Introduction / Aim of Study

Overactive Bladder is characterized clinically by urgency that may be followed by daytime incontinence, frequency and holding maneuvers. Antimuscarinics (Oxybutynin) are frequently used treat OAB in children. However, there no studies that compare the effectiveness of oxybutynin compared with electrical stimulation. Therefore, the aim of this study was compare the effectiveness of two treatment methods (Oxibutynin vs TPES) for overactive bladder (OAB) in children by comparing intra and inter groups in a randomized clinical trial.

Materials and Methods

We evaluated 9 boys and 19 girls aged 6.4 ± 2.18, who were divided into Group A (Transcutaneous Parasacral Electrical Stimulation, TPES with placebo) and Group B (oxybutynin and sham – scapular electrotherapy). A total of 20 sessions, 20 minutes each, three times a week associated with syrup, a daily dose of 0.3 mg/kg/day every 12 hours were administered. The criteria used to assess the success rate were as follows: a) Rate of complete resolution of symptoms; b) Visual Analogue Scale (VAS) (0-10); c) DVSS; d) voiding diary records; e) ROME III; and f) description of the frequency of side effects in both groups.

Results

<table>
<thead>
<tr>
<th></th>
<th>Total 28 (100%)</th>
<th>TPES 13 (46%)</th>
<th>Oxybutynin 15 (54%)</th>
<th>Fisher</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete resolution</td>
<td>09 (32)</td>
<td>06 (46)</td>
<td>03 (20)</td>
<td></td>
</tr>
<tr>
<td>Partial resolution</td>
<td>17 (61)</td>
<td>07 (54)</td>
<td>10 (67)</td>
<td>0.204</td>
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<tr>
<td>No response</td>
<td>02 (7)</td>
<td>0</td>
<td>02 (13)</td>
<td></td>
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</table>

Group A showed no side effects and 58% of patients in Group B presented dry mouth (p = 0.002), 25% hyperemia (p = 0.096) and 50% hyperemia (p = 0.005), and 13.3% of patients discontinued treatment in Group B. All patients in Group A, 13 (100%), and 13 (87%) patients in Group B would recommend and repeat treatment.

Conclusion

TPES was effective was oxybutynin in the treatment of overactive bladder in children, but more effective against constipation, and no detectable side effects were found. Already oxybutynin was more effective in reducing voiding frequency. Satisfaction and adhesion to the two treatment methods were similar.

References

