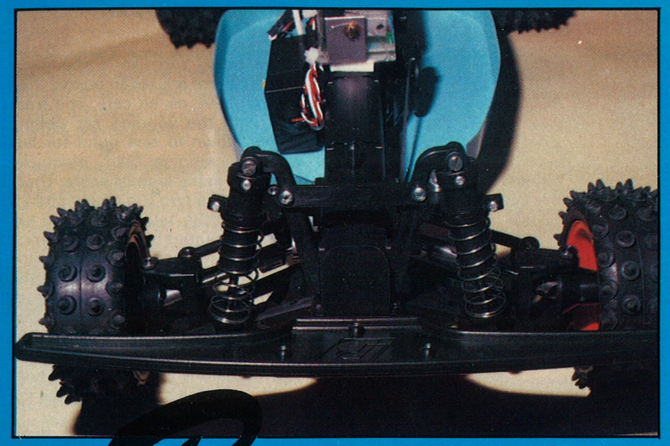
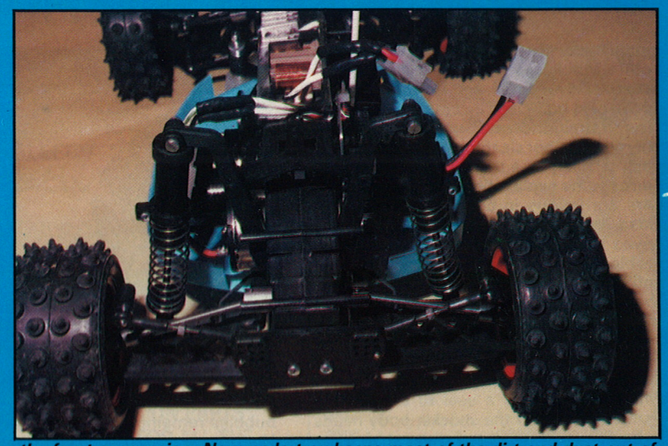
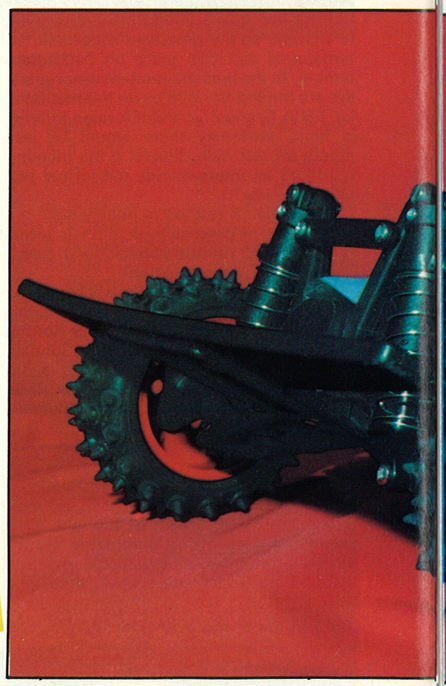


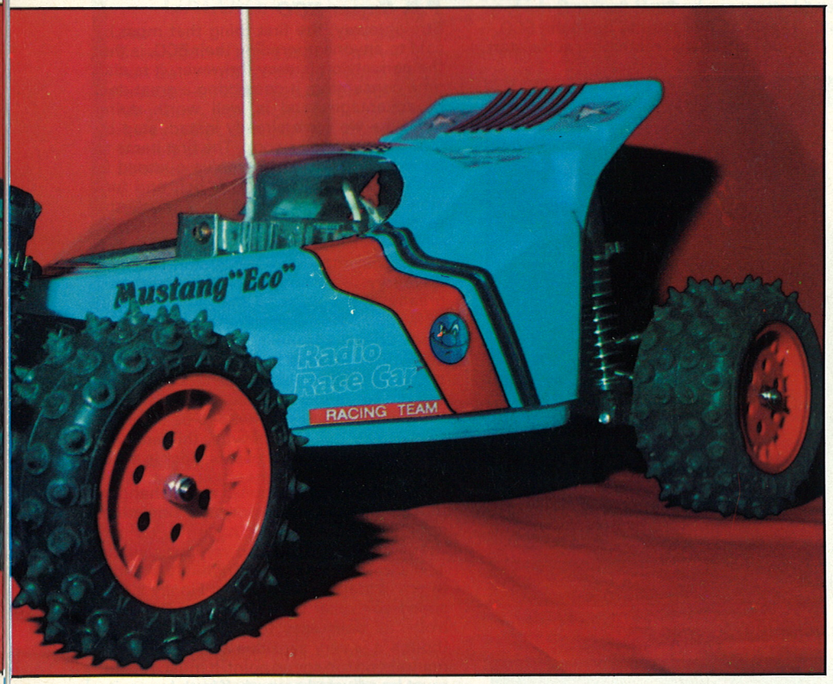


Tall shock towers give a superb amount of movement for the front suspension. New undertray keeps most of the dirt and dust out of the works. At speed, something the ECO does well. All important new rear end giving a range of pre set positions.

P.B. SUPER ECO

We take a look at the P.B. ECO and the full upgrade equipment.



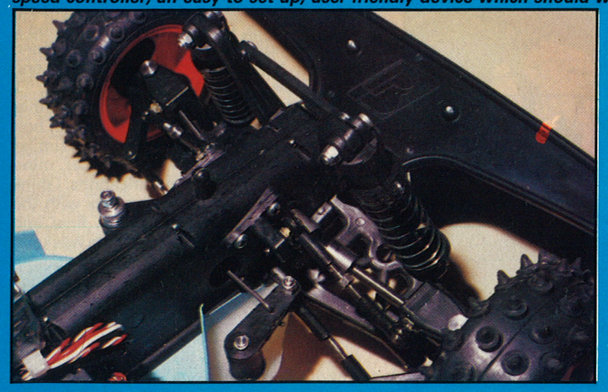


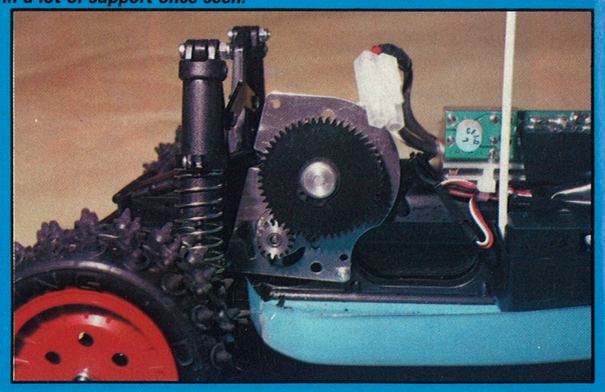
It seems the more forward looking manufacturers are adopting a policy which enables everyone to come out a winner, not just on the track but in terms of economic sense too. P.B. are one manufacturer that recognised the need for such a car, a car that in today's terms can be purchased very competitively indeed, the basics of handling, setting up and learning all the tricks of the trade can be acquired and then the car can be upgraded step by step, or in one giant leap, depending on the depth of your pocket.

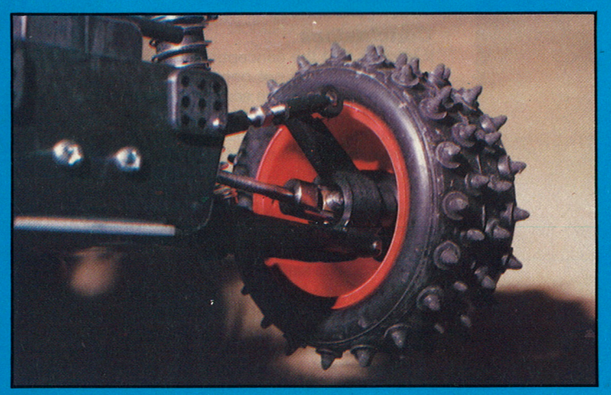
P.B. ECO

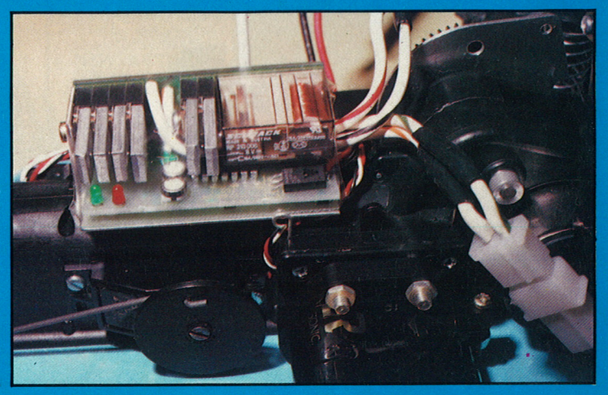
First, let's take a look at the ECO as it arrives from the box. The car is constructed around the well known and extremely efficient monocoque chassis spine. Within the monocoque the drive belt is housed, this is the heart and soul of the ECO and a most efficient piece of engineering, transferring the drive from motor to both front and rear wheels. Both front and rear differentials are of the planetary gear type. When assembling the differentials some care must be taken, be sure to remove all traces of flash and any moulding which may stand proud, our model needed the planetary gears flatting, this was easily accomplished by lightly sanding with wet and dry. A simple belt tensioner is also incorporated into the chassis to take up any adjustment which may be needed. After installing both differentials, tensioner and belt in one side of the

Double threaded adjuster rods make for ease of adjustment to any camber changes. Motor and pinion changes could not be any simpler, thanks to the P.B. set up, mid engined too. A clearer shot of rear suspension adjustment settings and universal drive shafts. The P.B. speed controller, an easy to set up, user friendly device which should win a lot of support once seen.



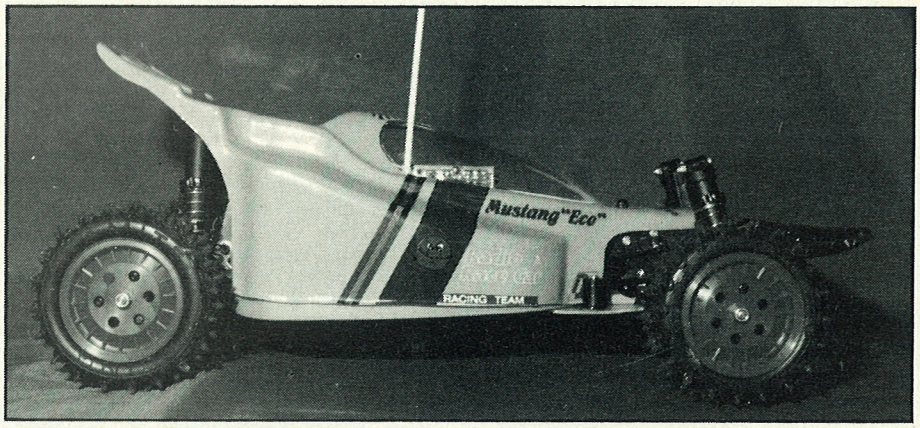


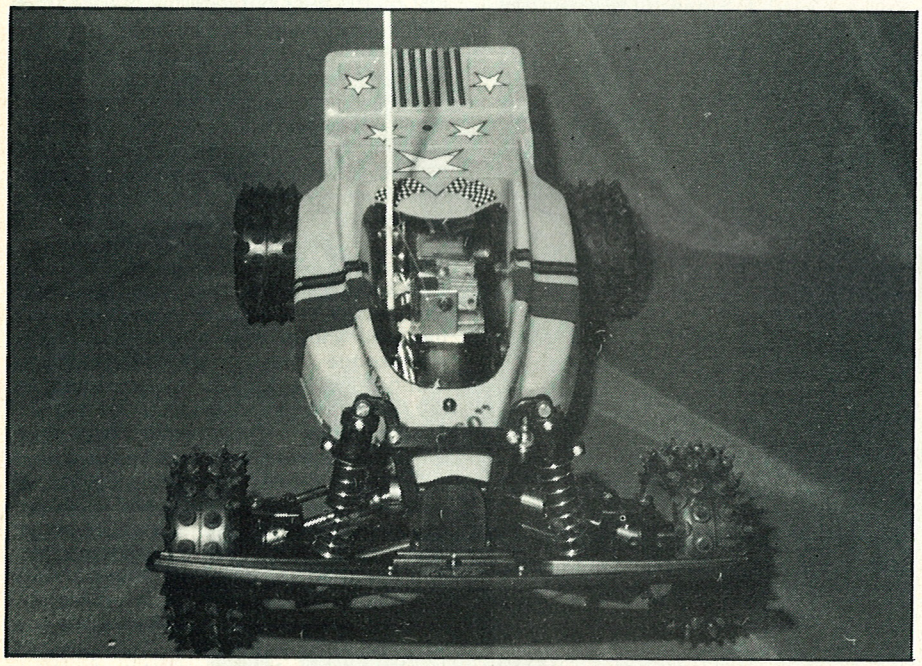




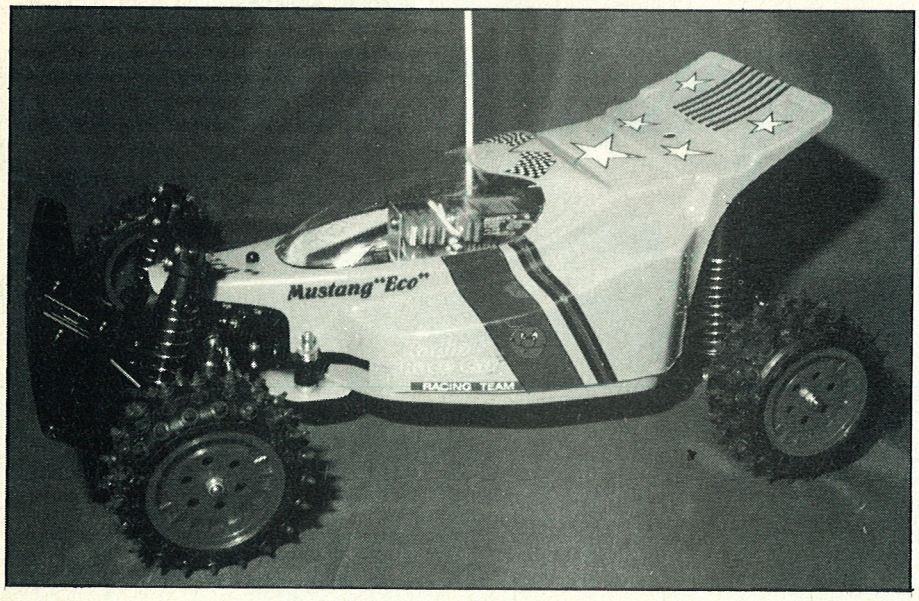
monocoque, the other side is added and both are bolted and screwed securely together. Drive cups and wishbones are added next both front and rear, again a simple and straightforward operation requiring only some minor cleaning. Shock absorbers next, this can be a tricky operation and requires some explanation. P.B. shock absorbers are unique in construction and provided the assembly instructions are followed to the letter should provide no real problems. As standard shockers both front and rear are fitted with a bleed screw, this should be fitted first, the shocker shaft is then constructed. First the damper plate is secured on the shaft using two C clips and a blanking plate fitted behind this, a rubber O ring next followed by a guide sleeve which also acts as a seal to contain the damping oil. Next the shocker body needs to be filled with oil, the damper shaft complete with all fittings is inserted into the body firmly as far as it will go, do not force it any further. Undo the bleed screw and push the shocker sealing base home, insert both securing pins and leave the complete shocker standing upright so that any air bubbles remaining will be removed, easy! Uprights are fitted and both front and rear shockers are fitted in situ, at this point the motor, radio shockers are fitted in situ, at this point the motor, radio speed controller and battery can be fitted the car is ready to go. It really is that easy to build the ECO.

Having said all that remember at the start we said that the ECO is one of those cars that can be upgraded, well we decided to upgrade ours to see exactly how easy or otherwise this was to do.





The finished article looking every bit the strong, reliable, fast racing car.



P.B. Super ECO

Straightaway, the first thing that must be said to anyone upgrading their ECO, is that the conversion is easy, however, it is also time consuming, it does bring a great deal of advantages and is well worth doing either as we have already stated, step by step or in one fell swoop. The first items to be exchanged are, yes you've guessed it, both differentials, the drive belt and tensioner. This stage really is a must, the reason is simple. P.B. have researched the whole drive system and use a fine pitch belt on the Maxima, the new P.B. star. This new drive system improves the efficiency greatly, P.B.'s claim is that 20% is about right, this does seem to be the case. Universal driveshafts next, this improves the amount of useable steering lock available and ensures that a sudden shock or impact will not result in a dropped drive shaft. The front hub carriers also need to be changed to the new bell mouth type, this ensures that the full amount of useable lock is available.

Front and rear wishbones are exchanged for bottom wishbones only and single link uppers, balljoints also have to be exchanged. This step is also very worthwhile as it allows the ECO to be infinitely dialable to any surface or conditions. Finally a P.B. speed controller was added, the P.B. controller is both easy to fit and adjust, although it is very sensitive around both the neutral and top speed point. It must, repeat, must be adjusted properly if both longevity and reliability are to be maintained. Full instructions are included with the speed controller and are easy to follow.

Conclusions

It is clear that the conception of the ECO is a surefire winner not only in terms of the car being good, but in economic terms too. The ECO allows anyone and especially the newcomer to the sport a competitively priced, strong, reliable car on which the tricks of the trade can be learned, then as and when the owner feels, the extra go faster goodies can be added and that is not a term we use in the general sense because the add-on bits do allow the car to do just that. It must be said that the bolt on uprated parts are easy to fit and no alterations to any part of the car are necessary, this in itself is a legacy to how well the ECO has been planned, engineered and constructed.

ECO and all uprated parts are available from P.B. stockists everywhere.