

Ralph DeFronzo, M.D., B.M.S., M.S., B.S.

Dr. Ralph DeFronzo graduated from Yale University with a degree in biology and biochemistry before going on to Harvard Medical School and further studies in endocrinology and nephrology. He holds the Joe R. & Teresa Lozano Long Distinguished Chair in Diabetes in the Long School of Medicine at UT Health San Antonio, where he has been on faculty since 1988. Dr. DeFronzo is directly responsible for many of the advances achieved in diabetes over the last 50 years. He was a leader in developing the concept of insulin resistance, the defining characteristic of Type 2 diabetes, resulting in novel ideas about the development and progression of diabetes.

Dr. DeFronzo led the U.S. development of metformin, the first-line medication for treatment of diabetes, and ushered it through FDA approval in 1995. More recently, he discovered a new approach to diabetes treatment that targets glucose reabsorption in the kidneys. This work led to the development and approval of other widely used drugs, including dapagliflozin, empagliflozin and canagliflozin. His most recent work, along with Dr. Bruno Doiron, has led to a possible cure for diabetes in mice and is being developed for studies in larger animals.

In 2017, Dr. DeFronzo won the Harold Hamm International Prize for Biomedical Research in Diabetes, one of many titles he has held. In 2005 he received the Novartis Award at the Annual Scientific Meeting of the American Diabetes Association (ADA) as the outstanding clinical investigator worldwide. In 2002 he received the Albert Renold Award from the ADA for the training of more than 200 young diabetes investigators. He is also the author of 750 publications dating back to 1967.

Medical School:

Harvard Medical School

Internship:

Johns Hopkins University School of Medicine

Residency:

Johns Hopkins University School of Medicine

Fellowship:

National Institute of Health

University of Pittsburgh School of Medicine

Graduate School:

Boston College Graduate School of Biology