Section V

Laparoscopic Sleeve Gastrectomy (LSG): Technique, Complications, Outcomes, and Controversies

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Laparoscopic Sleeve Gastrectomy (LSG) has established itself as a definitive weight loss proce-dure across the globe. Recently, it has taken over the number one position from the current 'gold standard'—Roux-en-Y Gastric bypass (RYGBP). However the growth of sleeve gastrectomy has been accompanied with more than its fair share of criticism. The initial argument of the critics (and there are many vehement critics still!) is that weight loss is not sustained. They compared it to Vertical banded gastroplasty (VBG) and predicted that LSG will meet the same fate as VBG! The consistently good medium and long term weight loss results as well as metabolic impact of LSG have been discussed in detail in the chapter on outcomes after sleeve gastrectomy.

Today, the technique of the procedure is more or less standardized. Like most other surgical pro-cedures, there are bound to be some variations based on individual preferences. The only contro-versy of significant importance is whether staple line reinforcement decreases leak rate. Though there are numerous randomized studies comparing the various techniques of reinforcement, the sample size is too small to reach any meaningful conclusion. In the chapter on technique, which has been co-authored by none other than the originator of sleeve gastrectomy—Dr Gagner, we have focused on the standard steps of surgery leaving the discussion of controversies in tech-nique to another chapter.

The fear of leak and it problematic management is definitely an important issue. However the good news is that the leak rate is decreasing. In a recent article Dr Gagner reported that the leak rate has decreased from earlier average of 2.5–1.1 % based on an analysis of >46,000 patients (*Surg Obes Relat Dis*. 2014 Jul-Aug;10(4):611–2.). The Chapter on complications has been au-thored by Dr Himpens in which the authors have presented probably the largest series of late post-LSG complications. I believe that detailed discussion of late complications, which has gen-erally received scant attention, would be of immense benefit to the reader.

The Gastro-esophageal reflux (GER) remains an important unresolved problem. There are a number of studies showing that GER worsens after sleeve. Appearance of de-novo reflux in some patients after surgery is another pitfall. However, there are an equal number of studies re-porting improvement of GER after LSG. All these studies and other relevant issues have been discussed lucidly in the chapter on Controversies by Dr Borg and Dr Adamo.

It has been our endeavor to present a comprehensive overview of this exciting procedure. The chapters reflect the experience of eminent surgeons along with inclusion of most recent and rele-vant literature. There is an explosion of literature about LSG and I am sure that this would help consolidating the relevance of sleeve gastrectomy. We might see sleeve gastrectomy being la-beled as the new "gold standard" surgery for morbid obesity in not so distant future.

Finally I would welcome any comments and criticism which would only help us in improving the section in future editions.