# On yer Bike!

Roland Taylor looks at the range of utility vehicles which you ride on rather than in



On average courses the amount of time travelling from A to B, over a 12-month period, can be considerable. When looking at ways of making an operation more cost-effective, any machine that can reduce this unproductive time is worth consideration. ATVs fall into this category. Their benefit lies in the fact that they can virtually transverse any terrain. This makes it is possible to reduce the distance between sites thus increasing the time spent on the job.

A wide range of attachments is available and these increase the machine's versatility. One example is a sprayer attachment. An ATV fitted with this particular unit is fast and lightweight; therefore it can be of considerable benefit to any course.

Unfortunately, these little workhorses often get a bad press and are considered by many to be more for leisure than as a worthwhile addition to a fleet. Amenity contractors and those who operate them on golf courses and farms tell a different story.



## KAWASAKI

The line up for 2004 includes five models with horsepower from 16hp to 47hp. Top of the range is the KVF 7000-A, which has a liquid cooled 4-stroke engine. The transmission is through the Kawasaki's own automatic power drive system, which they claim enables the operator to choose easily between high and low, or reverse gears. Two or four-wheel drive includes a variable front differential lock, which is selected through an electrical system. The braking system incorporates, engine brake control with speed sensor, twin front discs and rear enclosed multi-plate units.

Loading capacity is rated at 40kg for the front rack and 80kg on the rear one, plus the KVF700 has a towing capacity of 567kg.

At the other end of the Kawasaki range is the 19.2hp KLF 300B-A. This machine is said to be highly manoeuvrable with the tightest turning circle in its class. One of the reasons for this, is a dual-mode lockable rear differential. It is also claimed that because of the machine's light steering, low speed turns can be executed on soft surfaces with minimal damage to turf. A lever under the seat operates the differential. The transmission is semi-automatic with five speeds plus reverse. When it comes to towing, this ATV has a capacity of up to 317kg and is capable of carrying a total of 95kg on front and rear racks.

# YAMAHA

The big ATV from Yamaha is the Grizzly 600FWA with a 660cc five-valve engine. This machine has automatic transmission and a button on the handlebars engages either 2WD or 4WD. An on-command differential lock provides extra traction when needed. The unit has an independent suspension system and hydraulic disc brakes are fitted to both front and rear wheels. The Grizzly has a ground clearance of 275mm and the capacity to carry up to 130kg and tow 550kg.

A newcomer to the range is the Kodiak 450F WAN, which will pull loads of up to 500kg. Its transmission and braking system is similar to the Grizzly's. Other features include an LCD instrument panel and a 12-volt-power outlet.



### HONDA

During the summer of 2003 Honda announced the arrival of two new quads, the TRX400AT and the TRX650.

The TRX 400 is a mid size multi-purpose machine with a longitudinally rubber mounted 397cc air-cooled engine. This has a dry sump and heated carburettor for easy starting and running even in very cold conditions.

The automatic transmission gives continuously variable speeds through electronic controls. There are direct front and rear drive shafts with a torque sensing limited slip differential fitted at the front. An electronic thumb switch selects either 2 or 4-wheeled drives. Utility racks and towing point are fitted as standard.

Announced as the biggest Honda machine to date, the TRX650 has automotive style transmission plus a hydraulic torque converter, which incorporates three independent clutches. Through the column style gear lever, drive, neutral or reverse are selected and a button operated Electric Shift Programme (ESP) lets you choose transmission ratios. The Traxlok System enables the operator to select either 2 or 4-wheel drive. A torque sensing front differential is said to lighten steering thus making the machine easy to handle.

As can be seen from the specifications of all the machines mention, there are a lot of basic similarities between makes with each manufacturer adding their own extras. There is one common aspect that encompasses all makes and models of ATVs - safety

The publicity surrounding a recent pop stars accident involving an ATV once again highlights the importance of using any machinery correctly and safely. Every mechanical device ever invented can cause an accident if it is used incorrectly or unnecessary risks are taken. ATV's are no more dangerous than any other form of transport, but unfortunately when celebrities get injured the media tends too overplay the situation.

There are guidelines laid down by the Health & Safety Executive and operators need to study these closely and ensure they are implemented.

HSE research has shown that there are a number of reasons why accidents occur some of these include:

- · Insufficient training and experience in operating a machine.
- · Travelling at excessive speed, especially on uneven terrain.
- · Carrying passengers or unbalanced loads.
- Pushing the ATV beyond its limits on a bank, ditch sides, fallen timber or excessively uneven ground.
- Attempting to drive up or down too steeper slopes.
- Towing overloaded trailers.
- · Using trailers, which have no braking system.

When you analysis all these points a key factor is using commonsense, this means adjusting to the prevailing conditions and the type of work being carried out.

It is important to note that it is a legal requirement of employers to provide sufficient training under both the Health & Safety at Work Act of 1974 and the Provision and Use of Work Equipment Regulation 1998 (PUWER).

Under PUWER only employees who have received training should ride ATVs. This provision also applies to any towed attachments or equipment fitted to the machines.

The advice on HSE Agriculture Information Sheet No 33 states that head protection is vital. Over 50% of fatalities involving ATVs in the last five years have been due to head injuries. Readers are also encouraged to read the HSE information sheet on ATV towing ratios.

If you are thinking of purchasing or already have an ATV the HSE website is worth visiting. This can be found at www.HSE.gov.uk. On the left hand side of the entry page is a search facility, type in ATVs and press go. A list of recognised training courses that cover safety and maintenance can also be found on this site and it is strongly recommended that users take one of these.

The ATV can be an important vehicle in a machinery fleet, especially for those courses that cover a large acreage that has steep and uneven terrain; large areas of dunes; heath; moors or woodland. It will certainly earn its keep in transporting personnel and materials quickly and efficiently around these types of courses and if used correctly it is no more dangerous than

other equipment in the machinery shed.

One of the failings of many of us is that we do not thoroughly read the instruction manuals, especially the sections dealing with correct usage procedures? As a New Year's resolution for 2004, albeit a bit late, let's study our equipment's instruction manuals carefully, who knows, we might get more out of our machines and make them safer to use.

#### SUZUKI

A 493cc liquid cooled engine powers the Suzuki Quad runner LT-A500F. The transmission is automatic with selectable two and four-wheel drives. A manual version of this particular ATV is also available.

The rear suspension is made up of a 4-linked rigid axle with coil springs. It is oil damped and preloaded with 5-way adjustment. Towing capacity is 410kg

The Suzuki Eigers come with a choice of either the company's own Ouadmatic fully automatic, variable transmission, which includes an engine brake, or a five-speed manual box. Both versions include 2 or 4wheel drive and high/low gear ranges.

Power comes from a 376 cc four-stroke engine that has an overhead cam and four valves. These feature are said to provide good low end and mid range torque. Suzuki's cooling system passes a high volume of oil through the cylinder head from a cooling reservoir. This has a thermostatically controlled electric fan to keep the liquid at the correct temperature. The unit is capable of pulling loads up to 450kg.

#### MASSEY FERGUSON (AGCO) LTD

The MF500/4A TBX is the big machine from Massey Ferguson. Power is supplied by a 493cc liquid cooled Suzuki engine, which develops plenty of torque at low revs. This is said to make it ideal when towing and for maintaining a constant speed for spraying.

The machine has a large rustproof box over the rear axles, which will carry up to 134kg. This box can be tipped via a lever, which is sited at the side of the operator's seat.

A main feature of the machine's carrying abilities is a Multi Rack Platform. The concept of the system is open channel racks both rear and front into which slide in accessories can be easily fitted. This enables the TBX to be tailored to ones specific transporting requirements. Massey



▲ Massey Ferguson (AGCO)

Ferguson claims that their ATVs are the first of their kind to be fitted with this type of system. In addition to on board loading the TBX is capable of towing loads of up to 477 kg.

The MF AgTV range consists of six models from 280cc to 493cc. All models have two or four wheel drive with the exception of the smallest the 300/4, which only has four-wheel drive and fifteen manual forward and three reverse gears. The other models are available as either manual or automatic transmission versions.

All machines have good ground clearance and all-round suspension with a traverse of sixteen inches to provide as smooth a ride as possible over rough terrain.

The MRP system will fit all systems so clubs looking for a medium size ATV can match the carrying facilities to their requirements.

