

Stem Cells: Science, Ethics, and Politics in Dialogue

PARTICIPANTS

Peter Bryant, Ph.D., is a professor in the UCI Department of Developmental and Cell Biology and is the Director of UCI's Interdepartmental Graduate Training Program in Molecular Biology, Genetics and Biochemistry. His research program includes the use of genetic methods in the fruit fly *Drosophila* to identify the genes involved in the control of stem cell division and differentiation in the nervous system. The human genome contains highly conserved counterparts of these *Drosophila* genes, and Dr. Bryant is investigating how they function in controlling the division and differentiation of human neural precursor cells. The work is leading to a better understanding of how stem cell development is controlled, and will help in the effort to make stem cell therapy safer and more effective.

Larry Goldstein, Ph.D., is Professor of Cellular and Molecular Medicine at the University of California, San Diego, School of Medicine. An Investigator with the Howard Hughes Medical Institute, Goldstein receives grant funding from the NIH, the Johns Hopkins ALS Center, the Hereditary Disease Foundation, and the Ellison Medical Foundation and has over 100 publications. Goldstein taught at Harvard University in the Department of Cellular and Developmental Biology from 1984-1993 and moved to UCSD and HHMI in 1993. His awards include a Senior Scholar Award from the Ellison Medical Foundation, an American Cancer Society Faculty Research Award, and the Loeb Chair in Natural Sciences at Harvard University. His research focuses on understanding the molecular mechanisms of intracellular movement in neurons and the role of transport dysfunction in neurodegenerative diseases. His lab provided the first molecular descriptions of kinesin structure and organization, and has recently discovered important links between transport processes and diseases such as Alzheimers Disease and Huntingtons Disease.

Philip Nickel, Ph.D., is Assistant Professor in the UCI Department of Philosophy and also teaches in UCI's School of Biological Sciences. He received his Ph.D. in 2002 from UCLA. His research interests are in moral psychology, epistemology, and applied ethics including bioethics. He is interested in the ethics of stem cells both as an important ethical matter in its own right, and as a case study in moral and political psychology.

Leonard Sender, MD, received his medical education in South Africa and his pediatrics internship and residency training at UC Irvine Medical Center. His pediatrics hematology/oncology subspecialty training included Children's Hospital of Los Angeles. He subsequently developed expertise in adult hematology/oncology at the University of Kentucky, where he was a faculty member in the school of medicine. Prior to joining St. Joseph Hospital, Dr. Sender had been recruited from the University of Indiana, where he was Associate Professor of Pediatrics, with secondary appointments in the Departments of Medicine and Pathology, and Medical Director of the Riley Children's Cancer Center and Stem Cell Laboratory of Indiana University. Dr Sender is currently Medical Director of the Cancer Institute at Children's Hospital of Orange County and Medical Director of Clinical Oncology Services at UCI Medical Center's Chao Family Comprehensive Cancer Center.

Paul H. Silverman, Ph.D., has been an active scientist working in the fields of parasitology, medical entomology, epidemiology and immunology. He has held major scientific and academic administrative positions, including Vice President of the University of New Mexico, Provost of the State University of New York, President of the University of Maine, and Associate Chancellor at UCI. Silverman helped establish the first Human Genome Center (1987) at LBL/UC Berkeley and lobbied in Washington as one of the earliest advocates of the National Human Genome Project. Because of his concerns with the social implications of the National Human Genome Project he was elected a Fellow of the Hastings Center for Bioethics and serves on its Board. In 1994 he was elected to the 500 person World Academy of Art and Science, a UNESCO organization to use expertise to deal with global concerns. On behalf of the University of California, he was Director of the Systemwide Biotechnology Research and Education Program (1988-90) and facilitated university-industrial relations.

Lee Zwanziger, Ph.D., holds degrees in History and Philosophy of Science, and M.S. in Biological Sciences. She studies mutual influences at the intersection of science, philosophy and public policy, focusing on biomedical issues including stem cell research. Zwanziger recently authored "Biology, Ethics, and Public Policy: Deliberations at an Unstable Intersection," *Anatomical Record (Part B: New Anatomist)* 275B:185-189, 2003.