

ADVANCED TECHNOLOGY IMPROVES FAIRWAY MOWING

by Richard Bishop

The mowing of fairways up to around 20 years ago was almost invariably carried out by trailed gangs. The trailed gang still performs this function on many fairways both in the UK and in the rest of the world and, to their credit, in most cases give an acceptable finish. However, since the introduction of powered gang mowers in the early 1970s, and more recently the introduction of self propelled ride-on gang mowers, the Course Manager can provide much more than just an "acceptable" finish. He can provide, with the help of modern equipment, fairways which are maintained to a very high standard and evenly cut no matter what the terrain, as well as

the front cutting units before the driving wheels rolled the grass down.

The introduction of the Hydraulic 5/7 was a major step forward, but there were problems associated with cutting fairways; the unit had been designed primarily for local authority and contractor use. In short the standard offered was not high enough for the typical golf course fairway.

The breakthrough came in the mid-1970s with the introduction of the floating headed unit. Development of this started mainly because of the problems that George Brown (now course manager at Turnberry) had at

Since those days development has continued and there is now a wide choice of fairway mowers with powered cylinders for the Course Manager to choose from. Most units are hydraulically powered but there are also some with mechanically driven units, frequently belt-driven. There have also been machines with cutting units driven electrically, but for a number of reasons that idea never did catch on. The choice of equipment has been widened in the last few years with the introduction of ride-on self propelled machinery. Whether these machines are triples originally developed for tees and surround work, or the larger purpose-built 5 unit machines, they do have the advantage of being very much more maneuverable. In most cases they also have the option of grass collection; a feature which is becoming increasingly necessary with the continual improvement in the standard of fairways.

The most up-to-date method of cutting fairways is with the lightweight 5 unit ride-ons developed from greens triples. As is so often the case the idea has emanated from the USA and has much to commend it. All the major manufacturers have such a machine in their range and this year I know will see a great deal of activity with the promotion of these machines. They are, of course, particularly suitable for conditions where low ground pressure is of importance. Being developed from triple greens mowers, they also have the ability to give a very high standard of cut which can be improved even further with the addition of Verti-Groom reel. Verticutting units can also be fitted where appropriate, although this is not a new idea as many of the current machines have the ability to change from conventional cylinder units to verticut heads. So, the last 20 years has seen a dramatic change in the methods of cutting fairways, and I would hazard a guess that change will continue to occur at what could be described as an alarming rate. There is one thing for certain, and that is that any person involved in the purchase of fairway mowing equipment has a very wide range of types of products and manufacturers to choose from. Whether trailed gangs, mounted gangs, triple machines, 5 unit ride-ons or the very latest lightweight 5 unit machines are preferred, there are machines available to suit each and every application.



Pictured cutting a fairway is a Ransomes Hydraulic 340TG trailed gang mower with 8-knife floating head cutting units

aesthetically pleasing. Perhaps the last point regarding aesthetics is not one at the top of the Course Manager's priorities but, with the increasing interest in golf as a spectator sport, particularly on television, aesthetics does have a part to play.

Changes in fairway mowing, particularly in the UK started with the introduction of the Ransomes Hydraulic 5/7. This unit, still in production today in a modified form, was mounted on the 3 point linkage, had cutting units positioned in front of the driving wheels and had the benefit of hydraulic drive to the cutting units and hydraulic lifting and lowering of the cutting units. For the first time, cutting could be carried out no matter what the forward speed of the tractor because the cutting ratio or cuts per yard was infinitely variable by use of the engine speed and gears. Another important feature was that grass could be cut by

Princes Golf Club in Sandwich, Kent with his Hydraulic 5/7. Anybody who knows Princes Golf Club will understand that the severe undulations on the fairways were impossible to cut without either "scalping" on the ridges or leaving long grass in the hollows. The problem was that the cutting units, although being able to articulate around the pivot point from side to side, could not articulate up and down around the pivot point to enable the unit to follow ground contours. The result was, as previously said, long grass being left in the hollows and ridges being "scalped". To overcome these problems Ransomes development engineers worked closely with George and came up with the floating head unit. The floating head concept these days is not out of the ordinary, but 15 years ago it was very much ahead of its time as far as fairway mowing was concerned.