Evaluation of Chronic Postoperative Pain in Hernioplasty Tapp versus Lichtenstein by Residents

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Abstract
The incidence of inguinal hernia throughout life is variable but more prevalent in males. Today there is no superior technique for reducing chronic postoperative pain, which is the greatest morbidity afflicts patients. That is why we carried out a brief comparative analysis, where we evaluated the incidence of chronic pain between conventional versus laparoscopic rehearsal of hernia pathology.

Keywords: Chronic Postoperative Pain; Hernioplasty Tapp; Lichtenstein

Introduction
The appearance of inguinal hernia throughout life is 27% to 43% in men and 3–6% in women [1]. A standard repair technique for all inguinal hernias does not exist. The mesh repair is recommended as the first option, either by an open or laparoscopic procedure, provided that the surgeon has sufficient experience in the specific procedure [2]. The Lichtenstein technique is considered the reference standard to repair the open inguinal hernia, with recurrence rates of less than 1%. Morbidity is mainly related to chronic pain that can occur in up to 63% of patients and affects the quality of life by 5-10% [3]. The increase in inguinal hernioplasty Laparoscopic has aimed to reduce chronic pain rates without compromising recurrence rates.

There is a lot of speculation about the cause of the chronic disease after hernioplasty, and several risk factors have been identified, such as recurrence, patient age, cremaster muscle resection, surgeon’s experience, and the presence of preoperative pain. The influence, however, of different surgical techniques remains unclear [4].

The objective of this study is to confirm the hypothesis that the TAPP approach has a superior result that the Lichtenstein technique when comparing the quality of life of patients who underwent inguinal hernioplasties.

Methods
A randomized prospective study was carried out at the National Hospital of Clinics. Where two groups were made, G1: Hernioplasty Lichtenstein and G2: HERIOPLASTY TAPP. All procedures were performed by the major resident of general surgery.

Chronic pain was defined as the one that lasts for more than a month since surgery.

Results
A total of 40 patients, 22 men (60%) and 18 women (40%), were included in the study, 20 were subjected to Lichtenstein (50%) and 20 to Hernia Tapp repair (50%). The average age of the patients was 55.8 ± 11.02 years. The groups were similar in terms of demographic characteristics and also according to the NYHUS classification system (Table 1).
The incidence of postoperative pain after repairing a hernia differs of the different groin approaches and the presence or absence of a prosthetic mesh in long-term discomfort is not clear. Current studies on postoperative pain after repairing a hernia are difficult to compare, mostly, non-random retrospective designs and relatively short follow-ups.

Köckerling et al. [5-7]. It is known that laparoscopic surgical techniques are associated with a longer learning curve due to their greater complexity and skill required. For example, the learning curve in the TAPP technique for inguinal repair of a hernia may require between 50 and 100 procedures. Despite the largest learning curve in Tapp, mesh-free procedures also have a relevant and defined learning curve that, if it is not followed correctly, could result in high recurrence and/or chronic pain rates [8-10].

Conclusion

The incidence of postoperative pain after repairing a hernia differs with the type of surgical approach. Laparoscopic TAPP repair was less postoperative pain than the Lichtenstein technique but was not statistically significant.

Table 2: The Nyhus preoperative classification percentage in Liechtenstein and TAPP groups.

<table>
<thead>
<tr>
<th>Nyhus</th>
<th>LICHTENSTEIN</th>
<th>TAPP</th>
</tr>
</thead>
<tbody>
<tr>
<td>I</td>
<td>2 (20%)</td>
<td>1 (10%)</td>
</tr>
<tr>
<td>II</td>
<td>3 (30%)</td>
<td>4 (40%)</td>
</tr>
<tr>
<td>III A</td>
<td>4 (40%)</td>
<td>4 (40%)</td>
</tr>
<tr>
<td>III b</td>
<td>1 (10%)</td>
<td>1 (10%)</td>
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</tbody>
</table>

The present study showed that the TAPP approach made by residents with experience in laparoscopic surgery is safe and reduces early postoperative pain, with a notorious improvement in quality of life and reintegration into everyday activities earlier.

Declarations

The authors declare that they have no conflicts of interest, that the work has been approved by the ethics committee responsible in the workplace, and do not declare means of financing the work carried out. The article was sent with the consent of all authors for their evaluation and publication.

References