

## Introduction

Chronic rhinosinusitis (CRS) is characterized by mucosal inflammation affecting both the nasal cavity and paranasal sinuses; its causes are potentially numerous, disparate, and frequently overlapping (**Marple et al., 2009**).

Chronic rhinosinusitis (CRS) is a multifactorial disease. Factors contributing can be mucociliary impairment, bacterial infection, allergy, swelling of the mucosa for another reason or anatomical variations in the nasal cavity. The ostiomeatal complex, a functional unit of the paranasal sinuses plays a key role in the pathogenesis of rhinosinusitis (**Simmen 2008**).

CT of the paranasal sinuses should be considered a mandatory investigation for assessing the presence or absence of pathologic conditions of the paranasal sinuses (**Stammerberger and Hawke, 1993**). Computed tomography (CT) is the gold standard for investigation of inflammatory sinus disease (**Hagtvedt et al., 2003**).

Maxillary accessory ostium is one of the anatomical variations that may play a role in the development of chronic maxillary sinusitis. Although some authors claim that accessory ostia develop following acute maxillary sinusitis, it is not clear whether they are congenital or acquired (**Genc et al., 2008**).

Defects in the fontanelle region of the lateral nasal wall have been described as "accessory" or "secondary" ostia (**Mladina et al., 2009**).

Recirculation of nasal mucus occurs when secretions that have been transported out of the natural maxillary ostium return to the sinus via a surgically created or accessory ostium. Recirculation increases the risk of

persistent sinus infection (**Gutman et al., 2003**). Recirculation of mucus between adjacent openings into the maxillary antrum is a relatively common cause of persistent sinusitis in either the pre- or postsurgical patient. The condition is easily diagnosed with the nasal endoscope (**Kane 2007**).

Nasal endoscopy has multiple uses in both the medical and surgical management of chronic rhinosinusitis (CRS). Nasal endoscopy is the standard for tissue sampling, evaluation of the mucosa and identifying structural alterations (**Kuhn 2004**).