Greens renovation: What I learned

by DOUG PETERSAN / Baltimore Country Club

While a superintendent at Baltimore Country Club and Prairie Dunes Country Club (Hutchinson, Kans.) before it, I was involved in two separate renovations. The key lesson I learned was that, before embarking on a renovation program, you must examine and meet several criteria.

Here are the questions you must ask yourself and your board:

1) Are members satisfied with the existing architecture? Are the greens the right size with adequate cupping areas to support play? Are they designed properly?

2) Does the existing subsurface of the green support good healthy turfgrass? If it doesn't, can it be modified so it will support healthy bentgrass? Do the greens drain properly, both on the surface and through their soil profile? If they don't, can they be altered to allow for good surface and subsurface drainage? Are there layers in the soil profile? Are the chemical and fertility levels of the soil proper for the area?

3) Can the members or players be properly educated about the constraints of the program? Can temporary greens be prepared well enough to provide quality playing conditions? Can the club afford the loss of revenue from greens fees, golf car rental, restaurant sales, and pro shop sales?

When developing your renovation program, a complete cost analysis is required. We had serious revenue losses at all profit centers when we renovated.

At Prairie Dunes, the number one criteria was to not change the contours of any greens because the course was already highly rated.

After deciding to renovate, we triple-cut the greens at 7/100ths of an inch on Labor Day weekend. We aerated in two directions with ½-inch solid tines that went 10 inches into the soil. The greens were then fumigated by an independent contractor and covered. Temperatures for the fumigation were reasonably good.

On the third day after the fumigation, we removed the cover and let the greens air out. Two days later, Pennlinks pre-germinated seed was verticut into the green at a rate of ½ lb. per 1000 sq. ft., in two directions. Six-foot collars were seeded with bluegrass.

Greens were then fertilized with a

This green at Baltimore Country Club was expanded considerably. All greens were fumigated.

Milorganite/seed mix, 10 lbs. of Milorganite to 1½ lbs. of seed. Subdue granular fungicide was applied, and the greens were raked.

We got good germination the third day, and the greens opened up the following April 30th.

Total cost was $30,000 plus loss of revenue.

At Baltimore Country Club, we changed the green perimeters but not the contours and re-established the original edges of the greens, expanding them from 100,000 sq. ft. to 130,000 sq. ft. The greens also had organic layers that needed to be addressed.

Stan Zontek of the USGA Green Section and Dr. Joe Duich of Tee-2-Green were involved with establishing the Pennlinks bentgrass.

The sod on the greens and the collars was stripped on Labor Day. We topdressed with sand (about 12 yards per green) before aerating so we could drag the sand into the aeration holes. We then deep-time aerated twice, using ¼-inch solid tines, followed by another deep-tine aeration with ½-inch tines spaced at two inches.

The top three inches of soil were heavily cultivated and mixed, with Aeroblades, and new irrigation pipe was installed by an irrigation contractor.

Finally, the greens were fumigated.

When the fumigation was complete, we let the greens air out for two days and tested our new irrigation heads. The greens were raked, Sand-Pro'd and rolled with a smooth roller.

Pre-germinated seed, mixed with Milorganite and Subdue fungicide, was put down in one application.

When established, first mow was at 45/1000ths of an inch.

Temporary greens were not necessary because Baltimore Country Club is a 36-hole facility, and we routed all golfers to the other 18.

Estimated cost was $120,000.

I feel that a renovation or fumigation and regrassing program can be a good program for clubs if the above criteria are addressed and met. One cautionary note: don't let anybody—including your board—talk you into opening too soon in the spring. If any of the above criteria cannot be met, a renovation program could be an absolute failure. □

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