

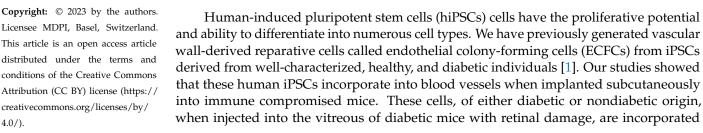


Abstract Human Pluripotent Stem Cells from Diabetic and Nondiabetics Improve Retinal Pathology in Diabetic Mice⁺

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into retinal blood vessels and restore perfusion to ischemic areas. Our studies also show that iPSCs from diabetic donors are able to function in vivo and that reprogramed diabetic iPSC cells behave similarly to nondiabetic hiPSCs. The iPSC-derived ECFCs improved the electroretinograms of the diabetic mice and their ocular kinetic responses. These studies support the notion that iPSCs of diabetic and nondiabetic origin, when differentiated into ECFCs, can correct vascular dysfunction, which in turn improves key functions of the neural retina.

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