

# Real-Life Solutions

■ BUNKER MAINTENANCE



BunkerGuard is effective because its corrugated construction can reduce sand shifting and soil erosion during storms and high winds.

PHOTOS COURTESY: NORTH AMERICAN GREEN

## On 'Guard'

### Three-dimensional liner protects against bunker washout and erosion

BY LARRY AYLWARD, EDITOR IN CHIEF

#### Problem

When heavy rains and strong winds walloped Champions Retreat Golf Club, the course's superintendent and director of golf were concerned about bunkers washing out.

#### Solution

The course installed a three-dimensional liner comprised of three polypropylene nets integrated with a polypropylene fiber matrix, which prevented any washouts.

**T**he cloudbursts that arrived in central Georgia were remnants of the still-menacing hoard of hurricanes that socked and soaked Florida last fall. Champions Retreat Golf Club in Augusta, Ga., was not spared by the nasty weather. The 27-hole complex, with nine-hole courses designed by Arnold Palmer, Jack Nicklaus and Gary Player, was deluged with rain and walloped with wind.

In the end, Mother Nature's fury, which included a few days of 2.5-inch rains, proved a good test for about 10 steep-faced bunkers located on Champion Retreat's nine-hole Arnold Palmer course. Would they wash out like a crummy contestant on "American Idol?"

Dan Ciamaichelo, Champions Retreat's superintendent, and Brian Stock, the club's

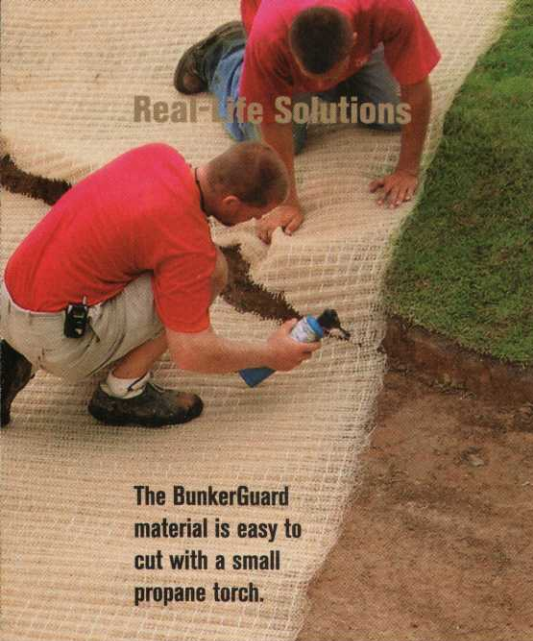
director of golf, were eager to see what happened to the bunkers after one of the last heavy rains had receded. They were especially curious because they had recently attached the bunkers with BunkerGuard, a three-dimensional liner comprised of three polypropylene nets integrated with a polypropylene fiber matrix. Evansville, Ind.-based North American Green, the company that manufactures the product, said BunkerGuard can minimize sand washout and reduce soil erosion, even on the steepest bunker faces.

"Dan and I went out and looked at some of the bunkers that have 6-foot-deep to 8-foot-deep faces," Stock says. "We didn't know what to expect."

Ciamaichelo and Stock weren't awash with anguish, fortunately. The BunkerGuard did its job.

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The BunkerGuard material is easy to cut with a small propane torch.

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“The bunkers were still holding all of their sand,” Stock says.

It was the first test for the bunkers and a dandy one at that. “We were pleased and surprised at the same time after we saw the end result,” Stock says. “There are some severe bunkers out here where the bunker lines are al-

most to the top of the putting surface. When you’ve got that steep of bunkers and you’re getting that much rain, I would say most other products would fail to hold the sand in place.”

Tom Ohlson, the certified superintendent of Falls River Country Club in Boston, used BunkerGuard on his courses’ bunkers and says the product gives sand something to grip onto, which then eliminates the contamination that erosion can cause.

If bunkers were cars, they would’ve been classified as Pintos or Gremlins 25 years ago. These days, however, bunkers are viewed as upscale Lexus or Mercedes. That said, superintendents want to take care of them to the best of their abilities. Hence, they want to keep bunkers from washing out for myriad reasons, aesthetics and playability included. But bunker washouts can also be costly to repair.

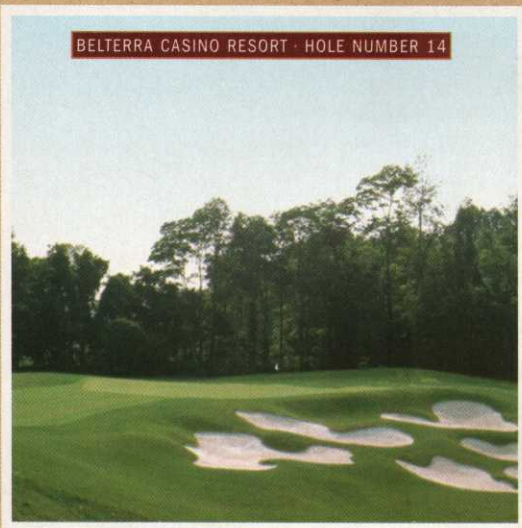
North American Green says BunkerGuard is effective because its corrugated construction can reduce sand shifting and soil erosion during storms and high winds. The rough corrugated structure provides increased frictional properties to hold sand in place while controlling erosion to the underlying soil, according to the company.

BunkerGuard can be customized to any bunker slope length by cutting the rolled material to appropriate length with a utility knife or small propane torch, according to North American Green, which also says the product is easy to install.

Ciamaichelo will attest to that. “It’s really easy to use,” he says. “It comes in large rolls and is ready for use when you unroll it. The material is simple to cut and staple down into the soil.”

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Ciamaichelo expects the BunkerGuard to last 30 to 40 years. It requires no maintenance, except cleanup of staples once they become loose.

But Ciamaichelo points out that the steep slopes with BunkerGuard must be hand-raked.

"We can't rake them with a gas-operated rake," he says, "because it could reach down below the sand, get into the BunkerGuard material and probably damage it."

Champions Retreat also used North American Green's erosion control blankets during seeding on parts of its nine-hole Nicklaus design last summer.

"After seeing the specs on the product, we figured it would serve the purpose for us and the price was reasonable," Ciamaichelo says of North

American Green's DS75 blanket. "We used it on some rather severe slopes."

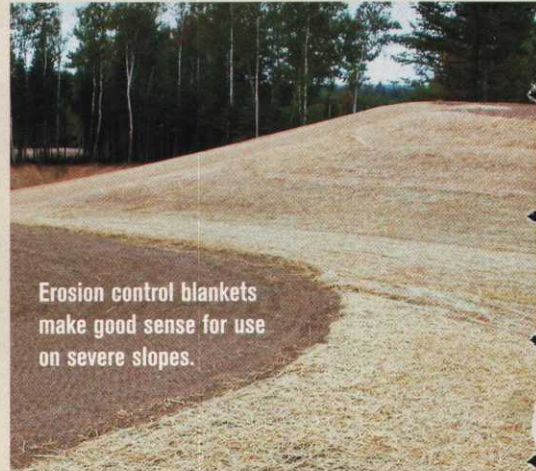
Ciamaichelo says he and his crew installed the blanket first and seeded on to it.

"The best part about it is that the material is not visible anymore once the seed is established and the turf is there," Ciamaichelo says. "The material breaks down with sunlight. But it also takes long enough to break down that you're assured of a good stand of grass prior to it breaking down."

Ciamaichelo says the erosion control blankets were also easy to use.

"The product went down quickly," he says. "We just rolled it out, stapled it and seeded into it."

Pat Brockwell, superintendent of Black Mesa Golf Club in La Mesilla, N.M., used three truckloads of North American Green's DS75 erosion control blankets, comprised of degrading



Erosion control blankets make good sense for use on severe slopes.

free wheat straw, around his course's steep bunkers and fairways.

"We had very good results with seed establishment and thus erosion control," he says. "Costs were substantially lower than sod, and we had the benefit of seed establishment with much better rooting than sod." ■

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