ISSN: 2573-9573

Case Report

Journal of Ophthalmology & Clinical Research

Eales Disease Debut in Childhood

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Submitted: 05 July 2021; **Accepted:** 12 July 2021; **Published:** 05 Aug 2021

Citation: *Guillermo Raúl Vera Duarte, Castillo Verónica and Cibils Diógenes (2021) Eales Disease Debut in Childhood. J Ophthalmol Clin Res 5(3): 101-102.*

Abstract

Introduction: *Eales disease is considered a peripheral retinal vascular disease characterized by inflammation (vasculitis), ischemia, vascular occlusion, and neovascularization. Its etiology is not yet defined, it generally affects young men in the second decade of life.*

Case: *Male patient, 10 years old of age with a red eye with blurred right eye vision of 1 month of evolution that worsened 4 days before coming to the service, accompanied by photophobia and eye pain.*

Discussion: *Eales disease affect to more often young males, whose main characteristic peripheral phlebitis which can cause retinal ischemia and neovascularization. Although its etiopathogenesis is unknown. Some cases in the literature that relate it to a type IV hypersensitivity reaction to M. tuberculosis's antigens The treatment of choice was systemic and topical corticosteroids, with a very good clinical response and periodic follow-up of the patient, with warning signs.*

Keywords: Corticosteroids, Eales disease, Idiopathic, Tuberculosis, Vasculitis,

Introduction

Retinal vasculitis is characterized by being inflammatory processes that affect the blood vessels in the fundus, giving them a whitish appearance. Most often they are manifestations of a systemic disease [1]. However, some occur without underlying etiology and in these cases, they are considered idiopathic retinal vasculitis.

Eales disease is considered a peripheral retinal vascular disease characterized by inflammation (vasculitis), ischemia, vascular occlusion, and neovascularization [2]. Its etiology is not yet defined, it generally affects young men in the second decade of life [3]. In a study of Biwas, et al. S and noted a relationship man / woman of 20: 1 with an average age of onset of 29.9 years with a range of 11 to 59 years [4]. The diagnosis is made by exclusion and the treatment depends on the stage of the disease, it basically consists of the medical treatment of the inflammation with corticosteroids, panphotocagulation and / or anti-angiogenic drugs in the case of retinal ischemia or neovascularization. Biwas, et al. observed that the timely use of oral corticosteroids during active inflammation and laser use of areas with capillary ischemia had a statistically significant beneficial impact on visual outcomes during a 10-year follow-up period [4]. Due to the possible link between Eales disease and tuberculosis by a mechanism of hypersensitivity to tuberculoproteins; in suspected patients, antituberculous treatment is considered [3].

Clinical Case

Male patient, 10 years old of age. He went to the Ophthalmology emergency department due to a red eye with blurred right eye vision of 1 month of evolution that worsened 4 days before coming to the service, accompanied by photophobia and eye pain.

Ophthalmological Exam

Denies underlying pathology. He denies surgery or previous ocular trauma, the Visual acuity of the Right Eye of Hand Motion that does not improve with pinhole. OI: 0.2 without correction, which improved with better visual acuity 0.4 (Final Refractive OI - 2.75 -3.00 180°).

Intraocular pressure of the OD of 8 mmHg and the left eye 10 mmHg.

Biomicroscopy of the Right eye: Conjunctiva congestive, fine

PKs, Reaction anterior chamber 4 crosses, crystalline pigments.
Left eye: no particularities.

Fundoscopy: Right eye vitreous turbidity, particularly in difficult peripapillary area displaying the optic nerve as the rest of the retina.
Left eye: saw clear, papilla with temporal peripapillary atrophy, exudation of retinal cases (vasculitis), intraretinal hemorrhages in the lower nasal arch.

Right eye"s Echography: Multiple vitreous condensations compatible with inflammatory processes. Choroidal thickening is impressive. Rest of the exam within normal limits.

At the time of diagnosis, the condition was labeled as a Panuveitis of etiology to be determined in RE and an occlusion of the nasal retinal vein + nasal vasculitis in left eye. The patient is hospitalized for better management and diagnosis.

Of all the examinations and tests requested from the patient (Toxoplasmosis, Toxocariasis, CMV, EBV, HSV 1 and 2, HIV, VDRL, PPD , Bartonella and ANA Antibodies, nDNAds, ANCAc, ANCAp). No positive results were obtained, including the tuberculin test (PPD -). Chest X-ray without alterations.

The topical treatment started was Difluprednate 0.05% 1 drop every 4 hours in both eyes (OA) and Atropine 1% 1 drop every 8 hours (OD).

The patient, under indication of pediatric rheumatology, received a total of 5 boluses of M ethylprednisolone 1mg / kp / day, observing improvement from the start of systemic treatment.

After the second bolus methylprednisolone was documented improvement of the visual acuity counting fingers at 30 cm and the fourth day 0,2 decreasing as the vitreous turbidity.

Due to the evolution of the clinical picture and the patient's response to systemic steroids, the probable diagnosis of Eales disease was reached based on the fact that we were facing a periphlebitis not associated with systemic disease, the patient is being monitored in the department of retina, pending for economic reasons an Angiofluoresceinography (AFG).

Discussion

Eales disease affect to more often young males, whose main characteristic peripheral phlebitis which can cause retinal ischemia and neovascularization. Although its etiopathogenesis is unknown, there are numerous cases in the literature that relate it to a type IV hypersensitivity reaction to M. tuberculosiss antigens [5]. It manifests as an occlusive periphlebitis that affects multiple quadrants, beginning before the equator and progressing later. Initially, it can present as active retinal periphlebitis with exudates around the veins, associated with retinal hemorrhages and retinal hemorrhagic infarcts [6]. AFG is useful for the diagnosis of active vasculitis, finding characteristic findings such as diffuse contrast leaks, areas of ischemia, and neovessels, sometimes revealing more extensive vasculitis than what the fundus examination suggests [7].

The diagnosis of ocular tuberculosis depends to a large extent on the symptoms, since most do not have systemic tuberculosis symptoms and there are difficulties in obtaining microbiological evidence. D and facing the etiology in recent years is advirtien do a strong association between Mantoux positive (87% of patients in a series s) and Enfermedad Eales [8]. However, it has not been possible to determine that both conditions are actually associated. Likewise, an increase in immune complexes has been seen in these patients, which suggests an autoimmune origin. Treatment consists of using antituberculous therapy and oral prednisone at a dose of 1 mg / kg until there is clinical improvement, being effective in the resolution of inflammation, without recurrences after finishing treatment, given the good response to corticosteroids and the result negative Mantoux test was expected TB therapy [9]. In reviewed series from India, they recommend a treatment based on systemic corticosteroids and antituberculous treatment, if active tuberculosis is observed [10]. In our case, the treatment of choice was systemic and topical corticosteroids, with a very good clinical response and periodic follow-up of the patient, with warning signs.

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