1/10 Scale Racing Buggy

It is rare these days for the term 'new' to be realistically applied to a 1/10th electric off road car. Very often a 'new' car is an update and revamp of the previous model in the manufacturer's range.

The Kyosho Progress 4—WDS, however, does fall into this 'new' category, as not only is it a new design, it is also the first car in the UK to incorporate rear wheel steering. This works and works well, giving an improved turning circle without the need to have excessive steering lock on the front wheels.

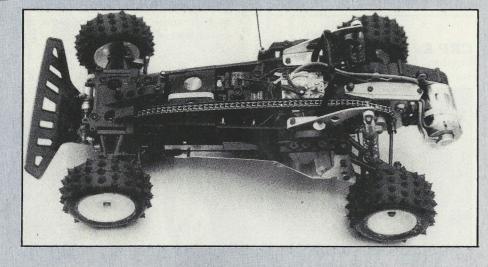
Chassis

All new in design, this utilizes an alloy rear pan on which the gearbox and motor assembly are carried and to which the plastic front suspension sub frame is attached.

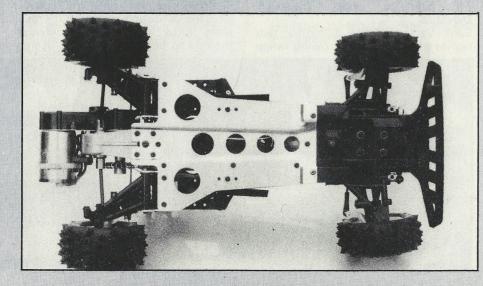
The alloy pan is thin and lightweight and the chassis rigidity is achieved with a nicely moulded plastic radio tray that acts as the upper chassis member and neatly houses the radio equipment.

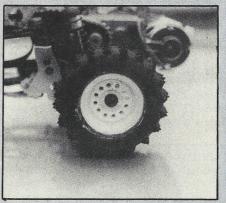
Front Suspension

Again all new in design, the front suspension uses moulded upper and lower wishbones, these should prove to be a lot more durable and give greater reliability than Kyosho's metal units. The suspension is sprung by two flat torsion bars that can be quickly and easily adjusted to suit track conditions. A nice touch on the two suspension wishbones is a small connecting link to prevent the wishbones 'popping' out of the ball type steering swivels.

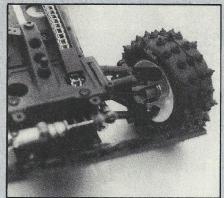


Top and bottom view of the Progress rolling chassis showing the neat, well thought out design. It should prove to be both competitive and reliable.





Both front and rear wheels use a low profile spiked tyre that is new to the Kyosho range.



obois

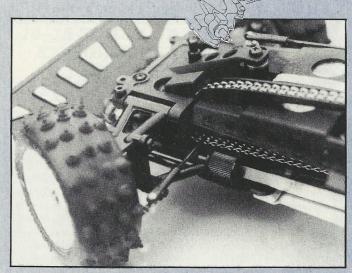
Rear Suspension

Kyosho have retained a trailing arm system though it now uses an upper and lower arm between which the rear wheel steering mechanism pivots. Again a high grade moulded plastic is used providing strength and durability.

Drive System

The motor is the ubiquitous Mabuchi 540. A redesigned gear train drives the rear wheels via ball and socket equipped shafts and a lay shaft hauls the front wheel chain drive. A differential is standard on the rear axle while the front drive system uses one way bearings in the front wheels. A system that works well and provides satisfactory handling.

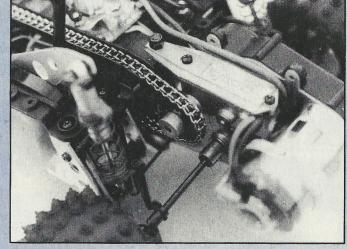
The chain drive is easily adjusted using a tensioner attached to the upper chassis member and to prevent snagging the chain runs in a protective tray underneath.



Above. Upper and Lower moulded plastic wishbones provide the front suspension.

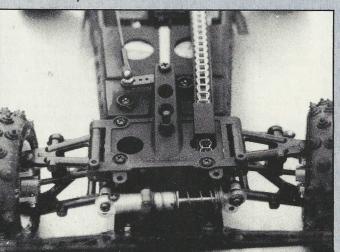
Left. Springing is achieved by the use of an adjustable strip torsion bar.

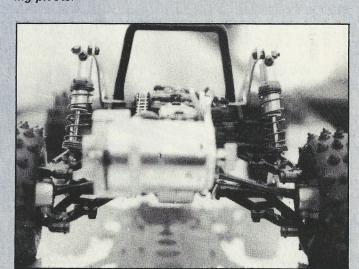
Below. Front suspension detail showing drive shafts and monoshock system.

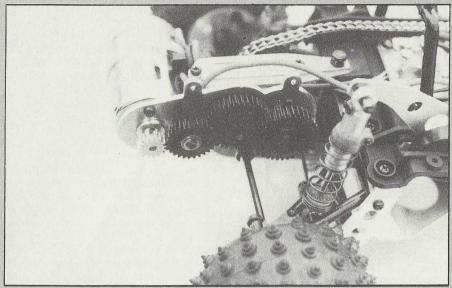


Above. Four wheeldrive uses chain to the front wheels driven by layshaft from the gearbox.

Below. Rear suspension detail. Note usual shock absorber system using two units and the unusual near wheel steering pivots.

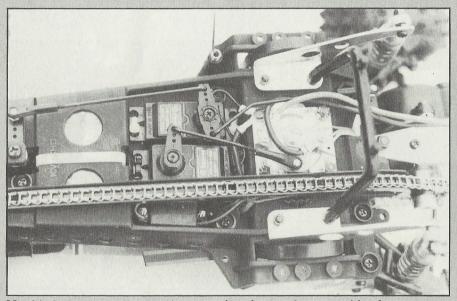






Drive gear train with the cover removed, note wide mesh gears for strength and ease of access to replace gears/ratio.

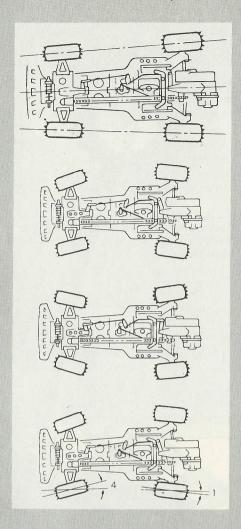
Right — diagram showing the front wheel steering system.



Moulded plastic radio tray/upper chassis member provides for very neat radio and speed control installation.

The Kyosho progress in race trim and ready to go. The kit bodyshell is attractive and made from clear polycarbonate for strength, and just waiting for that concourse paint job.





Shock Absorbers

The Progress uses three shocks in all, a single in monoshock mode at the front and independents for each wheel at the rear. The design is much the same as Kyosho's previous units using coil springs that are easily adjusted with adjustable collars to give quick and precise tension changes.

Conclusion

We have not yet had time to put the Progress through its paces nor compete with it against some of the tough opposition that's around (this will come later) but in the time that we have had to make an assessment we are very impressed.

When we first heard about the four wheel drive and four wheel steering, our first thoughts were that it was unnecessary and perhaps just a gimmick. Now having looked at this car and driven it, we admit we were wrong. A problem with 4 x 4 cars is that the steering lock can be restricted due to the front wheel drive system, but with the ability to steer rear wheels greatly improves the steering without excesive lock.

The general finish and presentation of the kit is good and the Progress should soon be making its mark in time for the 1985 season.

Distributed by Ripmax Models and priced at less than £120.