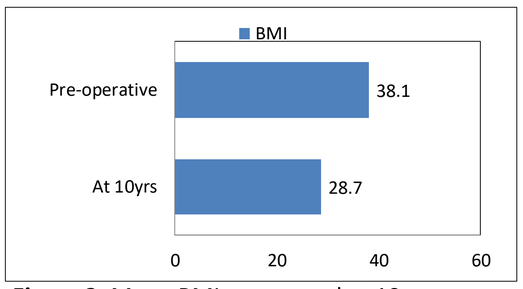

Figure 3. Mean BMI pre-op and at 10years

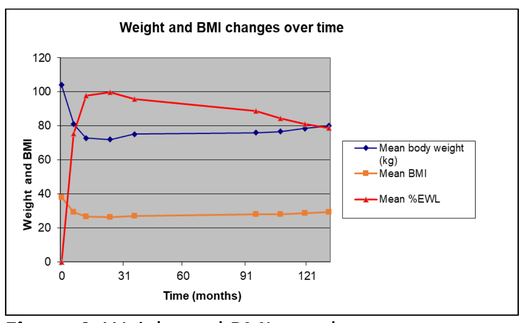

Figure 4. Weight and BMI trends

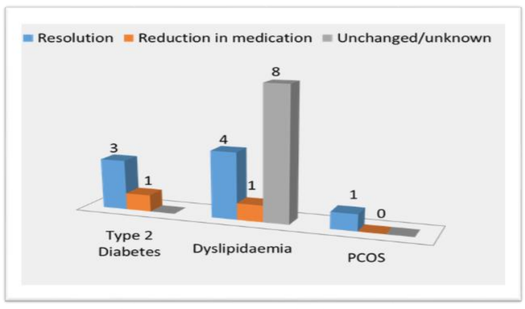

Figure 5. Changes in comorbidities (PCOS – Polycystic ovary syndrome)

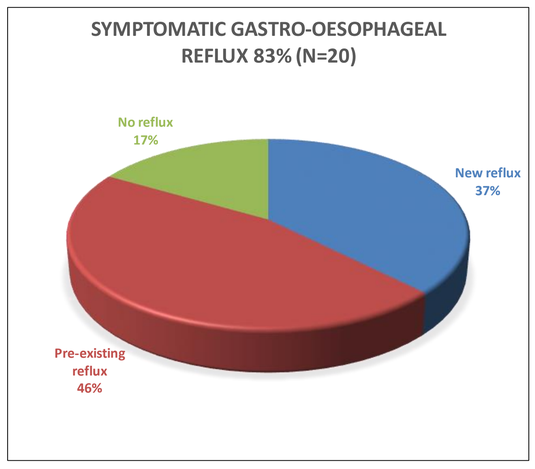

Figure 6. Incidence of GORD

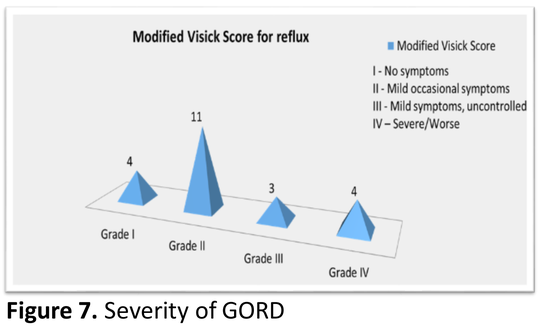

Figure 7. Severity of GORD

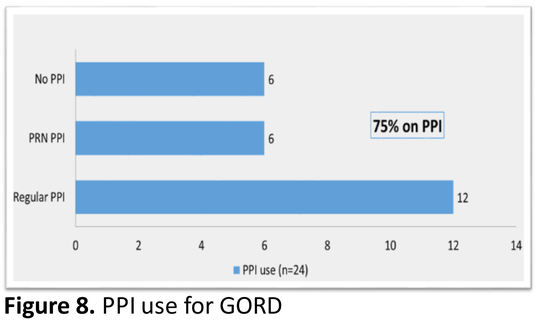

Figure 8. PPI use for GORD

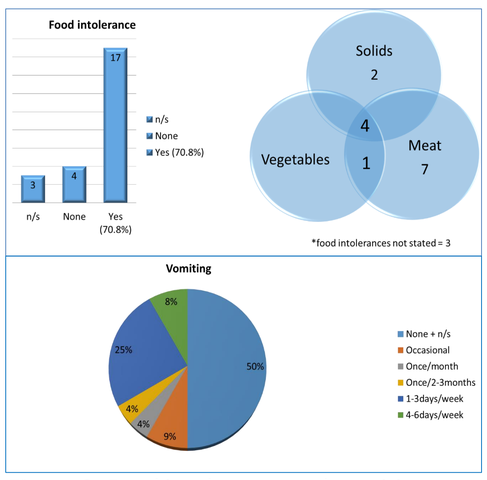

Figure 9. Food intolerance and vomiting

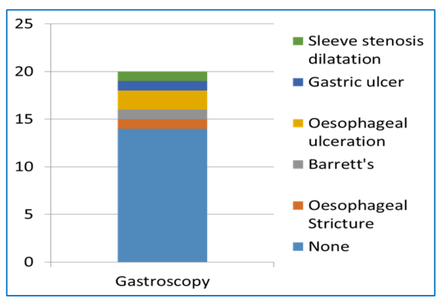

Figure 10. Gastroscopy (10 patients)

Reintervention:

- Silastic ring removal - 6 (25%)
  - Reflux (4)
  - Food intolerance (2)
- Conversion to gastric bypass - 2 (8.3%)
  - Reflux (2)

❖ Median time to silastic ring removal = 98.5months

❖ Median time to bypass = 98months

Conclusions

- Silastic ring banded sleeve gastrectomy appears to have enhanced excess weight loss in the longer term and appears to be superior to %EWL of non-banded, conventional sleeve gastrectomy reported in the literature.[4,5]
- Symptomatic reflux is high but appears well controlled on PPI.
- Overall, patients are highly satisfied with this procedure.
- Silastic ring removal rates are high and SRSG may be better tolerated by a larger silastic ring (7-7.5cm) placed higher up on the sleeve, 3-4cm from the GO junction[6]

References

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