



Harold West is shown with a portion of the fleet that he operates at Tualatin CC.

## Pro's Repair Knowhow Keeps Cars in Service

**Daily check with hydrometer prevents mid-course breakdowns due to battery failures**

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**A**lthough I don't consider myself an expert on the subject, I am going to pass on a few electric golf car maintenance tips which I have gathered while serving as both a car owner and a lessee ever since golf cars were introduced to the Pacific Northwest.

Our operation at Tualatin is small compared to many of the larger clubs where a pro may have nothing to do with the

car operation. In the Northwest, pros who have to take care of 25 to 50 cars either have to learn about their operation or hire help, which most can't afford. Our programs are not seasonal as they are in the Midwest or East. During the winter, play falls off, but we still have to stay open 12 months a year. That means more car wear and tear, a large item in the budget if you have to hire expensive labor to take care of it.

Our membership prefers electric cars because it is believed that they are better adapted to our flat, gently rolling course. On a hilly course, gas-driven cars may be better suited.

I was fortunate when I came to Tualatin because the cars were in fine shape. Under our leasing arrangement, the supplying company replaces a few cars with new ones each year and thus good fleet quality is maintained. We also are fortunate to have an expert repairman living within two miles of the club who does major repair work for almost all the clubs within 100 miles of Portland.

## Learn About Maintenance

Even if the pro or whomever is responsible for the car does have such expert help nearby, I believe he should learn everything he possibly can about car maintenance. I have found it advantageous to learn how to do most of the minor repair work so that no cars are out of service longer than is absolutely necessary. If the pro has learned his lessons well and anything should go wrong with a car on the course, it can be fixed immediately. Or the member can be given another car without delay because spare cars are available and not out for repair. There is nothing worse than to have a mid-course car failure traced to the pro's negligence or lack of knowledge.

On one unhappy occasion I sent two cars out and they both went dead after six holes. Upon investigating, I found that the electricity had been cut off shortly after the cars had been plugged into the charger and actually hadn't been charged at all. From that experience I have made it a point to use a hydrometer in checking the batteries each morning. Not a single car goes out of the garage without a hydrometer check. I haven't had a battery failure on the course since adopting that policy.

## Check New Batteries

Whenever I get a new set of batteries or new cars, I charge them for about three hours after they have gone 18 holes, continually checking them until they reach a 1250 reading. When they reach that point, they are capable of going as much as 36 holes. In the car room I have a chart on which I enter the number of hours of charging each car requires. This chart shows all important information pertaining to my cars, including the date I acquired them, what work has been done on them, the dates the batteries were purchased and how often they require water.

## Work Is Laid Out

The advantage of an organized schedule like this is that you are assured that all important jobs will be done by your car man or assistant even when you are not there. I have two assistants and a pair of shop boys who are familiar with the up-

keep of our cars. When I am not around, all they have to do is consult the schedule to determine the amount of hours each car has to be charged for the distance that is needed, and what other care the car needs.

In addition to surveillance of battery conditions, a good car maintenance program requires that battery cables be checked frequently to be sure they are firmly fixed on the terminals. A light touch of grease should be applied once a month to the copper resistors so that the switch can move freely across them.

To prevent corrosion, I use Karode Kure on all battery terminals and cables as I install the batteries. A light coat usually is sufficient for the life of the battery.

Cars should be greased every six weeks and the tire pressure should be checked at least once every month. We find it convenient to have a compressor for this job, rather than a hand pump. In summer-time batteries have to be filled every week while in winter the interval may be extended to about three weeks.

Every time the battery is filled, the car should be washed thoroughly. We also hose off the car as well as the battery every other time it goes out, to keep off acid. We use Cora-Guard once every three months on the battery racks. If you don't maintain a constant fight against acid, it soon will be eating into the racks and everything that comes in contact with it.

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## USGA 16th Girls' Junior

The USGA Girls' Junior Championship is to be held at the Leavenworth (Kans.) CC, Aug. 10-15. Entry applications must reach the USGA office, 40 East 38th St., New York, N.Y. 10016 by July 24. Girls who have not reached their 18th birthday by midnight of August 15, 1964 and who have handicaps not exceeding 36 strokes under the USGA handicap system are eligible for entry. The USGA has no requirement as to club affiliation for Junior golfers competing in USGA tournaments. The field will be limited to 140 players selected from the low handicappers submitting entries.