and overseed either with seed spread by means of a drop spreader or by hydroseeding. Another alternative would be to aerify a green, scarify the surface with a vertical mower (which would also break up the plugs) and then to overseed. Some people might find that they would have better success if they overseeded first and then used the aerifier and the scarifier. Another procedure might be to use the aerificationscarification-overseeding operation plus a top dressing. If top dressing is used you would have to be very careful that you didn't bury the seed too deeply.

It is important to note that aerification will be particularly important in situations where kill was caused by gas exchange problems. Aerification will allow the toxic materials to dissipate faster and for the soil situation to improve rapidly.

If you select Penncross as the bentgrass that you want to establish on your greens, an overseeding rate of 1/2 pound of seed per 1,000 square feet is suggested. If Seaside bent grass or Emerald bentgrass is selected, you may want to use a pound or a pound and a half per 1,000 square feet. If the seed is to applied dry, there is little problem when you apply it, either before or after the aerification, scarification or spiking. However, if you intend to apply the seed wet, that is through your sprayer, then it would be best applied after you've completed preparation operations. For those superintendents who have irrigation available at this time, it might be useful for them to consider soaking their seed overnight or until the seed is swelled. By doing this you may gain several days in the germination process. However, you must be very careful that once the seed starts to germinate that it has a continuous supply of moisture until it becomes fairly well established.

You may want to consider using a half a pound of actual nitrogen per 1,000 square feet in the form of a natural organic fertilizer or a non-buring type fertilizer after overseeding to insure an adequate nutrient supply for the new developing seedlings. Of course, you will want to keep people off these overseeded greens during rainy or wet periods.

It may be useful for you to let the membership of your club know what you're trying to do before taking on the task of converting greens to bentgrass at this time. It probably would be useful to let them know what to expect and that the greens will green up later in the spring.

I would like also to suggest that you take pictures or slides and keep records of what you do and how the treatments work out. It may even be useful then for some monthly meeting or to set aside some time at the annual meeting to exchange information, to show slides of before and after and to discuss the successes and failures of all your operations.

Good luck and best wishes for a good year. If I can help, don't hesitate to call. Thank you. Bergerson Caswell Inc.

CDGA GREEN SEMINAR

We have an interesting agenda planned with Rees Jones, golf course architect, the featured speaker and the following topics:

Re-Shaping of Greens & Re-Contouring Fairways Tri-Plex Mowing of Fairways Sand Top-Dressing of Greens Turf Research Update: Local & National Award Presentation to the Bull Sheet

We look forward to seeing you on April 5th, Tuesday, at Butterfield C.C., for the Chicago District Golf Assoc. annual Green Seminar.

David L. Amory, Chairman CDGA Green Committee

PRESAN DEMONSTRATION

SITE - No. 4 Fairway - Bent, **Poa**, Ryegrass - 44,000 sq. ft. DATE OF APPLICATION - April 28, 1982

TYPE OF APPLICATION - 400 gal. John Bean with 3/4 KLC 108 Field Jet Nozzle

- Standing pressure 125 psi
- 60 gal. H²0 per acre
- Nalco Trol Drift Retardant
- Watered in product immediately.

NOTE - No. 4 Fairway has a history of crabgrass, both smooth and silver. It is inadequately drained and has little to no air movement. This application was 100% effective in control of smooth crab and even though the rate was not conducive for control of silver crab the population decreased considerably. My plans at present is to treat this fairway again next year using a higher rate in hopes of inhibiting the rest of the silver crab.

I took the remaining pint of PRESAN and sprayed half of my No. 14 green (2860 sq. ft.) at 5.6 oz. per 1000 sq. ft. For the past 3 years the silver crab population has grown to be a bit of a problem. This year I dug out only about half a dozen plants. I will treat this green again next year and hope for 100% control.

> D. L. Godke, Business Manager Speciality Agricultural Products Mallinckrodt, Inc.

DUOSAN DEMONSTRATION

SITE - Tees - Bent, Poa - 55,000 sq. ft.

DATES OF APPLICATION - June 4, 1982; June 22, 1982; July 6, 1982

RATE OF APPLICATION - 3 oz. per 1000 sq. ft.

TYPE OF APPLICATION - 400 gal. John Bean Sprayer - Hand gun

- 51/2 gal. H20 per 1000 sq. ft.

- Standing pressure 125 psi

NOTE - Initial application was to be made during the week of May 3rd but due to weather conditions unfavorable for disease development first application was not made until June 4th. At this time there was a slight infestation of leaf spot on bentgrasses and some dollar spot. This application and a drying, warming weather trend checked the leaf spot and showed good control of dollar spot. June 22nd application once again showed good results on dollar spot but on June 29th activity began, especially on tees with a higher percentage of bentgrass which, of course, have a bit more thatch build-up. Even though the disease was spreading we waited until July 6th for the next application. At this time we had sprayed fairways for dollar spot control with a combination of 1991 and Daconil Flowable and saw excellent results. The July 6th application seemed to check the spread of dollar spot but had no curative action on the disease that was present. On July 12th the disease again began to spread and on July 14th we made an application of Chipco 26019 at 11/2 oz. per 1000 sq. ft. Even though I have used very little systemics on my tees in the past 6 years I must conclude that I have a resistant strain of dollar spot. From my findings, I feel that I would use Dousan in my overall pesticide program but isolate its use to Spring and Fall applications when I can get good leaf spot control and some dollar spot control.

> D. L. Godke, Business Manager Speciality Agricultural Products Mallinckrodt, Inc.