



Diabetes Surgery

Laparoscopic Conventional Sleeve Gastrectomy

LCSG

1. General information

- General information
- Facts
- Typical patient

2. Before Surgery

- Indications for LCSG
- Advantages
- Disadvantages

3. The Surgery

- Indication for 2-step procedures
- What is a 2-stage operation?
- Technical description

4. After Hospitalisation

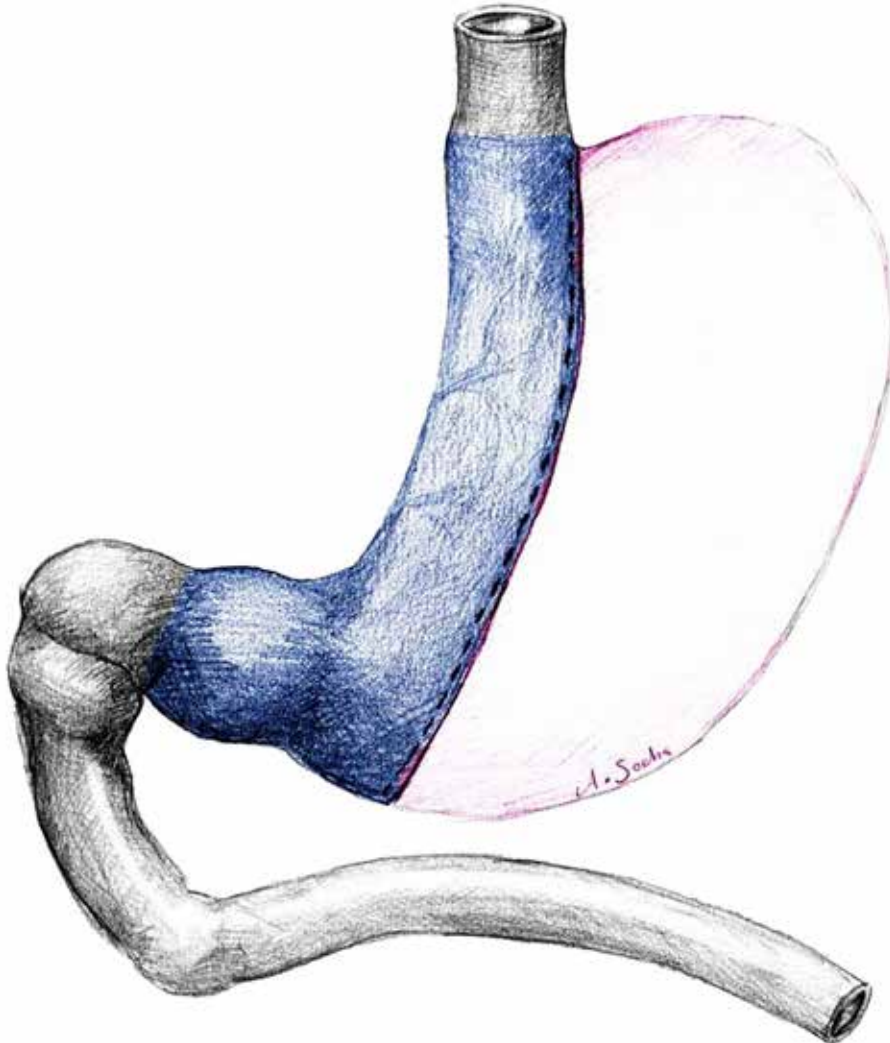
- Lab tests
- Supplementation
- Standard Medication after Operation
- Sport and physical activity
- Important tips





Diabetes Surgery

1. General information



General information

Conventional Sleeve Gastrectomy is a surgical procedure that can be performed by minimally invasive surgery. The procedure reduces the size of the stomach to about 10% of its original volume and results in a limited capacity of food intake. Patients feel full after eating a very small amount of food. The volume of the stomach after LCSG is between 80 and 120 ml. In Sleeve Gastrectomy, the left side of the stomach is surgically removed by cutting and stapling. This results in a new stomach which is roughly the size and shape of a 20 cm tube. This operation does not involve any "rerouting" or reconnecting of the intestines, it is a simpler operation than Gastric Bypass. Furthermore, the operation preserves the pylorus, the muscle that regulates the emptying process of the stomach. This acts as "nature's own functional gastric band" and allows food to remain in the stomach for a while, making the person feel full while the food trickles out. Relating to the fact that there is no rearrangement of the bowel, it also means that dumping and marginal ulcers are not a problem. The normal satiety mechanism is almost always regained by the operation.



Diabetes Surgery

1. General information

Facts

Duration of surgery

- between 45 minutes and one hour

Anaesthesia

- general anaesthesia

Hospitalisation

- 4-7 days

Typical patient

- patients with BMI over 50
- patients with BMI 35-50 with contraindications for bypass surgery or band implantation
- Well motivated patient (accepts nutritional and psychological criteria)
- no sweet eaters
- no binge (volume) eaters
- no stress eaters
- accepts follow up program
- no heartburn





Diabetes Surgery

2. Before Surgery

Indications for LCSG

- BMI mostly over 50
- BMI 35-50 with contraindications for bypass surgery or band implantation
- Well motivated (accepts nutritional and psychological criteria)
- no sweet eaters
- no binge (volume) eaters
- no stress eaters
- accepts follow up program
- no heartburn





Diabetes Surgery

2. Before Surgery

Advantages

- less complications
- does not require disconnecting or reconnecting of the intestines
- technically a simpler operation than Gastric Bypass (from a technical aspect)
- may be used as the first stage of a 2-stage operation.
- (see below)
- the operation eliminates the portion of stomach that also produces the hormone ghrelin, which stimulates hunger

Disadvantages

- possibility of weight gain after 3 years
- little is known about possible longterm complications of LSG
- possible dilatation of stomach pouch after a while, resulting in a secondary operation
- requires more dietary discipline than Gastric Bypass





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3. The Surgery

Indication for 2-step procedures

- BMI over 60 or
- BMI over 50 with high perioperative risks

What is a 2-stage operation?

Certain patients may have a body shape that makes their surgery more technically difficult. For example, patients with a BMI over 60 — particularly those who carry their weight in their belly area — may be at increased risk for bariatric surgery. If you fall into this category, you may benefit from 2-stage bariatric surgery. In the staged approach, a multi step operation like the Gastric Bypass or the Duodenal Switch is broken down into 2 simpler and safer operations. In the first stage, a Sleeve Gastrectomy is performed. This allows you to lose 80 to 100 pounds (ca. 40-50 kilos/ca. 6.5-8 stones) or more, which will make the second part of the operation substantially safer. The second stage operation is usually performed 8 to 12 months after the first. The "sleeve" stomach is converted into a formal gastric bypass. This will permit additional weight loss. Both stages of the surgery can be performed as key hole surgery, with the advantages of shorter recovery, shorter incisions, fewer incision related problems and less pain.





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3. The Surgery

Technical description

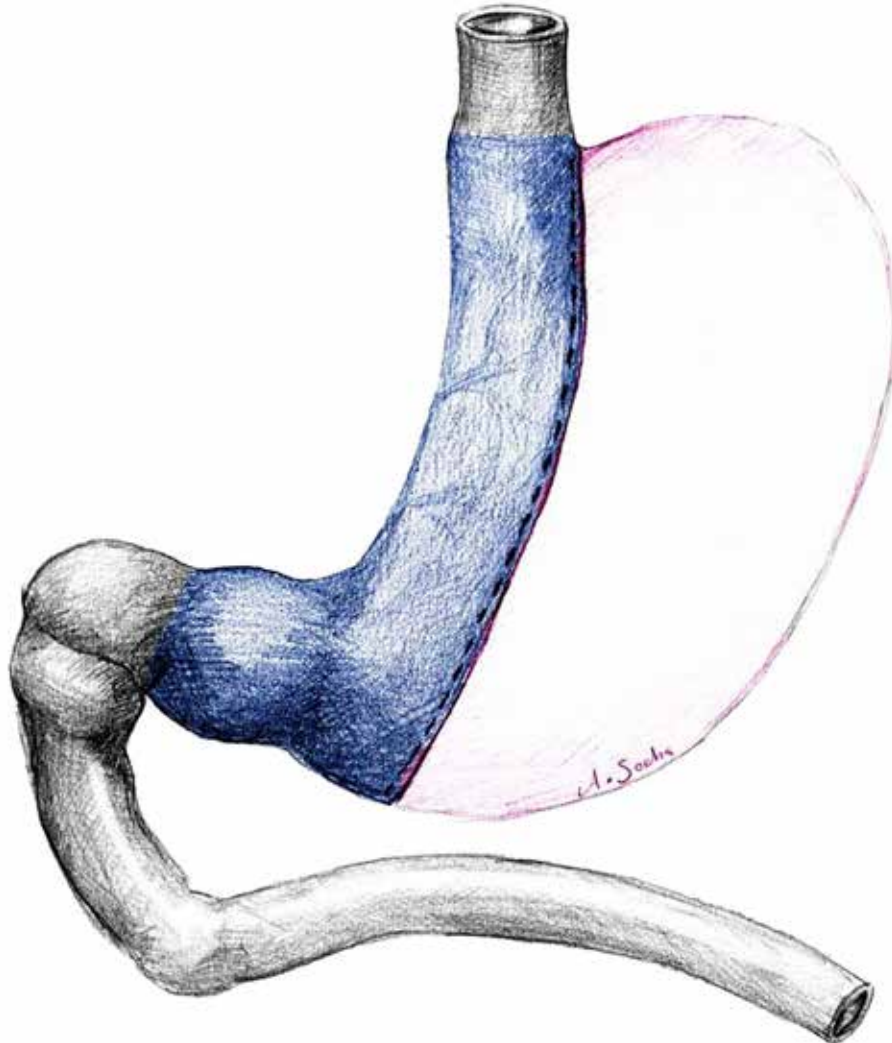
Laparoscopic Sleeve Gastrectomy reduces the size of the stomach through vertical surgical stapling. At the beginning, the large stomach curve is separated from the omentum majus. Afterwards the gastric tube (36 F) is placed into the stomach. This allows safe and exact formation of the sleeve. The resection is performed using staples (GIA, suturing and cutting machine). The resected part of stomach is removed from the abdominal cavity. The stomach volume after this operation is between 80 and 120 ml.





Diabetes Surgery

3. The Surgery



Sleeve Vol.: a. 80-120ml

Resected Stomach



Diabetes Surgery

4. After Hospitalization

Lab tests

- Morphology
 - Electrolytes in case of vomiting
 - Ferrum
 - Creatinin in case of vomiting or low drinking rate
 - Haemoglobin A1c by Diabetes mellitus
- * after three and six months, then annually

Supplementation

- Multivitamin + Minerals 1 tab. per day
- Biotin, Selenium, Vitamin B9 (B11), Zinc in case of hair problems

Standard Medication after Operation

PPI 20 mg, 0-0-1 (3 months)

Sport and physical activity

- 3 weeks after operation – rest
- more than 3 hours of physical activity per week – sport medical supervision and medical advice required

Important tips

A team of experts must approve the surgery before LSG operation.

Because we promote safe practice and your safety is of paramount importance to us and to you, the disadvantages and advantages of the different procedures will be carefully explained to you in detail in consultation.

In the preoperative period, you are provided with care from physicians, psychologists and nutritionists. This team of experts will give you accurate advice on all aspects of the postoperative period: What you can eat and drink, when and how often; what kind of exercises to perform; which individual therapy is necessary for specific issues related to your obesity.

You will have every opportunity to reduce your weight and improve your health. Just imagine the moment when you can wear size L clothes again. Discover your potential and improve your lifestyle. After surgery, you will normally lose approximately 35 kg in the first 6 months, provided that you follow the nutrition plan, take exercise therapy and participate in scheduled group discussions.

Only if you are willing to change yourself will you achieve your goal, i.e. healthy weight loss. You must be aware that this will not always be easy. However, with every pound lost, you will win more quality of life, health and a longer life expectancy.

