



**University of Southern California
Keck School of Medicine**

Biography

Mark S. Humayun, M.D., Ph.D.
USC / Doheny Eye Institute
Professor of Ophthalmology & Biomedical Engineering & Cell Neurobiology
Associate Director of Research



Mark S. Humayun, M.D., Ph.D., received his B.S. from Georgetown University in 1984, his M.D. from Duke University in 1989, and his Ph.D. in Biomedical Engineering from the University of North Carolina, Chapel Hill in 1994. He finished his training by completing an Ophthalmology Residency at Duke and a Fellowship in Vitreoretinal Diseases at Johns Hopkins Hospital. He stayed on as faculty at Johns Hopkins where he rose to the rank of Associate Professor before moving to USC in 2001. Currently, Dr. Humayun is a Professor of Ophthalmology, Biomedical Engineering, and Cell and Neurobiology at the University of Southern California. He has recently been honored by USC in being named to the Cornelius J. Pings chair in Biomedical Sciences. Dr. Humayun is the Director of the National Science Foundation Biomimetic MicroElectronics Systems Engineering Research Center at USC. The Center is developing devices designed to mimic and replace damaged and diseased systems in the human body. He is also the Director for the Department of Energy Artificial Retina Project that is a consortium of five Department of Energy labs and four universities, as well as industry. Scientifically, Dr. Humayun is the co-developer of the retinal implant that is the focus of these research groups and has received wide attention for its potential to restore sight.

His research projects are focused on the most challenging eye diseases: Retinal Degeneration including Macular Degeneration and Retinitis Pigmentosa. As mentioned above, he leads efforts on development of the most advanced retinal prosthetic device, the “Artificial Retina”.

Dr. Humayun is a member of 11 academic organizations including notable organizations such as IEEE-EMBS, the Biomedical Engineering Society, the Association for Research in Vision and Ophthalmology, the American Society of Retinal Specialists, the Retina Society, the American Ophthalmological Society, the American Academy of

Ophthalmology, and the Biomedical Engineering in Medicine and Biology Society. He has recently been elected to membership in the prestigious Club Jules Gonin.

As a principal investigator, he holds multiple research grants from the National Science Foundation (NSF), U.S. Department of Energy, and has had previous funding as a Career Development Awardee as well as the Vision Award from the Foundation Fighting Blindness. More recently he received recognition from Alcon and the Macula Society. He also holds a number of issued patents, and many pending in the retinal prosthesis field. Dr. Humayun has authored more than 130 peer-review papers and 23 books and book chapters. He also has been invited to participate as a guest speaker in numerous special and named lectures around the world. His work on the intraocular retinal prosthesis (“Artificial Vision”) has been featured prominently in more than 100 newspapers and television programs throughout the United States and abroad and, in 2005, he was named the Inventor of the Year by R&D Magazine.