










-  **Current Issue**
-  **Browse Issues**
-  **Search**
-  **About this Journal**
-  **Instruction to Authors**
-  **Online Submission**
-  **Subscription**
-  **Contact Us**
-  **RSS Feed**

Acta Medica Iranica  
2009;47(4) : 139-142

### Original Report

#### Internal Anal Sphincter and Late Clinical Outcome in Patients with High Type Anorectal Malformation

Ali Reza Mirshemirani\*, S. Sadeghian, and F. Roshan Zamir

Department of Pediatric Surgery, Pediatric Surgery Research Center, Mofid Children's Hospital, School of Medicine, Shaheed Beheshti University of Medical Sciences, Tehran Iran

#### Corresponding Author:

Ali Reza Mirshemirani

Department of Pediatric Surgery, Pediatric Surgery Research Center, Mofid Children's Hospital, School of Medicine, Shaheed Beheshti University of Medical Sciences, Tehran Iran, Tel: +98 21 22908181, Fax: +98 21 22908181, E-mail: almirshemirani@yahoo.com

Received: June 11,2007

Accept : November 12,2007

#### Abstract:

The purpose of this study is to investigate the age -related improvement of defecation function in high type anorectal malformation in relation to the assessment of the internal anal sphincter. The function of defecation was studied every 5 years up to 15 years postoperatively according to the Japanese scoring system in our hospital in 50 patients operated for high type (recto-urethral fistula) imperforate anus with posterior sagittal anorectoplasty (PSARP) procedure in 25 patients, and 25patients with endorectal pull-through (ERPT). The internal anal sphincter was assessed by anorectal manometry and histology, and the results were analyzed with the clinical outcomes. The defecation scores of the PSARP cases exceeded those of ERPT cases at all age groups, the averaged total score were 7.0 in the PSARP cases vs. 4.6 for ERPT cases at 5 years old, 7.5 vs. 5.2 at 10 years old, and 8.0 vs. 6.7 at 15 years old. The anorectal reflex was seen in 17 of 25 (68%) PSARP cases examined, whereas seen in 5 (20%) of ERPT cases examined. Histologically, the well-developed and thickened internal circular muscle at the rectal end was found only in 40% of the cases, whereas discontinuation and hypoplasia of the muscle were seen in most of the cases examined. The present results indicate that the internal sphincter muscle at the rectal end may be histologically maldeveloped in high type anorectal malformations; however, they can potentially develop after transplanted and contribute to the improvement of passive continence in the late post-operative period.

#### Keywords:

Internal anal sphincter . high type anorectal malformation . PSARP

TUMS ID: 12766

Full Text HTML  Full Text PDF  147 kB

top ▲

[Home](#) - [About](#) - [Contact Us](#)

TUMS E. Journals 2004-2009  
Central Library & Documents Center  
Tehran University of Medical Sciences

Best view with Internet Explorer 6 or Later at 1024\*768 Resolutions