

## COST-BENEFIT ANALYSIS IN COMPLEX INCISIONAL HERNIAS

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### Aim

Analyze the cost of patients with complex incisional hernia when they are treated first with prehabilitation, concerning a public secondary level hospital

### Material & Methods

Retrospective, observational study of patients who underwent surgery to repair complex incisional hernia adding prehabilitation previous surgery with botulinum toxin(BT) in our hospital between 2022-2024. Variants: demographic, costs...

### Results

7 patients with complex incisional hernia were operated. Average age 66 years, most recently women. Reasons for practicing prehabilitation was incisional hernia W3 with lost of home. 6 patients use BT among abdominal oblique muscles in 3 points each side. The other patient was performed pneumoperitoneum before surgery plus BT. Only one used BT was performed by surgeon, the rest was done by interventional radiology. The patients underwent surgery at least 4 weeks later with complete closure of the defect. None recurrence. Complications: 2 wound infection, 1 hematoma. All patients shown improvement of abdominal wall flaps advancement.

Results are shown in Table 1.

In 7 patients with huge insicional hernia with prehabilitational procedure in two years it supposed a cost of 97.500,23€, and per patient a cost of 13.642,89€; comparing conventional incisional hernia treatment, with average price 5573,2€.

Table 1. Cost Results

Complex incisional hernia repair	
Prehabilitation with botullinum toxin	171€
Average hospital stay after prehabilitation: 1'2 days	1041,26€
Operating room : staff, material (endoclip, inventory material, electric scalpel, suction, drains, other surgicals materials) and pathological anatomy studies	6743€
Polipropilene Mesh 30x30	27,83€
Average hospital stay after scheduled complex incisional hernia surgery: 4 days	4466,8€
Outpatient care	600€
Average Medical consultation: 3 days	213€
CT scan (before and after surgery)	380€
<b>TOTAL COST OF PROCEDURE PER PATIENT</b>	<b>13.642,89 €</b>
<b>GLOBAL TOTAL COST OF PROCEDURE IN OUR SERIE</b>	<b>97.500,23 €</b>

### Conclusions

The use of botulinum toxin in the preoperative treatment of patients with loss of domain hernias seems a safe and effective therapeutic option.

Highlighting prices of different hospitals can change, in our region it supposed a high price comparing with other incisional hernias surgery without prehabilitation, although it was useful and needed to perform the surgery in that 7 cases