It was a day for celebration when the greenkeeping staff looking after St Andrews' Old, New and Jubilee Courses moved from their 40-year old sheds into the new Jubilee greenkeeping centre during the first week of April 1997.

Fourteen months earlier, the staff responsible for the Eden, Strathclyde and Balgove Courses at St Andrews had said goodbye to their colleagues prior to moving across the links to the new £525,000 Eden greenkeeping centre, described then as the best facility in Europe.

While it continues to set a very high standard, the Eden has been joined on St Andrews Links by a greenkeeping centre which can claim to be the equal of any in the world providing combined greenkeeper accommodation, equipment storage and workshop maintenance facilities.

Costing almost £885,000 for its site works and construction, the Jubilee sheds and associated parking area and roadways, soil, fuel and chemical stores and wash bays cover almost 1.5 acres (0.58 ha).

The main building comprises a long span portal frame structure measuring 220ft by 84ft (67m by 25.5m) and topped by a shallow curved roof clad in double skin insulated aluminium sheeting. By combining a low eaves height, a soft roofline and a light green colour for the exterior of the building, architect Fraser Smart has minimised the sheer mass of the construction which covers an area of 21,268 sq ft (2,014 sq metres).

Surrounded by high soil embankments which have now been seeded, the complex is barely visible from the town and the three courses it serves, minimising the effect on the natural landscape and fulfilling the initial requirements of the St Andrews Links Trust.

The Jubilee Greenkeeping Centre under construction last year: Staff facilities and administration wing are laid out on two floors at the southern end of the building.

**Sheds heaven**

Contained within the building is 11,774 sq ft (1,115 sq m) of storage for greenkeeping equipment and buggies, a 6,463 sq ft (612 sq m) staff, administration and storage wing and a 3,031 sq ft (287 sq m) workshop and store.

Although work benches are provided within the main part of the building for use by greenkeepers for the setting up of cutting units and other daily maintenance, the workshop within the Jubilee building is equipped to carry out all of the major service and repair work on the tractors, mowers and other course machinery used across the whole of St Andrews Links.

Managed by George McLaren with a team of three engineers, the workshop is responsible also for the irrigation equipment installed on the single nine hole and five 18 hole courses administered by St Andrews Links Trust.

With 28 years experience behind him, George knew exactly what he needed in his new workshop and worked closely with the architect on its internal design.

"Health and safety considerations were a primary factor behind the layout of the workshop," he explained. "The area is sufficient to allow each engineer to have his own portable hydraulic bench for working on engines and smaller items of equipment. Although there is no wasted space, there is no clutter either. If a machine is waiting for a part then we have the room to work around it or park it in another part of the building."

Originally, the workshop was planned around two hydraulic lifts - a four poster for four-wheeled vehicles and a Heftey unit for the three-wheeled mowers and Cushman turf maintenance vehicles. Space considerations and the discovery of a 4 tonne scissor jack unit capable of lifting all wheeled machines apart from the digger provided a valuable cost-saving investment.

"In the past, we had to use axle stands if we needed to get beneath a tractor or mower," commented George. "The scissor lift is proving a great piece of kit, lifting to full standing height and folding flush with the floor when not in use."

Apart from the main workshop, ...
The aim was to create a modern workshop incorporating a level of skills and facilities capable of maintaining to a high standard all of the machines used on St Andrews’ five and a half golf courses.

George and his team have separate areas for machine cleaning, cylinder grinding, welding and parts storage. They also have their own lockable store for hydraulic fluids and special oils. “If someone other than the workshop needs hydraulic fluid then it means that the machine has a leak and we need to know about it,” pointed out George.

Two external covered washbays are located adjacent to the rear door of the workshop. One is connected to a grass interceptor, the other to an oil and diesel interceptor, providing totally separate cleaning facilities to suit the machine and its condition. There is also an internal wash area linked to the oil and diesel interceptor for cleaning engines and related components.

The grinding room is located behind a lockable internal door and contains two machines – a combination cylinder and bottom blade grinder and a sole-purpose bottom blade grinder. Although quiet during the summer, this area will be in constant use during the winter months restoring a keen edge to the many greens, tees and fairway mowers responsible for maintaining the 99 holes of golf and golf practice centre laid out on the links at St Andrews.

Gas, MIG and electric arc welding equipment are housed in a separate bay adjacent to the main workshop, together with an electric saw, pillar drill and hand and pillar grinders.

Having been able to design the area literally from the ground up, George was keen to include a number of important elements within the finished workshop. These include ample electrical sockets (10 double sockets at 3m spacings) and compressed air outlets (nine), good lighting (a combination of sodium and tungsten elements), efficient ventilation (four piped exhaust extractors plus three wall fans) and a floor-standing mobile hydraulic crane.

The parts store is divided into two sections – one for course maintenance machinery, the other for the irrigation equipment looked after by George McLaren’s assistant, irrigation engineer, William Redpath. Within the two stores are held sufficient parts for all scheduled service requirements as well as emergency replacement items to cope with breakage or wear. The workshop can also make up its own hydraulic pipes and has pressure test equipment for diesel fuel injectors, radiators and hydraulic circuits.

“The aim was to create a modern workshop incorporating a level of skills and facilities capable of maintaining to a high standard all of the machines used on St Andrews’ five and a half golf courses,” pointed out George McLaren. “We will call on the dealer or manufacturer for specific training, advice or help but the principal contact comes when ordering parts for routine servicing or repairs.”

The day to day operation of the workshop and the machinery passing through it relies on close liaison between George and the greenkeeping staff, with priority being given to breakdowns or urgent repairs. When a regular service has been completed, a sticker is placed on the machine stating when the next service is due. It is then the greenkeepers’ responsibility to let the workshop know when the item is approaching the designated service time.

Because each of the courses at St Andrews has its own fleet of machines, it is a relatively simple matter to apportion the workshop labour and parts costs for every machine to its specific course. In addition to enabling a close eye to be kept on overall machinery costs on each course, the completion of a log book for every major piece of equipment ensures that recurring problems or high running costs (and vice versa) are noted and acted upon.

The improvement provided by the new workshop over the previous facility is, says George, like comparing day with night. He particularly appreciates the high level of security and the fact that the two roller shutter doors can be opened only from the inside of the building. Initial entry to the workshop is gained through a personnel door leading from the main machinery store – and that door is located adjacent to his office window from where George can keep a close eye on the daily comings and goings of people and machines.