Letter to Editor

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Ocular manifestations of sickle cell disease

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Dear Editor,

The publication on "Ocular manifestations of sickle cell disease (SCD)" by Shukla *et al*. is very interesting.[1] Shukla *et al*. concluded that "our study documents the prevalence of refractive errors along with some retinal changes in Indian SCD patients.[1]" In fact, the ocular manifestation in SCD is possible but less little mentioned.[2] In addition to refractive error, the retinal problems are also observable in SCD patients.[2] An important problem within the present Indian report is the lack off or control of confounding factors. Several factors, including to environmental factors that might result in an ocular problem (such as light, drug and toxic substance exposure) are not excluded. Also, the comorbidity complex between SCD and other common hemoglobin disorder such as thalassemia is possible and The ocular problems in those cases are very complex.[2] If there is a concurrence of hemoglobin disorders, the ocular problems can be the result from each hemoglobin disorder. For thalassemia, the refractive error is also an important problem.[3] Hence, a conclusion based on a study on genetic background without complete genetic assessment, on all possible relating genetic defects and polymorphisms that can affect the ocular manifestations, might not be acceptable. In additional to variable number tandem repeat polymorphism, there are also other possible genetic polymorphisms (such as the polymorphisms of DHCR7, CYP2R1, GC and CYP24A1 that are proved for a relationship to refractive error) with clinical relationship to ocular problems.[4,5]

Ethical approval

The study was conducted in accordance with the Declaration of Helsinki and was approved by the local ethics committee of the institute. Informed written consent was obtained from all patients prior to their enrollment in this study.

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Conflicts of interest

The authors declare that there are no conflicts of interests of this paper.

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