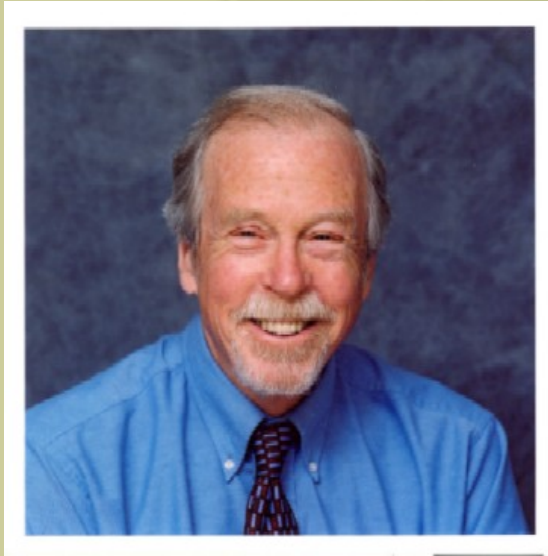


David Miller

Emeritus Professor of Biology _____ { [Email Professor Miller](#) }



Specialties: Plant physiology and biochemistry

After earning his doctoral degree, David H. Miller received a two-year postdoctoral fellowship at the Michigan State University Plant Research Laboratory. It was here that he began his research on the chemistry of plant cell walls, particularly algal cell walls.

At Oberlin, Miller taught courses in introductory biology, fungi, plant physiology, non-vascular plants, plant propagation, and organic gardening. His research interests have changed over the years. He initially continued and expanded his research on the nature of the unique plant cell-wall glycoproteins, particularly as found among the

algae, and he published several papers on this work. Recently he has begun a new research program studying soil remineralization. The basic hypothesis of this project is that many soils have become mineral-poor, and that supplementing such soils with powders of ground rock or gravel dusts (both of which are by-products of the gravel industry) will boost their fertility, resulting in crops of higher nutritive value. Using a combination of outdoor soil test plots and greenhouse pot tests, Miller is monitoring changes in soil biochemistry and mineral content, crop yields, and plant mineral content. "I believe the mineral elements of soil are as important as its organic matter, and that fertilizing with rock and gravel dusts will become an integral part of a more sustainable agriculture of the future," he says.

Miller enjoys foreign travel and has been as far as China where he lectured at Shansi Agricultural University in Taigu in 1986, and at Yunan University in Kunming in 1996.

B.A. (Botany), 1961, DePauw University

Ph.D. (Botany), 1967, University of California (Berkeley)