



Research Article

VISUAL PROGNOSIS AND REFRACTIVE EVOLUTION AFTER CONGENITAL CATARACT SURGERY WITH PRIMARY IMPLANTATION: STUDY OF A SERIES OF 94 CASES

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ABSTRACT

Congenital cataract is the most common cause of preventable blindness in children. The aim of this study is to evaluate the refractive and functional prognosis of children operated for congenital cataract with implantation. This is a retrospective study of 94 children, including 73 bilateral cataracts, 21 unilateral operated between 2009 and 2013. The refraction was measured at 1 month, 3 months, 6 months, 1 year, 2 years, 3 years and / or 4 years postoperatively. The best corrected visual acuity, as well as the incidence of postoperative complications were analyzed. The average age of surgery was 25 months with an average follow-up of 3.17 years. The complications found were inflammation, secondary proliferation, and glaucoma. Final corrected mean visual acuity (VA) was 5.75 / 10th for bilateral forms, and 4.16 / 10th for unilateral. The poor prognostic factors found were the late age of surgery, the density of cataracts and the occurrence of complications. The incidence of postoperative complications was significantly higher in children operated at a young age. The factors of poor visual prognosis in children operated for congenital cataract with implantation, are represented by the unilateral nature of the cataract, the late age of the surgery, the density of the cataract and the occurrence of postoperative complications.

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INTRODUCTION

Congenital cataract is the most common cause of preventable blindness in children. The management of congenital cataract has made considerable progress in recent years with improved visual fate. This is explained by the combination of improved management of amblyopia occurring in parallel with advances in surgical techniques, instrumentation and materials. The aim of this study is to evaluate the refractive and functional prognosis of children operated for congenital cataract with implantation.

Patient and methods

This is a retrospective study of 94 children, including 73 bilateral cataracts, 21 unilateral operated between 2009 and 2013. The refraction was measured at 1 month, 3 months, 6 months, 1 year, 2 years, 3 years and / or 4 years postoperatively. The best corrected visual acuity, as well as the incidence of postoperative complications were analyzed.

RESULTS

The average age of surgery was 25 months with an average follow-up of 3.17 years.

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The complications found were inflammation, secondary proliferation, and glaucoma. The final corrected mean visual acuity (AV) was 5.75 / 10th for bilateral forms, and 4.16 / 10th for unilateral forms. The poor prognostic factors found were the late age of surgery, the density of the cataract and the occurrence of complications. The incidence of postoperative complications was significantly higher in children operated at a young age. The factors of poor visual prognosis in children operated for congenital cataract with implantation, are represented by the unilateral nature of the cataract, the late age of the surgery, the density of the cataract and the occurrence of postoperative complications.

DISCUSSION

The management of this pathology continues to challenge ophthalmic pediatricians, despite the progress made in its diagnostic and therapeutic approach; because predicting the axial growth of an operated eye and the refractive changes that accompany it is a real obstacle. Early surgical management combined with a vigorous rehabilitation of amblyopia are the main pillars of a good functional prognosis. The refractive results of our study show that posterior chamber primary implantation into congenital cataracts in children is feasible and beneficial in the medium term. On the other hand our functional results are relatively less good compared to other studies because of several factors: The advanced age of our

patients compared to other series. The higher incidence of postoperative complication including opacification of the visual axis, inflammation, hypertonia.

CONCLUSION

The management of congenital cataract has made considerable progress with improvement in visual outcome. This is explained by the combination of improved management of amblyopia occurring in parallel with advances in surgical techniques, instrumentation and materials. Compliance with occlusion treatment is the factor most strongly associated with a good visual outcome: to support, encourage, comfort, explain, require, these are the other tasks of the therapist that are no less important than the surgical procedure.

Declaration of interest

The authors declare that they have no conflict of interest in relation to this article.

Contributions of the authors

All the authors participated in the realization of the article. All authors have read and approved the final version of the manuscript.

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