

### **Abstract Submission Form**

#### Title

MULTICENTER MID-TERM EVALUATION OF THE PERISTEEN TRANSANAL IRRIGATION SYSTEM IN CHILDREN.

### **Authors**

C. Crétolle <sup>1</sup>, F. Hameury <sup>2</sup>, A. Ranke <sup>3</sup>, C. Louis-Borrione <sup>4</sup>, V. Forin <sup>5</sup>

### Institutional affiliations

- <sup>1</sup> Reference center for anorectal malformations and rare pelvic anomalies, Pediatric Surgery Department, Necker-Enfants Malades University Hospital, Assistance Publique-Hôpitaux de Paris, Paris Descartes University, Paris, France
- <sup>2</sup> Pediatric Surgery Department, Femme-Mère-Enfant University Hospital, Lyon, France
- <sup>3</sup> Pediatric Surgery Department, University Hospital, Nancy, France
- <sup>4</sup> Pediatric Surgery Department, University Hospital, Marseille La Timone, France
- <sup>5</sup> Pediatric Unit of Physical Medicine and Rehabilitation, University Hospital Trousseau, Assistance Publique-Hôpitaux de Paris, Pierre et Marie Curie University, France

# E-mail address of corresponding author

celia.cretolle@nck.aphp.fr

Abstract text: "Background/Purpose", "Methods", "Results", "Conclusions" (max. 300 words)

## Background/Purpose

Retrograde transanal irrigation (RTI) is an efficient treatment of fecal incontinence in children. Difficulties led to develop Malone antegrade enemas, but their main drawback is surgical procedure. Since 5 years, RTI returned to the therapeutic arsenal, thanks to the Peristeen Trans Anal Irrigation System (TAIS) (Coloplast®, Denmark). The main objective of this study was to evaluate observance for TAIS in a pediatric population. We also aimed to assess efficiency, success indicators and indications.

### Methods

This national observational study was conducted in five French pediatric centers from March to May 2012. All children and parents included from October 2009 to June 2011 received education for TAIS.

## Results

One hundred and forty nine patients, with a median age of 10.6 years (range 2-20 years), were included, treated for incontinence consequence of congenital or acquired neuropathic bowel (60%), anorectal malformations (25%) or Hirschsprung disease (6%). First irrigations were performed every day or every two days in 70 percent of cases.

TAIS procedure was still realized by 129 children with a median use duration of 14 months, at least every two days in 63% of cases. Technical difficulties were encountered in 60 percent of cases. Constipation and incontinence persisted respectively in 31 and 39% of cases. Ninety five percent considered this procedure efficient or very efficient. Sixty percent of children have removed the layers. Motivations to continue TAIS were wellness, comfort, pain resolution and independence.

Lack of motivation, poor tolerance and technical difficulties were the main reasons for discontinuation. Incomplete initial education and continuation of laxative treatments were failure indicators.

### Conclusion

This is the first study that demonstrates the good observance of TAIS among pediatric population. It confirms importance of initial education for success. These results led us to change our management and to expand indications. Long-term multicentric study is needed to confirm these good results.