

**H**ere in the United States, golf course superintendents usually unite in common concerns about reducing chemical usage or protecting water resources. In Great Britain and most of Europe, the controversial issue within the profession is golf course sustainability. Having visited Great Britain recently, the “sustainable” issue has divided many golf course managers and superintendents.

The Royal and Ancient Society of St. Andrews (R&A), the ruling body for golf outside of North America, has declared that golf courses should become sustainable. The concept is that golf courses should strive to be naturally sustainable, requiring reduced energy inputs (fertilizers, pesticides, water). Interestingly, coastal courses left to “sustain” themselves would eventually succumb to natural succession and become scrub and trees. However, the debate whether correctly or mistakenly has boiled down to one primary issue — the use of fescues and fescue mixes for greens, tees and fairways and the supposedly associated lower management intensities required for these varieties.

The classic coastal courses of Great Britain were originally fescue or established to fescue since the earliest days of golf. Fine fescues were well adapted to droughty sandy soils and a mild moist temperate climate common to Great Britain’s coastal regions. They thrived when coupled with low-intensity cultural programs and little traffic.

Unfortunately, not all golf courses in Great Britain and Europe were built on well-drained sands under mild climatic conditions. Clay soils that stayed wet during the winter and spring and dried out and cracked in the summer were not conducive to maintaining fescues. Combined with climatic differences and higher cultural intensity requirements on many golf courses, a definite conflict arose.

The difficulty with the one-grass-fits-all concept is it avoids ecological community principles such as niche and turfgrass competition, which define adaptability. Turfgrass species have specific resource and conditional requirements. For example, resources such as light, nutrients and water help define the species niche, along with

## A Controversy That Is Unsustainable

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the soil type, degree of compaction and soil pH. In addition, management conditions such as mowing height and irrigation influence turfgrass survivability. Once competing species are introduced, the competitive intensity is a result of niche overlap. In the face of competing species, the actual niche “size” of the desirable turfgrass species may shrink to the point that the desired species may be driven to extinction.

The major competitor of links-type fescues, as well as other cool-season turfgrasses, is *Poa annua*. On traditional links golf courses in Great Britain, management practices favor the fescue over the *Poa*. Minimal fertilization, reduced irrigation and higher mowing heights, coupled with favorable soil and climatic conditions and a lack of wear or traffic, can favor fescue. However, fescues become less suitable and succumb to *Poa annua* invasion in situations where climatic conditions are stressful, soils become more compacted, wear injury increases and management practices are more intensive.

Influencing management decisions are golfers’ expectations. What they pay to play shapes their perceptions. Ignoring a golfer’s wishes is unsustainable economically.

Managing a turfgrass species in a situation that’s not suited or where competition exists from other species is like forcing a square peg into a round hole. The management inputs necessary become prohibitive or useless in the face of species more adapted for the given situation. There are a few fairway and green situations where fescue may succeed. However, like the controversy itself, the assumption that one turfgrass is adaptable to all conditions is unsustainable.

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