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Molecular Genetics of Eye Development and Myopia

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Message from the Guest Editors

Myopia (nearsightedness) is a refractive error of \leq -0.50 dioptres [D] in which rays of light entering the eye are focused in front of the retina when ocular accommodation is relaxed. This is usually caused by the axial elongation of the eyeball; however, it can also be caused by an overly curved cornea and/or a lens with increased optical power. High myopia is a more severe form with a refractive error of \leq -6.0 D that can lead to ocular complications in the posterior segment of the eye, including myopic maculopathy, myopic macular degeneration, posterior staphyloma, and optic neuropathy, which can ultimately culminate in blindness.

So far, a number of myopia *loci*, candidate genes and sequence variants have been associated with myopia. The purpose of this Special Issue is to summarize current knowledge and highlight innovative findings regarding myopia development, thus identifying the molecular mechanisms underlying its pathogenesis and enhancing our understanding of this disorder.

We welcome the submission of original research and review articles corresponding to the molecular and cellular events responsible for myopia development.













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