PREOPERATIVE INFORMATION FOR THE CATARACT PATIENT

Patient satisfaction is an important clinical outcome. Anxiety surrounding surgical procedures often interferes even with good physiological outcomes. Pager studied 141 patients undergoing day-stay cataract surgery. In this study a simple inexpensive video tape showing patients what to expect from their cataract surgery resulted in a significant increase in patient understanding of the procedure and satisfaction with it. There was also a decrease in anxiety associated with the procedure. See p 10

CAN VISUAL FIELDS BE EXPANDED IN THE ADULT HEMIANOPE?

Visual restitution training is personal computer software designed for patients with visual field defects caused by optic nerve disease and post-chiasmal brain lesions. This therapy performs binocular visual stimulation on a computer monitor within a transition zone between the intact visual field area and absolute field defect. Previous studies have suggested that this may be effective in expanding the visual field in patients. However, Reinhard and co-workers studied 17 patients with stable homonymous visual field defects before and after 6 months of visual restitution training. They investigated these patients with a specialised microperimetric method using a scanning laser ophthalmoscope. Fixation was controlled by the scanning laser ophthalmoscope and fundus monitoring. No effect was demonstrated from this training. In one patient a slight improvement along the horizontal meridian was found in one eye. The authors suggest that previous reports documenting improved visual fields may be the result of poor visual fixation in those studies. See p 30, and Editorials pp 1 and 2

THE PROBLEM OF THE OPTIC NERVE GREY CRESCENT

In 1980 Shields described a pigmented crescent of the optic nerve, which appears to be located within the substance of the optic nerve head, and termed this the grey crescent. This needs to be recognised as a physiological variant in order to avoid falsely labelling eyes as having glaucomatous optic nerve change. In a study from Reykjavik, Jonsson and co-workers demonstrated the prevalence of grey crescent to be 22%. It was more commonly found in women than in men and was most often located temporally. It was usually found in hyperopic eyes. The prevalence of the grey crescent was inversely related to the prevalence of peripapillary atrophy. The authors suggest that the grey crescent is common in white individuals over 50 years of age. See p 36 and Editorial p3

NEW TREATMENT FOR DRY EYE SYNDROME

Dry eye syndrome is among the most common and difficult problems faced by ophthalmologists. Up to 20% of adults over 45 years of age complain of typical symptoms related to it. Therapy for the problem is often not satisfactory. Horwath-Winter and co-workers describe the use of iodide iontophoresis for dry eye syndrome. Antioxidants such as iodine have shown a strong effect in preventing oxidative damage to constituents of the anterior portion of the eye. The authors treated 16 patients in this study. A reduction of subjective symptoms, frequency of artificial tear substitute application, and an improvement in tear film and ocular surface factors could be observed in patients treated with iodine iontophoresis as well as those with iodine application directly to the cornea. The authors suggest that iodine iontophoresis is safe and well tolerated and effective in treating subjective and objective findings of the dry eye syndrome. See p 40

CATARACT SURGERY PREVENTS FALLS AMONG THE ELDERLY

Falls among elderly people are common and often lead to serious and even fatal outcomes. One third of the population over 65 years of age has a fall each year. Although the increase in falls that occurs in the elderly is multifactorial, decreased visual function may play a part. Harwood and co-workers studied a group of women over 70 years of age with cataract. Following first eye cataract surgery there was a reduction in the number of recurrent falls and associated fractures directly related to the improved visual function associated with cataract surgery. The authors conclude that first eye cataract surgery clearly improves quality of life and reduces falls among a subgroup of elderly women. See p 53

NEURAL PROGENITOR CELLS IN ADULT HUMAN RETINAS

Stem cells have the capacity to self renew, proliferate, and have no limitation on potential differentiation. Progenitor cells can divide but have restrictive differentiation potential. In the adult central nervous system neural progenitor cells have been identified. Mayer and co-workers studied adult human postmortem retinal explants and cell suspensions and were able to demonstrate that the adult human retina contains neural progenitor cells which may have the potential to replace neurons and photoreceptors. This has enormous implications for the pathogenesis and treatment of retinal disorders, degenerations including glaucoma, and those disorders associated with retinal scarring. See p 102