**BUILDING RESILIENCY WITH NATIVE SEEDS:**

**NAVAJO NATION MANAGEMENT RECOMMENDATIONS**

The Building Resiliency with Native Seeds project integrates western science with traditional knowledge to address environmental issues on tribal lands by training tribal staff, elected officials, community members, and youth to identify, collect, grow, and deploy locally-adapted native seeds in agricultural and restoration settings.

**WHY LOCALLY-ADAPTED?**
Locally-adapted plants are better suited to local rainfall, soils, and summer/winter temperatures. The use of locally-sourced plant materials improves the success of restoration projects.

**Top 5 environmental issues that need improvement according to Navajo communities (Results from 2018 survey conducted by Diné Native Plant Program)**

- **Rangeland Improvement**: 62%
- **Erosion control**: 56%
- **Invasive plant removal**: 41%
- **Wildlife habitat improvement**: 41%
- **Wetland improvement**: 37%

**LOSS OF PLANT COVER CAN CAUSE**

**SOIL EROSION**

- Projected to increase with future drought conditions

**DEGRADATION OF WILDLIFE HABITATS**

- Decrease in forage for wildlife and livestock

**REDUCTION OF AQUIFER RECHARGE**

- Soil water retention is predicted to decline as drought increases

**DEGRADED AIR AND WATER QUALITY**

- Atmospheric dust has been linked to numerous respiratory disorders

**Diné Native Plants Program**

The Diné Native Plants Program (DNPP) was created in response to a scarcity of locally-sourced, native plant providers on the Navajo Nation. The goal of the DNPP is to serve as a living library of locally-sourced native plants for restoration, conservation, and research, and to provide Diné people access to plants for the benefit of the community, culture, wildlife, and land.

The DNPP is a new program with the Navajo Natural Heritage Program, under Navajo Department of Fish and Wildlife.
## RECOMMENDATIONS FOR LAND MANAGERS ON THE NAVAJO NATION

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<thead>
<tr>
<th>Seed Increase Field Production</th>
<th>Housing and Urban Development</th>
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<tbody>
<tr>
<td>Encourage Navajo Farmers to help us grow native plants for seed production as a low-water alternative to traditional crops</td>
<td>Prioritize native species for low-water landscaping and vegetate after soil disturbance</td>
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<tr>
<th>Riparian Restoration</th>
<th>RangeLand Improvement</th>
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<tr>
<td>Increase water retention by revegetating eroding streambanks</td>
<td>Choose appropriate native species for rangelands to improve livestock forage and wildlife habitat</td>
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<tr>
<th>Treatment After Invasive Species Removal</th>
<th>Mine Reclamation</th>
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<td>Combating invasive species with native plants protects biodiversity</td>
<td>Reclaim sites with appropriate native plant species from the area</td>
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<tr>
<td>Biodiversity mitigates climate change effects</td>
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<th>Restore and Conserve Diné Culture</th>
<th>Community Outreach</th>
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<td>Collect and store seed from culturally important plants and host workshops on traditional uses of native plants</td>
<td>Teach the public and youth how to identify plants and ways to use them</td>
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### Native Plant Policy for the Navajo Nation

In order to address environmental issues occurring across the landscape, DNPP is advocating for a “native plants” policy that encourages the use of locally-sourced native plants.

This policy will push the priority towards using locally-adapted native plants for restoration, reclamation, and landscaping efforts occurring on the Navajo Nation. This policy will also encourage revegetating with native species after removing invasive plants to restore wildlife habitat and reduce erosion.

The Diné Native Plant Program (DNPP) would like to meet the demands for native plant material. The DNPP is currently working on projects across the Navajo Nation such as riparian and rangeland restoration, community outreach, seed collecting, seed banking, and greenhouse production.

### The Diné Native Plants Program can provide:
- Native seeds collected from important grasses, wildflowers, and shrub species
- Container plants for use in restoration and revegetation projects
- Workshops and resources about best practices

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Revised 10/6/2020