



FULFILLING A NEED

Wildfires have always been a part of land management; however, since 1999, millions of acres of federal land are burning each year. Predominantly due to drought and invasive species, the fire cycle in the western U.S. has changed from once every 40 years to once every 7 years. With the increase in fires comes the increased need for native seed to restore the land.

Unfortunately, genetically appropriate native plant materials are generally not commercially available in the quantities needed. Because of this deficiency, Congress directed the Bureau of Land Management and USDA Forest Service to work through the Plant Conservation Alliance (PCA) to develop a long-term native plant materials program.

Seeds of Success is an interagency program coordinated through PCA. It supports and coordinates seed collection of native plant populations in the United States to increase the number of species and the amount of native seed that is available for use in stabilizing, rehabilitating and restoring land.



Opuntia whipplei fruit.

<http://www.nps.gov/plants/sos/>



LEFT: The Center for Plant Conservation's Desert Botanical Garden collected small seeds from mesa tansyaster (*Machaeranthera tagetina*) in Arizona.

COVER: Kate Pavich, a Student Conservation Association intern

with the Bureau of Land Management's Bishop Field Office, collects seed at the Volcanic Tablelands in California.

PLANT CONSERVATION ALLIANCE

The Plant Conservation Alliance (PCA) is a public-private partnership of groups that share the same goal: to protect native plants by ensuring that native plant populations and their communities are maintained, enhanced, and restored. PCA has a federal committee, a non-governmental organization committee and five working groups, including the Native Plant Materials Development Program and Seeds of Success.

PCA Federal Members include:

Bureau of Land Management, Department of Defense, Environmental Protection Agency, Federal Highway Administration, National Park Service, USDA Agricultural Research Service, USDA Forest Service, USDA Natural Resources Conservation Service, U.S. Fish and Wildlife Service, and U.S. Geological Survey.

PCA's Cooperators include:

Over 260 botanical gardens, native plant societies, trade and professional associations, businesses, educational groups, nonprofits, landscape architects, local government and tribal agencies.

PCA is the IUCN North American Plant Specialist Group

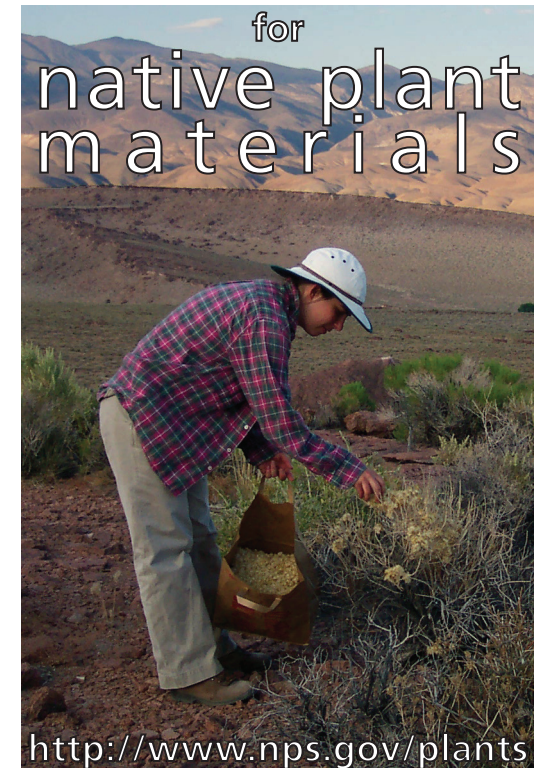


The World Conservation Union SPECIES SURVIVAL COMMISSION



Plant Conservation Alliance

SEED COLLECTION



for
native plant
materials

<http://www.nps.gov/plants>

Seeds of Success

SEEDS OF SUCCESS PARTNERS

- ✿ Bureau of Land Management
- ✿ Center for Plant Conservation
- ✿ Chicago Botanic Garden
- ✿ Lady Bird Johnson Wildflower Center and Mercer Arboretum
- ✿ Mt. Cuba Center, Inc.
- ✿ National Fish and Wildlife Foundation
- ✿ The Nature Conservancy
- ✿ NatureServe
- ✿ New England Wild Flower Society
- ✿ New York City Department of Parks and Recreation with the Brooklyn Botanic Garden
- ✿ North Carolina Botanical Garden
- ✿ Plant Conservation Alliance
- ✿ Royal Botanic Gardens, Kew, Millennium Seed Bank
- ✿ USDA Forest Service, Bend Seed Extractory
- ✿ USDA National Center for Genetic Resources Preservation
- ✿ USDA PLANTS Database
- ✿ USDA Western Regional Plant Introduction Station, Pullman
- ✿ Virginia Native Plant Society
- ✿ Zoological Society of San Diego

CONTACT INFORMATION

If you have questions about the partners or would like more information on Seeds of Success, e-mail Mary Byrne (mary_byrne@blm.gov).

SEEDS



Seeds of Success (SOS) is part of the federal interagency Native Plant Materials Development Program. It supports and coordinates seed collection of native plant populations in the United States to increase the number of species and the amount of native seed that is available for use in stabilizing, rehabilitating and restoring lands in the United States by partnering with the seed producing industry.

PARTNERSHIPS

Initially, the program began in 2001 through a memorandum of understanding between Royal Botanic Gardens, Kew and the Bureau of Land Management for collections on public lands in the west. The need for geographically and ecologically diverse collections from across the United States led to partnerships with 8 additional institutions. Seed



Atriplex canescens seed.

OF SUCCESS

collecting partners share data and coordinate their collections with the Plant Conservation Alliance. Materials are in long-term storage at both the Millennium Seed Bank in West Sussex, England and the USDA National Center for Genetic Resources Preservation in Fort Collins, Colorado.

SEED COLLECTIONS

Thus far, over 3,000 collections have been made. All collections adhere to the genetic sampling standard found in the Seeds of Success Technical Protocol. The seeds are cleaned, taxonomically verified, and have their viability tested. Afterward, they are distributed into working research collections and/or placed into long-term storage. Each collection is generally over 20,000 seeds, large enough for germination testing every 10 years for over 200 years.



INFORMATION SHARING

With each collection, data is gathered about the population from which the seed was collected.



Voucher specimens are collected to verify the species identification and are being stored in herbaria across the country. After the seed has been processed, germination testing is done at the Royal Botanic Gardens, Kew and the findings are recorded. This set of data is a wealth of information that is critical for the development of new native plant materials. SOS plans to share the information with growers, researchers, and federal agencies.

<http://www.nps.gov/plants/sos/>