DEVELOPMENT OF A NATIONAL NARIVE PLANT GERMPLASM SYSTEM

Robert P. Karrfalt,¹ Ronald P. Overton, and Becky F. Loth

¹USDA Forest Service, National Seed Laboratory, West Lafayette, IN

A high level of genetic diversity is necessary for the success of plant breeding programs and for species adaptation to changing environments. Until recently the management of genetic resources of native plants in the United States was almost exclusively conducted in the wild (In Situ). The growing impact of exotic invasive pests, weeds, and climate change has caused responsible parties to question the reliance on In Situ methods alone. More managed human-assisted methods (Ex Situ) are now needed. Therefore, elements of the USDA Forest Service have begun development of a National Native Plant Germplasm System in cooperation with the USDA Agricultural Research Service and other entities in the federal, state and private sectors. Species, techniques, objectives and data management are discussed.