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Cover picture: The isolated, living human retina *in vitro*. The eye was received 60 minutes post-mortem from a tissue donor; the retina was dissected and placed in oxygenated culture medium, where it remained viable for many hours. Blood vessels radiate from the optic disc; the fovea, the region of highest visual acuity, is surrounded by the yellow pigmented macula lutea. The retina was maintained in a chamber on the stage of a light microscope; ganglion cells were vitally stained, and their detailed morphology was revealed for the first time by intracellular injection of horseradish peroxidase. Photograph by Brad Clifton, Department of Ophthalmology, University of Washington. See Dacey, pp. 5334–5355.