

CHRISTMAS ON THE BEACH

**LOW-TECH STRATEGIES
HELP RESTORE THE
DUNES AT ALABAMA'S
GULF STATE PARK.**

In Gulf Shores, Alabama, hundreds of discarded Christmas trees will be hitting the beach along with the snowbirds and spring breakers this year. Donated by local residents, the trees are part of a dune restoration project at Gulf State Park, itself one of many improvements planned for the 6,150-acre park, an ecologically important area that includes three and a half miles of white sand beaches, coastal wetlands, and rare pitcher plant bogs.

This isn't the first time that Christmas trees have been repurposed as sand fencing, but ecologists at Gulf State Park have been working to identify exactly how the discarded evergreens should be placed, oriented, and combined with other strategies to best accelerate the accretion of windblown sand. "They've actually figured out exactly how to place them, at exactly the right angle, to maximize capture,"

says Gina Ford, ASLA, a principal at Sasaki Associates, part of a team leading the revitalization of the park, which was devastated by Hurricanes Ivan and Katrina as well as the Deepwater Horizon oil spill. (BP's settlement is the sole source of funding for the \$135 million project, which also includes 10 miles of new trails, a new research facility, and an environmental information center.)

Volkert Inc., a local engineering firm, designed the dune restoration scheme, which is as low-tech as it is imaginative. A series of breaches will be cut into a long, man-made berm built following Hurricane Ivan, allowing wind to blow sand farther inland. The salvaged Christmas trees, which are clumped together in a horseshoe pattern and combined with plantings of sea oats, seacoast marsh elder, and other native species, trap the sand and help form secondary and tertiary dunes and a patchwork of natural swales, providing habitat for animals like the Alabama beach mouse and a stronger, more natural buffer for the state's coastal communities. ●

