

Calling this a kit review is rather like describing a test of a Ferrari 'Testarossa' as a simple drive. In both cases it vastly understates the opportunity to get one's hands on a world-beating product. The 'RC12L' comes to the UK with the sort of pedigree which others can only dream about. *Ranch Pit Shop* in Pomona, California is the site of the 1987 World 1/8th Championships. This leading American modelling empire has been built by Gil Losi Snr. and boasts not only the shop, but 1/10th, 1/12th and 1/8th circuits of high standards. Gil's son, Gil Junior, is a top US 1/12th driver, and it was he who conceived the '12L' (L for Losi) early in 1986. Broadly he fitted an *Associated* rear pod to a *Delta* chassis and front end. *Associated* became interested and developed the car to include an aluminium motor mount, '12i' S front blocks, and improved rear damper.

There are times when it is better to say nothing and be thought a fool, than to open

one's mouth and remove all doubt — this is one of them.

The '12L' was used by Tony Neisinger to win the 1/12th World Championship (for the second time — a unique record) in Las Vegas last summer. Despite stern challenges from our own Andy Dobson and Phil Davies, with *Trinity's* Joel Johnson also in contention, Neisinger gave the then prototype '12L' a baptism of fire. In April 1987, Christian Keil of Germany won the European 1/12th Championship using the same car, again challenged by Phil

Davies. Winton would seem foolish to say that the car has any faults, despite a good attempt in RCMC March!

RCMC's kit took a long time coming from America, so *SRM Racing* kindly loaned a kit to allow us time to review the car before the next copy deadline.

Inside the box

A small box contains numbered plastic bags full of some very familiar parts. This is the graphic kit containing all the usual parts, but the pod top plate and chassis are in (D&D manufactured) graphite material.

All kits come with a full set of differential parts and in the graphic kit, ball-races.

The instructions are in two parts, a booklet of photos and a booklet of words. One experiences no difficulty in marrying the two together, even if the words are sometimes as American as mom's apple pie! The first job is the front steering blocks. These are the familiar '12iS' blocks first seen in 1982. Using 1/8in. axles for the wheels, and a 1/8in. rod for the king-pin, assembly is easy to follow if a

little fiddly. The blurb recommends light springs for carpet and asphalt, with the hard springs only for high grip surfaces. If UK carpet isn't high grip, I don't know what is! Every car I have driven has used stiff front springs, so I went for these straight away. (Perhaps this is the secret of my minimal success!).

To allow a rocking motion in the pod, the '12L' uses two large ball-joints fore and aft on the 'T' piece. Assembly of each is identical: the ball is trapped between two plastic washers held by four screws through the T-piece. *Associated* make great emphasis on the need for the rear joint to have no play, but move freely. After polishing with 1200 grit wet and dry. The required result was easily achieved. Attaching

the rear blocks to the bottom plate preceded the fitting of the completed assembly to the T-piece. Remember to fit the lower collar, spring and damper washer to the damper post (who forgot!) before fitting the top damper plate to the pod.

The differential and axle mountings are all new. In fact when you look at it, the whole back end is similar to that of *Cecil Schumacher's* original 'XL' which was the first car in my experience to offset the motor in the mount so as to place the weight centrally. The '12L' follows this practice, but it's not until the pod is in place that it becomes obvious. Since this effectively moves the spur gear further outboard, *Associated* have inserted a large aluminium spacer in the diff and moved the spur back close to the pod.

The differential is *Associated's* Varilock ball unit.

For the first time in an American chassis, ride height adjustment is standard. Oval shaped inserts with bearing holes in various positions fit into recesses in the axle blocks à la 'C' Car. Using a standard 1/4in. axle, the fixed wheel is mounted on a boss with two screws. The side loads on the axle are taken by two thrust washers which bear on the outer faces of the axle bearings, and a thrust washer next to the boss. The wheels are all new lightweight items (front and rear) based on the 'Carro' design used by *Parma*. In assembling the spur gear side there was considerable 'slip' between the ally spacer and the wheel. A quick solution is to drill a 1/8in. hole in the wheel end of the spacer (1/16in. deep) and superglue a diff ball into the hole. This locates in one of the screw holes in the wheel and cures the problem.

The only non-assembled item is the top spring link, a piano wire rod must be soldered into the brass link which threads into a standard ball-joint.

Differential building is straight-forward, the strong words about sideplay setting in the axle must be carefully heeded. Lastly bolt on the front blocks and, hey presto, a basic chassis in all its glory. This took about two hours, but now the hard work starts.

Battery Mounting

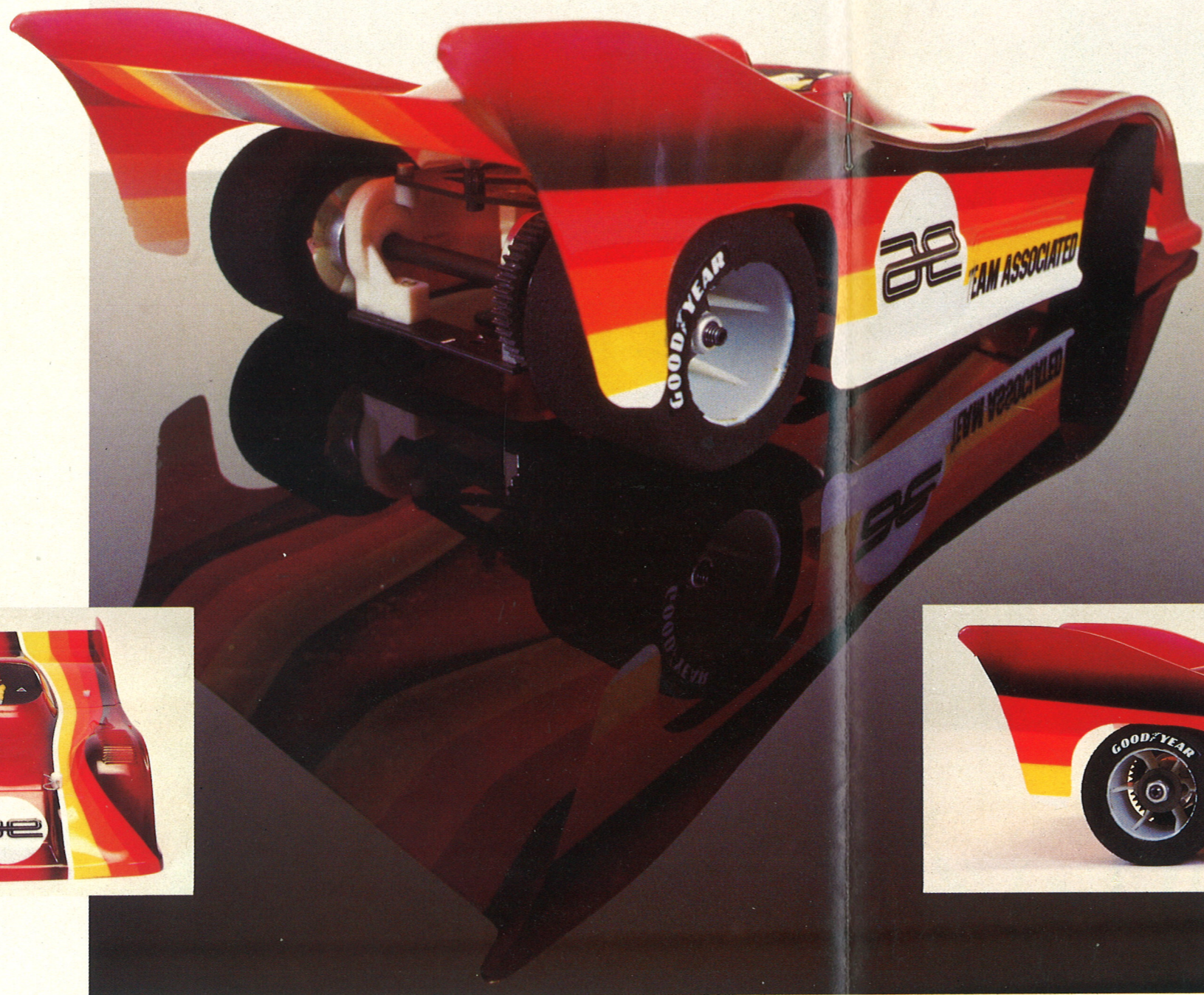
The '12L' is a saddle pack layout, that is the cells are mounted either side of the chassis in two packs of three. This is very popular in America, but personally I dislike it. The new *Corally* is far better in this respect.

It's 'saddle pack' is mounted in plastic trays which require only a two-bolt fixing for secure chassis mounting. Struggling with fibre reinforced tape (not supplied) before every heat with a '12L' is not a nice job.

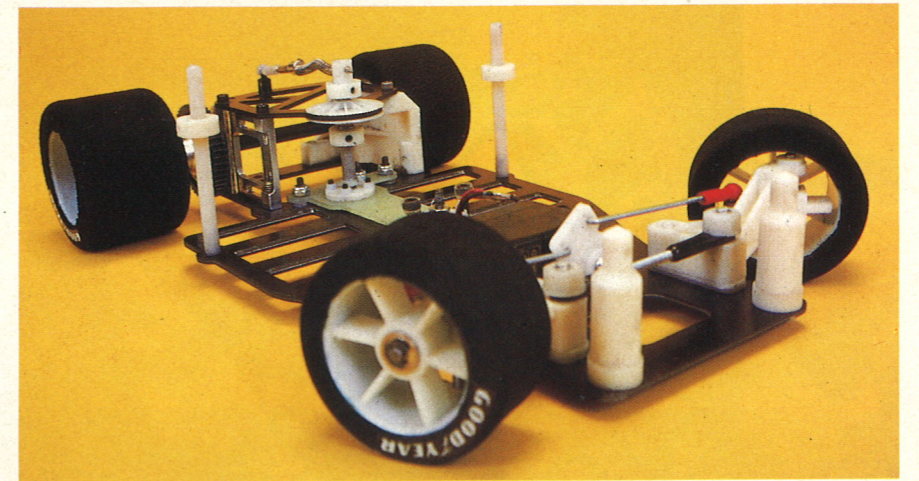


Pete Winton tastes the World beating

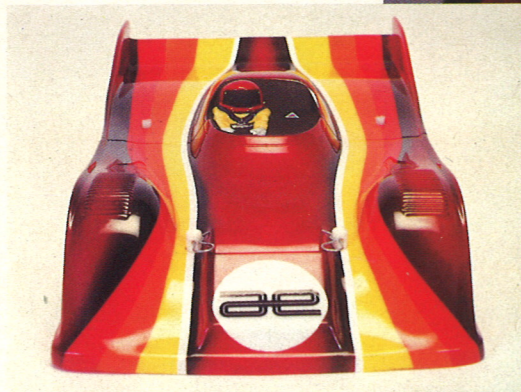
Associated RC 12L



AMERICAN PIE!



Far left: the smooth lines of the 'TOJ' are reflected in the paint job. Left: World and Euro champ. Top: simple chassis design incorporates saddle pack system.



Firstly then, a couple of packs of cells had to be rebuilt for the '12L'. Another problem with saddle packs is lack of room for receiver and speed controller.

Associated recommend mounting the servo with double-sided tape onto the chassis. Personally I like things nailed down, so a couple of *Schumacher* servo posts from the 'C' Car were screwed in by drilling suitable holes in the chassis. Steering arms are crude but effective and were adjusted to give no toe in/out as per instructions. (Changed to ball-joints for testing see photos).

Installing the motor brought

the next shock — long boss pinions are not suitable! That sent me to the phone, and a set of short boss buggy pinions duly arrived from *SRM*. I decided to use 32DP gears for this trial, the difference should be negligible, certainly it would not affect the handling.

The motor fits in from below the car, but it makes soldering direct to the motor difficult. This is overcome, but is less easy than the 'C' Car, 'Panther' or 'Corally'.

An old *Frewer* 'Toj' shell was hacked about to fit, and then it was time for the track.

In fitting the body the only junk item in the whole kit is

revealed. The rear body posts have all the security and strength of *MacDonald's* drinking straws. I changed them for a pair of the old 'Phantom' rear posts which are much stronger. Long posts may still be available from *Schumacher*, failing that, glue the post to the screw.

Using the kit supplied, wheels and tyres, half width treatment for the fronts, the car spent most of the first heat driven slowly checking trim and response. Setting it to a race rhythm the first thing that strikes one is the stability of the car. It feels as if there is no roll in the chassis at all, and the way the car can be thrown

around initially defies belief.

The second run, tyres now bedded-in, proved more worthwhile. This type of car demands a new driving style, its innate stability allows much higher turn-in speeds. However, everything has a limit, and flat out is beyond what is reasonable! Eventually I felt that the car could be held on the power longer before lifting for the corner apex, but power application was only possible fractionally earlier than other cars.

Make no mistake, this is a fast car — Neisinger and Keil have proved that. But it is also a simple car which is close to best in initial design and

execution. In this respect it will win many friends at club level because, quite simply, there is so little to adjust. Most grip problems can be solved by varying tyre treatment area on the front tyres, and that still leaves the castor adjustment for more difficult tracks.

I don't like saddle pack batteries. This is a phobia I grant you, but sticks are so much more convenient. Having to tape cells in before every run is time-consuming — no doubt a damping method can be developed. Having said that, *Corally* have now gone over to saddle packs (we will be trying that car shortly) and others may follow. I shall just have to

get used to it!

The other niggle with this car is the relative position of the motor and axle spur gear. Long boss pinions are out, and even short boss pinions must be fixed very close to the motor can. There will be many people in 1/12th equipped with long boss pinions, but I can see a 'cure'. As the axle is $\frac{1}{4}$ in. dia., it is possible to fit the old style *Associated* axle, or the latest *Schumacher* 'Mell' differential. A spacer will be required, but at least this is cheaper than a complete new set of pinions. 1/10th buggy drivers can of course fit their existing short boss pinions on the standard axle.

There are many references here to other products whose ideas appear on the '12L'. Frankly it is easier for a lazy scribe to say 'like this' than to fully detail each notable item. Any dispassionate look at the '12L' cannot fail to notice borrowed ideas — notably from the 'C Car'. However, nothing is totally new, and after 10 years it is only to be expected that a new (and very successful) car would incorporate the best of what went before. *Audi* pioneered 4WD rally cars, *Peugeot* honed it to perfection. Colin Chapman's *Lotus* team pioneered ground effects, everyone followed. *Associated*

have brought the best 1/12th ideas together in the '12L'.

All in all, an excellent car. Saddle pack designs are now in, expect many people in Europe to follow what has been common US practice. *Associated* will be making the car available through dealers shown in their ads.

SRM Racing, *Ted Longshaw*, *Demon* and *Elite Models* are the addresses currently shown. Expect to pay around £100 for the 'graphite' kit, around £40-£50 for the ordinary GRP version.