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Case Report

Idiopathic Haemolacria in a 9 Year Old Girl

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Abstract

Haemolacria or bloody tears is a rare clinical condition caused by various ocular and systemic conditions; some cases may be drug-induced and some are idiopathic. We are reporting a case admitted with recurrent bilateral idiopathic haemolacria. A 9-year old girl was admitted in our hospital with complaints of recurrent spontaneous bloody tears from both eyes for 1 month. There were no other bleeding manifestations. Blood stained discharge from punctum was not observed during compression of either nasolacrimal duct. Psychiatric assessment and ENT examination were normal. Further evaluations for underlying causes were unremarkable. There was no abnormality on the ophthalmological and radiological investigations. The patient was diagnosed as a case of idiopathic haemolacria. Patients presenting with complaints of bloody tears should be evaluated with a detailed history focusing on etiologic factors, ocular examination, and nasal and paranasal examination.

Key words: Haemolacria, bloody tears.

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Introduction

Haemolacria is a very rare clinical condition. In the literature, it is also known as "bloody tears". Several ocular and systemic diseases, as well as pharmacological and idiopathic causes, may lead to haemolacria.[1]In the literature, lacrimal sac infection, lacrimal sac tumours, bacterial conjunctivitis, conjunctival capillary haemangioma, conjunctival telangiectasia, noseand paranasal sinus tumours, hereditary haemorrhagic telangiectasia, Henoch-Schönleinpurpura, retrograde nosebleeds and nasolacrimal endometriosis have been reported as causes of haemolacria.[2-4]. Additionally, idiopathic haemolacria has been reported.[3,5,6] We report this case to represent how to approach a patient presenting with haemolacria considering the literature.

Case Report

Anine year old, girl 2nd issue of non-consanguineous parents of low socio economic condition hailing from Kushtia admitted to Rajshahi medical college hospital with the complaints of recurrent painless and spontaneous bleeding from both eyes for 1 month. The bleeding used to last for 4 to 5 minutes and stopped spontaneously. She had no concurrent history of bleeding from any other site. She did not have any visual problem. There was no history of using contact lens, ocular prosthesis or dropping foreign body in eye. There was no evidence in her medical history to suggest coagulopathy, bleeding diathesis or other haematological abnormalities. She did not have menarche yet. On general examination she was not anaemic, BCG mark present, heart rate-82 beats/min, respiratory rate-18 breaths/min, blood

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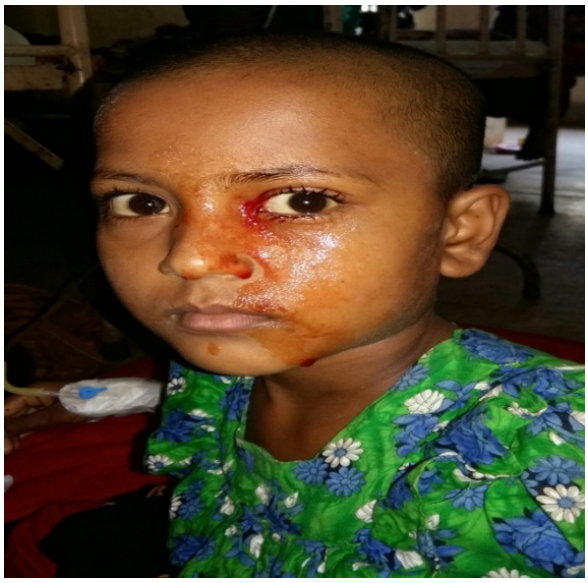
pressure: 110/70 mm of Hg, temperature: 98^0 F, height and weight normal for age. There were no petechiae, purpura or echymosis. There was no subcutaneous mass superior to medial canthus and no proptosis. Visual acuity was 6/6, visual field was normal and fundoscopy revealed no abnormality. Examination of haemopoietic system, nervous system and other systems were normal. She was referred to ophthalmologist, psychiatrist and ENT specialist for further evaluation and no abnormality was detected. . Investigations showed: total white blood cell count 9700/cmm, differential count: neutrophil 48%, lymphocyte 39%, eosinophil 10%. Hemoglobin 11 g/dl, platelet-451000/cmm and ESR 11 mm in 1^{st} hour. Peripheral blood film revealed RBCs with hypochromia, anisopoikilocytosis including macrocyte and microcyte; WBCs were mature with increased distribution of Eosinophil; Platelet-adequate. Coagulation Profile: bleeding time-2min 30 Sec, clotting time - 5 Min 30 Sec, APTT - 29 sec(control 32 sec), USG of both eyes- normal, CT Scan Of Brain-Normal, MRI Of Orbit- normal. Upon exclusion of possible etiological factors, she was diagnosed as a case of idiopathic haemolacria. During hospital stay she had two episodes of haemolacria which resolved spontaneously. Parents were counselled about the benign nature of disease and discharged at home with advice to come back for regular follow up.



Discussion

Haemolacria can be frightening to patients and parents and challenging to physicians when no etiological factor is identified. The idiopathic haemolacria can be diagnosed only after exclusion of ocular, systemic, pharmacological and psychological causes. In a case report by Pizzamiglio-Martin et al.[7], a 45-year old patient with haemolacria was diagnosed with hereditary hemorrhagic telangiectasia after upper and lower sub tarsal telangiectasia was observed on eye slit-lamp examination. Other aetiologies of haemolacria include conjunctival capillary haemangioma and bacterial infection.[7] In our case, ophthalmic examination normal fundi and vision. No vascular pathology was found on inner surface of the bulbar conjunctiva and palpebral conjunctiva. Haemolacria may also occur in patients with the lacrimal sac tumours, lacrimal sac infections, nasal and paranasal sinus tumours, and retrograde epistaxis.[3]Our patient's nasolacrimal duct was clear and ENT examination was normal. Pathology was not detected on MRI orbit. A study done by Mukkamalaet al.[2]reported that haemolacria may be the evidence of scleral buckle infections. Our patient had no ocular surgery history and normal ophthalmologic examination findings. Türkçüoğluet al.[4] presented a case of a 13 year old girl with haemolacria. The patient had bleeding of left eye lower punctum simultaneous with cyclic menstrual bleeding. She had no other ocular pathology or symptoms. Nasolacrimal duct gradient-echo MRI was performed during the patient's menstrual cycle, and hypointense areas were observed with acute bleeding. Biopsy was not performed. They described this case as "presumed nasolacrimal endometriosis". Our patient had not started menstruation yet hence possibility of endometriosis was ruled out. Uncontrolled hypertension, chronic renal failure and aggressive anticoagulant therapy may be a systemic cause of haemolacria.[8] Arterial blood pressure and biochemical tests in our patient were normal. She had no history of drug use. Ahluwaliaet al[9] reported case of haemolacria in a 15 year old female where episodes of blood tearing was only under stress. Our patient had no such history and

psychiatric assessment was normal. Hasner[10] reported two cases with bloody tearing: one, in which haemorrhage occurred from a conjunctival polyp in a man, and the other, which involved a 13-year-old girl with daily haemorrhage from the eyes. Their cases had no pathologic abnormalities. Hoet al.[3]reported 4 cases of idiopathic haemolacria after normal conjunctival biopsy, imaging studies of nasolacrimal system irrigation, blood and coagulation profile, and serum hormone levels. Ozcanet al.[5] presented a patient with haemolacria accompanied by epistaxis of unknown etiology. Kırboğaet al.[1] reported a 14 year old girl presented with idiopathic haemolacria. Beyazyildiz et al.[1] also reported another case of idiopathic bilateral bloody tears. In both cases no aetiology were identified. Our patient's physical examination, laboratory investigations and imaging did not reveal any pathology. Therefore, our patient was diagnosed as a case of idiopathic haemolacria.

Conclusion

Systemic evaluation of etiological factors and detailed ocular and ENT examinations must be performed on patients presenting with a complaint of bloody tears. If the aetiology of haemolacria cannot be identified by physical examination and tests, patients may be diagnosed with idiopathic haemolacria and should be monitored at regular intervals.

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References

1. Kirboğa K,Palali M Dağistan H. Bilateral Idiopathic Haemolacria in a 14 Years Old Girl. Glo-Kat 2016;11:61-63)
2. Mukkamala K, Gentile RC, Rao L, et al. Recurrent hemolacria; a sign of scleral buckle infection. Retina 2010; 30:1250-3.
3. Ho VH, Wilson MW, Linder JS, et al. Bloody tears of unknown cause: case series and review of the literatüre. Ophthal.PlastReconstr Surg. 2004; 20:442-7.
4. Turkcoglu. I, Turkcoglu P, Kurt J, et al. Presumed nasolacrimal endometriosis.OphthalPlastReconstr Surg. 2008; 24:47-8.
5. Ozcan KM, Ozdaş T, Baran H, et al. Hemolacria: case report. Int J PediatrOtorhinolaryngol. 2013;77:137-8
6. Beyazyildiz E, Özdamar Y, Beyazyildiz O, et al. Idiopathic bilateralbloody tearing. Case Rep Ophthalmol Med. 2015; 2015:692382.
7. Pizzamiglio-Martin C, Gil-Cazorla R, Guzman-Glazquez J.Ophthalmologic diagnosis of hereditary haemorrhagic telangiectasia or Rendu-Osler-Weber disease. Arch. Soc. Esp. Oftalmol.2008; 83:381-4.
8. Dillivan KM. Hemolacria in a patient with severe systemic diseases.Optom Vis Sci. 2013; 90:161-6.
9. Ahluwalia BK, Khurana AK and Sood, S., Bloodytears (haemolacria).Indian J. Ophthalmol. 1987; 35: 41–43
10. Hasner, "Bloody lacrimation,"Allgemeine Wiener MedizinischeZeitung, vol. 4, p. 390, 1859.
11. Beyazyildiz E, Özdamar Y, Beyazyildiz O, et al. Idiopathic bilateral bloody tearing. Case Rep Ophthalmol Med. 2015; 2015:692382.

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