

Public Lecture on Genomics

Universidad Central del Caribe Specialized Neuroscience Research Program



Michael Brownstein earned his bachelor's degree from Columbia University and completed his graduate training at the University of Chicago, where he earned an M.D. and Ph.D. in pharmacology. He received his clinical training at the Boston Children's Hospital and then moved to the National Institutes of Health to work with Julius Axelrod, recipient of a Nobel Prize in 1970 for his studies in the field of neuropharmacology.

Dr. Brownstein remained at NIH after completing his fellowship, where he served as Chief of the Laboratory of Genetics of the National Institute of Mental Health and the National Human Genome Research Institute. For two years, he was the Scientific Director of the NIMH Intramural Research Program. Subsequently he directed the functional genomics program at the J. Craig Venter Institute in Rockville, MD for three years. He has worked in the fields of neurobiology, neuroendocrinology, biochemical pharmacology, genetics, and genomics; has published more than 300 papers in reviewed journals; and has served on major editorial boards, peer review committees, and not-for-profit scientific advisory boards. Dr. Brownstein cofounded several successful biotech companies, and currently advises and helps to create new ones.

23 y Todo el Mundo

We have 23 pairs of chromosomes, one set from our mother and one from our father. Each set is comprised of more than 3 million base pairs of DNA; and together the two sets of DNA make up our genomes. Genes, the protein-coding portions of the genome, are only a small part of the whole. Sequencing the human genome cost several billion dollars, but in the ten years since this was completed, the price has plummeted. Today, whole genome sequencing costs less than \$10,000, and whole exome (coding region) sequencing costs less than \$1,000. These procedures and others are already being used in the clinics, and a time will come when each of us will probably have our genomes sequenced more than once in our lifetimes. I'd like to tell you why.

**Wednesday,
March 12, 2014
11:00 am–12:00 pm**

**Anfiteatro Dr. José E. Madera
Hospital Ramón Ruiz Arnau**

(lobby main entrance)

**Laurel Avenue
Santa Juanita, Bayamón**

**Information: 787-798-3001, Ext. 2168
E-mail: ileana.garcia@uccaribe.edu**