THRU THE GREEN

EDITOR
Randy Gai

OFFICE
Barbara Mikel - Exec. Sec'y
550 Main St., Ste G
PO Box 3360
Diamond Springs, CA
95619
PHONE: 916/626-0931
FAX: 916/626-5132

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PUBLISHER
DJ King
King & Company
7150 Shoreline Dr., #3215
San Diego, CA 92122
619/558-4769
FAX 619/558-7387

THRU THE GREEN
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PRESIDENT'S MESSAGE

"Back to the Future" appears to be on the horizon for the golf course superintendent in his quest for the perfect putting green. As we all know, the recipe for speedy, healthy putting greens is simply to lower the mower and limit the fertilization, then throw on the pesticides to help the turf stay healthy.

Herein lies the key: healthy turf is not scalped down to the crown of the plant. The height of cut going up is the only place for variation in this recipe. It is a foregone conclusion that using pesticides will soon be a thing of the past. So, without them how could we be expected to maintain healthy putting greens?

Dr. Noel Jackson is quoted as saying "Everyone mow at 3/16 (inch) and no less, and to heck with the golfers. Do this and you'll grow great grass." Three sixteenths of an inch probably equates to about 7-7.5 on the stimpmeter. How do I sell that to my Board, Green Chairman, Golf Pro, and members? It is going to be a slow, tough sell, yet unless we begin to make this point, while we still have a few of our tools (pesticides), we will find ourselves frustrated and probably looking for a job when our greens are dead.

We can probably maintain those excessively low mowing heights for a few weeks of the year, while we accommodate an important tournament or two. But we must learn to back off as stress approaches.

Begin to get your decision-making bodies at your course to establish a written document to protect you. This document should first and foremost establish the precedent for healthy turf, followed by criteria for acceptable speeds and mowing heights of cut. Frankly, this document might need to go into the bylaws to keep it bullet proof from aggressive scratch golfers who will continue to push you for faster greens.

Unless we start now, Back to the Future could be a recipe for disaster.

See you on the tee,
Randy Gai
President

Bentgrass Variety Trials

FINAL RESULTS

Ali Harivandi and William Hagan
UC Cooperative Extension

In cooperation with GCSANC, the Northern California Turf and Landscape Council, and the Sunnyvale Municipal Golf Course, the University of California Cooperative Extension conducted a three-year bentgrass variety evaluation at Sunnyvale Municipal Golf Course. This location is one of sixteen locations in the U.S. for the National Turfgrass Evaluation Program under the auspices of the United States Department of Agriculture.

Preparation of the sites at the Sunnyvale Golf Course began in 1989. Two of the three sites were prepared by mixing 2 inches of organic matter into 6 inches of top soil with a rototiller. One of these sites was managed as a golf tee/fairway and the other site was managed as a golf green. The third site was prepared by replacing the native soil with one foot of pure sand. The sand was low in calcium and phosphorous. This was corrected by adding the appropriate amounts of gypsum and single superphosphate. The sand base site was also managed as a golf green. Varieties were planted (lb/1000 ft^2) in March, 1990, in a randomized complete block design, in 10 ft x 10 ft plots and 3 replications. Fertilization and irrigation was done as needed. The tee site on the soil was mowed at

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BENTGRASS TRIALS

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5/8 inch 2 days a week. Greens were mowed at 5/32 inch 3 days a week. Twenty varieties were entered in each replication for each soil. Three of the varieties are colonial bentgrass, one dryland bentgrass (Agrostis Castellana), one browntop bentgrass (Agrostis cappillaris) and the rest are creeping bentgrass. Not all of the same varieties were used on each of the soils. The trial was completed in December, 1994, after three years of evaluations.

Starting in January, 1991, various data were taken on each plot. Overall quality on a sale of 1-9 (9 best) were taken on a monthly basis. Density on a scale of 1-9 (9 best) and percent (%) ground cover were taken on a quarterly basis. Color ratings were taken one time per year during October or November when the least amount of environmental stress was present and the full genetic potential for any given variety could be expressed. The first color rating was taken when the plantings were more than one year old in order to eliminate false color expression of juvenile plants. Thatch development was taken one time per year during July or August. Annual bluegrass (Poa annua) invasion estimates (percent of stand) were taken on a quarterly basis.

The accompanying tables (see insert) summarize the final results of these evaluations based on the overall quality ratings. These ratings should help golf course superintendents in selecting the most suitable creeping bentgrass variety for their specific needs. Additional information on these grasses will be made available as other data related to this data are analyzed and interpreted.

Acknowledgements: The authors wish to thank the following whose generous financial support made this study possible: Golf Course Superintendents Association of Northern California; Northern California Turf and Landscape Council; Sunnyvale Municipal Golf Course (Ken Sakai, Curtis Black, Chris Gose, and Peter Sandoval); OM Scott; Pacific Sod; R.V. Cloud; Shelton Transfer Service, Inc.; Sierra Pacific Turf Supply; United Horticultural Products; and Weststar.

WELCOME TO THE GREEN

Welcome to the following new GCSANC members:

ASSOCIATES
(30 day wait)

Kelly Singleton
Global Golf
Gavilan Golf Course
Superintendent

AFFILIATES
(30 day wait)

Blain Boccignone
Arbor Care

James Sherman
Turf and Industrial Equip

UPGRADES

John Grant
from A to Retired - Class A Life

Anthony Steers
Contra Costa Country Club
from B to A

Upgrade testing is now going to be done on a quarterly basis. We will publish the date and sites of the upcoming test location in the next newsletter. We are trying to set up one site in the North Bay area and one in the South Bay. After your application to upgrade is reviewed by the board, you will be notified in writing (as well as in the newsletter) where your testing will be administered.

We are also updating the tests for more current information and to correspond with the duties of A and B members. This will enable study guides to be written and reviewed by the applicants prior to testing.

Leon Snethen

Our Apologies to **David Graves** of the H.V. Carter Company. We neglected to mention a donation of $250 to the Scholarship and Research Fund that David made at the February meeting at Hidden Valley Golf Club. Thank you, David, for your generosity.

TURFGRASS QUALITY RATINGS OF BENTGRASS CULTIVARS IN THE
1989 NATIONAL BENTGRASS (GREEN-SAND) AT AT SANTA CLARA, CA
1991-1993 DATA

TURFGRASS QUALITY RATINGS 1-9; 9=BEST

NAME	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	MEAN
COBRA	5.8	6.0	6.2	5.7	6.2	6.2	6.0	6.7	6.7	6.3	6.2	6.0	6.3
SR 1020	6.2	5.7	6.7	4.3	6.8	5.7	6.3	6.3	6.1	5.5	5.5	5.5	6.1
TAMU 88-1	5.8	5.7	5.6	5.0	6.0	5.7	5.8	6.8	6.3	6.0	5.8	5.3	6.0
MSCB-8	5.4	5.0	5.6	6.0	6.0	5.7	6.0	6.4	6.0	6.0	5.8	5.2	5.9
PRO/CUP	5.2	4.7	5.9	5.3	5.8	5.8	5.5	6.3	6.1	6.2	6.0	5.5	5.9
PUTTER	5.7	5.7	5.7	4.0	6.0	5.2	6.5	6.6	6.3	5.7	6.0	5.8	5.9
REGENT	5.1	5.7	5.9	5.0	6.0	5.8	6.2	6.8	6.3	6.2	5.3	5.3	5.9
PENNCROSS	5.2	5.7	5.4	5.0	5.8	5.7	6.0	6.0	5.7	5.8	5.3	5.2	5.7
PENNLINKS	5.6	5.3	5.9	5.3	6.0	5.7	5.3	5.9	5.6	5.7	5.5	5.0	5.7
LOPEZ	5.0	5.3	5.3	5.3	5.3	5.6	5.5	6.1	5.6	5.8	4.8	4.7	5.5
CARMEN	5.6	5.3	5.3	5.0	5.9	5.3	5.3	6.1	5.0	5.2	4.7	4.5	5.4
EMERALD	4.8	4.7	5.0	5.0	5.3	5.2	5.3	6.1	5.3	5.8	5.3	5.2	5.4
88.CBE	4.9	4.3	5.1	4.7	5.3	5.2	5.0	5.8	5.0	5.2	4.5	4.5	5.2
BISKA	4.3	3.7	4.8	5.3	5.2	5.2	5.0	6.2	5.2	5.7	4.3	4.2	5.2
EGMONT	6.2	4.7	4.9	5.0	5.1	4.8	5.3	5.0	5.0	5.2	4.3	4.5	5.1
NATIONAL	4.3	4.3	4.4	5.3	4.6	4.8	4.7	5.1	5.1	6.2	4.8	4.7	4.9
TRACENTA	4.9	4.3	3.9	5.3	4.0	3.9	4.0	4.7	4.7	5.7	4.7	4.7	4.4
BARDOT	4.9	3.7	3.7	5.3	4.2	3.3	4.5	4.4	4.4	5.2	4.2	4.7	4.3
ALLURE	4.9	4.3	4.0	5.3	4.2	3.8	4.3	4.2	3.6	4.8	4.2	4.5	4.2
BR 1518	4.3	3.0	3.8	5.0	4.2	3.4	4.3	3.9	3.9	4.8	4.0	4.2	4.0
LSD VALUE (*0.05)	0.9	1.5	0.8	-	0.9	0.7	1.2	0.9	0.9	1.2	2.0	1.5	0.5

*To determine statistical differences among cultivars, subtract one cultivar's mean from another cultivar's mean. Statistical differences occur when this value is larger than the corresponding LSD value.

TURFGRASS QUALITY RATINGS OF BENTGRASS CULTIVARS IN THE
1989 NATIONAL BENTGRASS (FAIRWAY) TEST AT SANTA CLARA, CA
1991-1993 DATA

TURFGRASS QUALITY RATINGS 1-9; 9=BEST

NAME	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	MEAN
PUTTER	6.1	7.3	7.1	7.0	7.2	7.3	7.2	7.3	7.6	6.7	7.7	7.2	7.1
COBRA	6.2	6.3	6.8	6.3	6.6	6.7	6.7	7.1	7.2	6.3	6.7	6.7	6.7
REGENT	6.0	7.0	6.8	6.3	7.1	6.8	6.5	6.7	7.1	6.2	7.2	6.5	6.7
PENNCROSS	5.3	7.0	6.8	6.3	6.4	6.8	7.0	7.1	7.0	6.5	6.5	6.2	6.6
PENNEAGLE	6.0	6.3	6.0	5.7	6.9	7.0	7.3	7.1	6.9	6.3	6.7	6.3	6.G
TAMU 88-1	6.2	6.7	6.7	5.3	6.6	6.1	6.0	7.0	6.4	6.0	6.5	7.0	6.5
PROVIDENCE	5.3	5.7	6.7	7.0	6.6	6.4	6.3	6.7	6.6	6.0	7.0	6.0	6.4
CARMEN	5.9	6.0	6.6	5.7	6.2	6.4	5.8	6.2	6.3	5.5	6.3	6.0	6.3
PRO/CUP	4.9	6.0	6.2	5.7	6.7	6.9	6.8	6.8	6.3	5.7	6.3	5.8	6.3
VIPER	5.4	6.0	6.3	6.3	6.4	6.0	6.0	6.7	6.7	5.8	6.7	6.2	6.2
LOPEZ	5.3	5.7	6.1	6.0	6.0	6.1	6.2	6.7	6.6	5.7	6.7	6.2	6.2
SR 1020	5.8	6.3	6.2	5.7	6.4	5.7	6.0	5.9	6.3	6.2	7.0	6.7	6.2
NATIONAL	4.6	6.7	5.2	5.0	5.6	5.6	6.2	7.1	6.9	5.7	6.3	6.2	5.8
EMERALD	4.4	5.7	5.2	6.0	5.4	5.3	5.2	5.9	5.8	5.8	6.7	6.3	5.6
EGMONT	6.4	6.0	5.7	5.0	5.8	4.9	5.3	4.9	4.8	5.2	5.3	5.7	5.4
ALLURE	5.6	5.3	5.4	5.7	4.8	4.8	5.0	5.6	4.8	4.8	6.3	5.5	5.2
SEASIDE	4.9	4.3	4.7	6.0	4.9	4.8	5.2	5.4	5.2	5.3	6.0	5.5	5.1
BARDOT	4.8	6.3	5.2	5.3	5.2	4.4	4.7	4.9	5.2	4.8	5.5	5.5	5.0
TRACENTA	4.6	4.7	5.0	5.3	5.0	5.0	4.3	4.7	5.0	4.7	4.7	4.7	4.7
BR 1518	4.8	5.0	4.1	4.3	3.8	3.6	3.7	4.0	4.1	4.3	4.7	4.5	4.1
LSD VALUE (*0.05)	1.0	3.6	0.8	2.2	0.6	0.8	0.7	0.7	0.8	0.8	0.9	0.9	0.4

*To determine statistical differences among cultivars, subtract one cultivar's mean from another cultivar's mean. Statistical differences occur when this value is larger than the corresponding LSD value.

TURFGRASS QUALITY RATINGS OF BENTGRASS CULTIVARS IN THE
1989 NATIONAL BENTGRASS (GREENS-NATIVE SOIL) TEST AT SANTA CLARA, CA
1991-1993 DATA

TURFGRASS QUALITY RATINGS 1-9; 9=BEST

NAME	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	MEAN
SR 1020	6.8	6.0	6.9	6.3	6.9	6.8	7.2	7.1	6.8	6.5	6.3	6.2	6.8
PENNLINKS	6.3	6.0	6.4	6.3	6.2	6.4	6.5	7.1	6.9	7.2	6.8	6.5	6.7
VIPER	5.7	6.0	6.4	6.0	6.2	6.2	6.7	7.3	7.2	6.3	6.8	6.2	6.6
PRO/CUP	5.3	5.7	6.1	6.3	6.1	6.1	6.7	7.2	7.1	7.2	6.2	5.7	6.4
CARMEN	5.9	5.7	6.1	6.7	6.2	6.3	6.5	7.0	6.4	6.2	5.3	5.5	6.3
COBRA	5.7	5.7	6.0	6.0	6.1	6.1	6.5	6.8	6.0	6.2	6.5	6.2	6.2
PROVIDENCE	5.1	5.3	6.0	5.7	6.3	6.4	6.7	7.0	6.6	6.3	6.0	5.7	6.2
88.CBE	5.3	5.3	5.8	6.0	6.0	5.9	5.7	6.4	5.9	6.5	5.7	5.8	6.0
LOPEZ	5.7	5.0	5.7	5.7	5.7	5.4	5.8	6.9	6.2	6.5	5.3	5.2	6.0
PUTTER	5.6	5.7	5.7	6.3	6.0	5.9	5.8	6.6	6.0	6.0	5.5	5.3	6.0
REGENT	5.4	5.3	5.8	6.0	5.9	6.1	5.8	6.6	6.2	6.7	5.5	5.5	6.0
PENNCROSS	5.3	5.0	5.4	6.0	5.3	5.1	5.3	6.6	5.9	6.7	4.8	5.3	5.7
EMERALD	5.1	4.7	4.7	6.0	4.8	4.9	5.2	5.9	5.1	6.2	5.2	5.0	5.2
NATIONAL	4.2	4.7	4.3	5.7	4.4	4.7	4.5	5.8	5.3	6.3	4.5	4.5	4.9
EGMONT	6.2	4.0	4.2	5.0	4.3	4.1	4.3	4.4	4.1	5.5	3.7	4.5	4.7
BARDOT	4.9	3.7	4.3	6.0	4.6	4.2	4.7	4.7	4.3	4.7	4.3	4.7	4.6
ALLURE	5.2	3.0	3.7	5.3	3.6	3.4	3.5	4.2	4.0	4.8	4.5	4.5	4.2
SEASIDE	4.7	4.0	3.6	5.7	3.6	3.7	4.2	4.7	4.2	5.0	4.3	4.8	4.2
TRACENTA	4.9	3.3	3.0	5.3	3.7	3.2	3.2	4.1	4.0	5.0	4.7	4.7	4.0
BR 1518	4.4	2.7	3.3	5.7	3.9	3.1	3.2	3.3	3.2	4.7	3.3	3.7	3.6
LSD VALUE (*0.05)	1.1	1.5	0.9	1.1	0.6	0.6	0.8	0.8	0.7	1.0	1.4	1.3	0.5

*To determine statistical differences among cultivars, subtract one cultivar's mean from another cultivar's mean. Statistical differences occur when this value is larger than the corresponding LSD value.