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## WET APPROACH AREAS

Recently, I had the pleasure of golfing with Ron Whitten, golf architecture editor for *Golf Digest*, and Jim Moore, director of construction education for the USGA. *Golf Digest* is now emphasizing firm, fast conditions in its Top 100 rankings. This change comes just as Jim and I have noticed more courses experiencing overly wet green approaches.

Better players are revisiting the joys of bump-and-run golf, but average golfers have always used/needed the run-up approach to reach the green. When approach areas are wet and approach shots plug, average players can't reach a green in regulation. Green approaches should be considered high-priority maintenance areas – equal to greens and more important than tees and fairways – if golf courses are going to play the way they're designed. Superintendents should view the green and surrounds as an interrelated complex, much like the golf course architect did during the design phase.

I've addressed design aspects of wet approaches by contouring more greens to move more drainage away from the front of the green toward the sides, especially on larger greens with greater drainage volumes. I also contour most green approaches with 4 percent minimum slope – versus 3 percent in other areas – while being mindful that too steep an approach slope will kill an approach shot as surely as a wet one.

I recommend building sand-capped approaches and fairway chipping areas on new courses. Existing courses can create sand-based approaches slowly via aggressive core aeration and removal, together with heavy topdressing. While it's more expensive, reconstructing approaches with a 4-to-8-inch sand cap and a herringbone pattern of 4-inch tile or slit drains may be the ultimate solution.

Predictable bounces are important in the approach, so any drain pipes in that area require good compaction to prevent settling that will affect play. While catch basins in the approach area might affect play, they

help drainage greatly by avoiding long surface drainage runs that always become soggy.

However, there may be a less expensive solution to improve wet approaches on existing courses quickly. Jim is conducting research on wet approaches and sees evidence overwatered approaches often stem from the golf course/irrigation design



practice of using part-to-part sprinklers to achieve more precise watering of green and surrounds.

The concept of part-to-part sprinklers to water greens and surrounds is great in principle. But, two old sayings, "The devil is in the details" and "There are always unintended consequences," seem in play here. Why? Because problems occur when irrigation designers place green irrigation heads at eight o'clock and four o'clock – rather than at six o'clock or the center line of play – to reduce their affect on play. Problems

also arise when superintendents set those sprinklers at about 90 degrees to cover just the greens or just the approaches.

This combination of conditions results in four heads – six counting the approach heads – watering the front approach, rather than two or three that cover every other area of the golf course. And when considering that the dwell time – those few seconds part-circle heads stop before reversing direction – also occurs right in the approach, the approach inadvertently receives at least twice the irrigation of any other area on the golf course. Add the traffic and compaction factors typical for approaches, and it's no wonder they remain wet.

Based on the preliminary study results, Moore suggests a few quick solutions:

- When replacing your irrigation system, consider placing the first head at the six o'clock position, accepting the small risk of shots hitting the sprinkler.
- Use a combination of full-circle and part-circle heads around greens rather than part-to-part sprinklers. Only during summer heat and fall overseeding do the irrigation needs vary enough to warrant using double heads.
- For the outside part sprinklers, adjust the spray pattern to reverse in a less-critical area in the rough rather than automatically setting them to 90 degrees, which adds unnecessary irrigation to the approach. Setting them to almost full circle should move the dwell time area out in the rough, but also consider existing trees, heavy cart traffic areas, etc., and set them on a site-specific basis.
- Make sure to monitor constantly, and periodically adjust sprinklers because they come out of adjustment often.

It's ironic part-to-part sprinklers, which were adopted to address the problems of different water needs around the greens, have actually added to the problem. With golfers continuing to demand better playing conditions in critical areas of the course, a new emphasis on firm and fast, and budgets being squeezed, you might try this laser-surgery approach to adjusting your sprinklers. **GCI**