

# PEGASUS

**KYOSHO**  
THE FINEST RADIO CONTROL MODELS



## Kyosho's latest high flyer slots in neatly between low performance budget racer and competition supercar. Hazel Peacock finds out

### Initial Reaction

The 'Pegasus' is packaged in the glossy boxed style that one has come to expect from *Kyosho*, and, on opening the lid, the contents are immediately on display.

The bodyshell is of the now widely familiar lexan form (complete with wing and driver figure). The motor, speed controller and tyres are laid out on an internal card divider, suitably blister packaged and the major plastic parts, wheels, suspensions etc., packaged in individual plastic bags. (The major parts are still mounted on their moulding sprue — each item numbered and each sprue lettered — to make

identification virtually foolproof). All the minor parts, nuts, bolts, washers, etc. are also packaged in individual bags, suitably numbered and lettered, and fully identified. It is advised to leave all the parts in their relative labelled bags until each individual part is needed. What I did like were the pages in the instruction book that show each bag and pack contents, laid out in such a way that even the rawest beginner should have no difficulty identifying the parts.

A lot of effort appears to have gone into both the kit and the instruction book to smooth the way for the novice, even to the extent of a recommended list of

tools needed to complete the model.

### Assembly

Without the facilities of a fully equipped workshop (unnecessary anyway), assembly of the 'Pegasus' began on the dining-room table with the limited hand tools recommended. Even then there were no real snags to the assembly. The sequence of assembly seemed almost logical (I say almost, for it seemed unusual to fit the radio in place before the rolling chassis was completed!). Nevertheless, I followed the instructions and have to admit that everything did go together

in exactly the way predicted and there is absolutely *no* need to deviate.

The first step in the assembly concerns the motor, gearbox and rear frame. The gearbox and differential unit is trapped between the two moulded outer halves of the gearbox casing. Plastic bearings are supplied for all shafts and, with the exception of the brass motor pinion, all gears are also plastic.

The instructions show how either an 18-tooth or 19-tooth pinion can be fitted to the motor and alternative motor fixing holes are provided. An RS540 motor comes in the kit. We have become accustomed to the RS380 being fitted to the cheaper, beginners models. *Kyosho*, however, feel differently and when compared with other similar machines, the 'Pegasus' will obviously have the edge on speed.

Completing the 'back end' involves fitting the gearbox assembly to the rear of the moulded ABS 'bath tub' that

forms the central chassis and radio equipment box, adding the spring/shock absorbers and rear axle components.

A couple of points about the rear axle and suspension system struck me as peculiar. Only the final rear stub axle is metal. The floating drive-shafts are plastic and feature a 'four-eared' drive spline at each end. My first reaction is that they would do better in metal! However, it must be stated that they *do* work!

Talking to other R/C car enthusiasts revealed that metal and plastic have both been tried in this situation and many would support the argument that the plastic shafts can flex to absorb abnormal load and that, given the right sort of plastic, the coefficient of friction is lower leading to improved performance.

The rear swing arms are a *one-piece moulding*, the pivot not being a pin-in-a-bearing that we have all come to expect, but being an undercut in the moulded plastic.

The rest of the rear suspension holds no real surprises. Coil springs over friction shock absorbers are traditional, although when greased they were slippery to the state where three pairs of hands would have been a great help. The upper brackets for the shock absorbers (another excellent plastic moulding!) are not fitted exactly fore-and-aft as I have seen elsewhere, but angled out slightly which appears to create a slightly better suspension geometry.

So much for the rear end. Putting the radio equipment in is the next major step. Virtually any radio would fit (although one suspects that *Kyosho's* own is shown in the diagram). I found that our chosen equipment dropped neatly into the space allotted to it.

The servo-saver was fitted to the steering servo as shown, but needed strength to cope with the stiff plastic spring.

Front-end next and here too, the 'living hinge' is fully exploited. Again, spring over friction dampers assist and no real assembly trouble was encountered. A couple of problems did arise, one of my own making. Reading the instructions incorrectly caused me to use the wrong type of nut to secure the stub axle, resulting in the fact that there was no nylon locking nut to retain the front wheels at a later juncture (soon put this one right!). The other point was, as with the servo-saver, slightly more force was needed to do up some of the screws and nuts as tight as was needed. It is essential here not to overtighten as this can cause the threads to strip.

Both self-tapping and machine screws are driven directly into the plastic during various stages of assembly. Some screws allow a decent size screwdriver to be used with the resulting ease of tightening.

Other, smaller screws, 2mm dia. (referred to as M2) for example, benefit from the use of a watchmakers type of screwdriver. Having a much smaller handle it's difficult to get enough purchase to drive the screws fully home. I would think that most adult males could manage alright but the 10-12 year-olds might well need a bit of help from Dad!!

With the front suspension fitted to the front of the 'bath-tub' and the wheels on we were now in a position of 'Go'. At this stage I learned to my horror that the 'Pegasus' was fast!!! (furthermore it had no respect for the furniture) and that it is better suited to the great outdoors! So, putting it away 'till tomorrow', I worked on the body shell.

This requires only the minimum amount of trimming prior to painting and is best done with a pair of manicure scissors as shown in the diagram.

I brush painted the inside with white *Humbrol* upholstery paint (I know from previous articles that this works on Lexan — although other paints are equally satisfactory!). Colour trim was applied to the outside with the self-adhesive vinyl stickers supplied, and matt black tape used to outline the windows.

### Overall Impressions

A well packaged kit, well presented with materials quality as good as one could expect.

I enjoyed building the 'Pegasus', it only took a few evenings and should be within the realms of virtually anybody. I found the instructions to be first-class and particularly liked the parts cross-reference (making the letter/number of each part abundantly clear!). Some parts are even stamped L&R where they are handed — really Idiot proof!

At the rear of the instruction book is a guide to correct driving, tuning the suspension, routing maintenance, and trouble-shooting, all invaluable to the beginner.

In addition there are optional accessory packs comprising Oil-filled shock absorbers and ball races for front and rear wheels and gearbox shafts.

**Manufacturer:** Kyosho, Japan.

**Importer:** Ripmax Models, Enfield, Middlesex.

**Price:** Approximately £40.00.

Below left: front suspension utilises double wishbones and coil spring dampers. Below right: rear-end showing nylon trailing arm and drive shaft. Bottom: access to the battery pack through chassis hatch.

