

INTRODUCTION AND AIM OF THE WORK

The orbit forms only a small part of the skull but pathology of this region assumes critical importance as it affects the vision. The evaluation of orbital pathology has progressed rapidly with the development and more widespread availability of computer assisted imaging (**Michael et al., 2003**).

The majority of the diseases of the globe are assessed by ophthalmologic methods, with the ultrasound technique being ideally suited in an ophthalmologic setting. However, in some cases patient-related factors may exert a negative effect on the outcome of the investigation, and magnetic resonance imaging (MRI) may be indicated in children or non-cooperative patients (**Bilaniuk, 1999**).

Imaging must be directed by the clinical history and physical examination, and should include orthogonal views of the globe and adjacent regions of the skull, face and sinuses, and intracranial structures. (**Michael et al., 2003**).

Imaging plays an important role in the management of global lesions. Prior to the introduction of magnetic resonance imaging, plain film was used to assess the bony changes and angiography also was used to assess the vascularity of some lesions (**Bilaniuk, 1999**).

Magnetic resonance imaging (MRI) has revolutionized diagnostic imaging of the globe and its component. With its superior soft tissue contrast and ability to image in multiple planes, MRI provides excellent rendering of the global anatomy (**Jon et al., 2003**).

MRI is the method of choice, in particular when leukokoria might prevent the fundoscopic evaluation of a process. Yet, even under normal conditions, the high anatomical resolution provided by the most advanced MRI technology does not allow differentiation of the three primary layers of the globe: the sclera, uvea, and retina. Nevertheless, due to the fact that some ocular diseases are accompanied by detachment and/or effusion, the different primarily potential spaces may be visualized (**Mafee et al., 2005**).

The aim of the work is to lighten up the role of magnetic resonance imaging in differentiation and possible characterization of the global lesions.