# LOCH LOCH

pretty average year for British motoring.

There were no startling innovations, despite the fact that it was thought the gas turbine would soon replace the piston engine as a means of propulsion. There was considerable discussion as to whether flashing indicators should replace the semaphore arm as a means of signalling, without any real decision being made. The tubeless tyre had yet to make an impact but

wheel rims were beginning to get

wider and tyres fatter.

enerally, 1952 was a

The fact that the Morris Minor was to be offered with four doors, and that Park Ward were now building folding footrests into the back of the front seat of their Rolls-Royce bodies didn't cause too many pulses to race either. But there was one particular highlight to the year; an event which was to have quite an impact at the time, and still continues to create ripples throughout the motoring world.

At the Earls Court Motor Show that year, Donald Healey took the wraps off his latest masterpiece — the Healey 100. By the end of the show, the car was called the Austin-Healey 100 on the strength of a deal between BMC and Healey, and the new car was to be produced at the Longbridge works. The story of the Big Healey is a fascinating one, as anyone who has read Chris Harvey's Healey, The Handsome Brute will know.

That an everyday roadcar, capable of over 100mph, should cost just £850, plus purchase tax, was remarkable. Sadly, it is no less remarkable that a rebuilt Austin-Healey could today cost £25,000.

And even a poor example, with a bodyshell containing more filler than steel, will set you back at least 10 grand. This 'cheap' British sportscar is no longer within the grasp of the average motoring enthusiast, and it's fortunate there are so many owners who have the time and resources to keep this wonderful car alive and well.

For those with the longing but without the purse, there is an alternative. It has the performance potential, the looks and the handling to match the original without the worry and expense associated with just owning, let alone actually driving, a classic car. We're talking of course about the Haldane HD 100.

No, it isn't a perfect replica and it won't satisfy the purist, but neither is it meant to. Its value won't increase in leaps and bounds either and it doesn't have the feel, smell or charisma that a real Healey is supposed to have, but how many people can detect that? And to how many is it really important? Being unfettered by a nagging obsession toward perfect originality, the Haldane owner can enjoy all the benefits of classic sportscar motoring at a fraction of the cost.

A test drive in the HD 100 should be enough to convince you that you can live without 1950's technology, high insurance premiums and a dreadful fear of road salt. But before you step into the car, take a long hard look at the bits you can see. Even better, take along a copy of Harvey's book and make a few comparisons.

Healey buffs will, of course, already have recognised that there are some small differences between the replica and the original. You, in turn, may spot there is no seam line run-



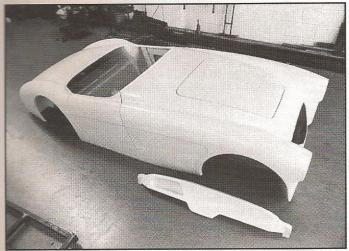
• Repro items such as the radiator grille and bumpers are spot-on



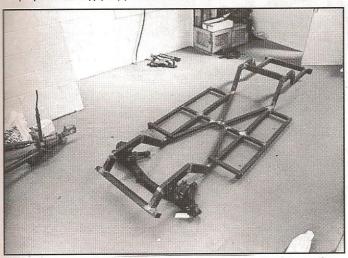
 The fuel tank is placed out of harm's way over the back axle, which also helps to distribute the weight — although it also means some loss of boot space



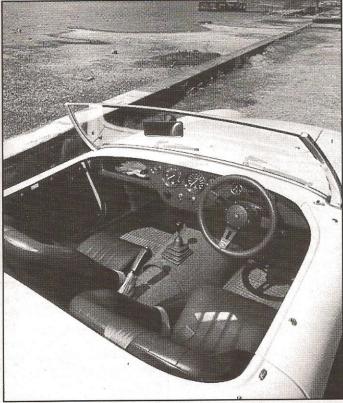
• The continuation of the swage line around the wheel arch and the lack of seam lines running along the top of the wings are the most obvious signs that this is not an original



 The glassfibre bodyshell is strong, corrosion-free and easily repairable. The company is able to supply any panels should they be required



 The chassis is not so different in concept to that of the Healey. For demonstration purposes a Chevette front cross-member was placed in position



Although not a reproduction of the original, the interior of the Haldane demonstrator was tidy and it did at least have a period look about it

ning along the tops of the wings on the copy (although, this would be very easy to replicate), and you may also notice differences in the rear light configuration — the repeater indicator lamp rather gives the game away too, but it is a legal requirement so there's no alternative.

Also, the early 100/4s had wire wheels and the petrol filler cap lived inside the boot. However, other details of reproduction items are spoton, such as the boot hinges, bumpers, radiator grille and windscreen pillars. The swage line which begins with a chrome flash and ends at the front of the rear wheel-arch on the Healey 100/4 was later altered to run down the back curve of the front wheel arch — those with sharp eyes will have noticed that the HD 100 has pre-empted this modification.

Take a tape measure to the Haldane and you will find the dimensions of the copy exactly match those of the original. But if you let your fingers wander under the returns of the wing panels, you will be able to recognise the tell-tale feel of glassfibre. Any disappointment you may register at the absence of steel or alloy should quickly be replaced by the recognition that corrosion will never be a problem again, and that inexpensive replacement panels are a glorious fact of life.

Ah, but what about the doors? Will they shut properly and sound right; will they sag or fall off after a bit of use? Try lifting the bottom of the doors at the end farthest away from the hinge and do the cruelest thing you can possible do to any door; that is, give it a sharp lift upwards against the hinges. You will find the car rocks on its springs, but the door and its fixings remain solid. As the door is open, you may as well slip behind the wheel.

The interior is by no means original Healey, is it? The Triumph clocks, vinyl door panels and cheap seats on this prototype do not do the car justice at all — even the dash panel is the wrong shape. No doubt the manufacturers will explain to you that their first priority was to get an authentic looking exterior and sort out the mechanics. This seems reasonable enough, and after all, the simple layout of the cockpit on the original Healey should be easy to copy if that's what you want.

As your hand reaches for the start switch, either Brian Harris or Alasdair Maclean Scott, who are partners in the company and one of whom will undoubtedly accompany you on the test drive, will explain that the car you are driving is the prototype. This is not for the purpose of making excuses, but more of a way of explaining certain things. An invitation to visit the workshop and view a production chassis and bodyshell will be extended to you and here you will be able to check out some crucial differences between prototype and production units.

For instance, the one-piece glassfibre bodyshell is stiffened in the area of the scuttle by moulding-in a box section which includes Cormat and uni-directional glass rovings in its make-up. You will be shown the double-skinned doors and again the inclusion of stiffening materials will be pointed out to you. A sandwich of GRP and plywood, with plywood as the filling, is used in the sills and bulkhead area to make the bodyshell almost a monocoque in its own right: so that when it is bolted to the chassis, at no less than 24 points, the resulting composit is extremely strong and twist-resistant.

You will be asked to inspect the deep rainwater channels in the boot and bonnet surrounds and the returns on the wheel arches and sill areas, all of which have a stiffening effect on the panels. This care to ensure panel integrity also extends to the bonnet and bootlids, which again have Cormat, uni-directional rovings and other reinforcement built into their construction.

At first glance you may think that the ladderframe chassis is quite unsophisticated - and so it is. Despite the cruciform bracing and perimeter frame, this type of construction would undoubtedly be subject to twisting and it does rely on the bodytub for that added stiffening. So the bodyshell is not merely to keep out the weather - it is a stressed unit, and in this respect the HD 100 is no different to the original Healey. In fact, the two chassis are remarkably similar. And it is perhaps worth noting that the weak area of the Healey has always been the steel and alloy panels, which corrode badly; the chassis are generally sound.

As the engine is fired up you may not recognise the anonymous sound of the Ford 2 litre ohe engine—especially since the standard Ford exhaust system is used. But don't be fooled by the quiet tickover; this engine is a willing enough worker and coupled to the slick four or five-



 A hood and sidescreens will eventually be available, but the prototype has only the windscreen for protection against the elements

speed Ford gearbox it is capable of propelling this lightweight car at very respectable speeds, as you will see on the test drive.

While the engine is warming up you can do all the usual adjustments to seat, mirror and so on. If you don't notice it, it will soon be pointed out to you that there is more room in the footwells than in the original, and there is plenty of room for even the most long-legged driver. And widely spaced pedals mean that you don't need to be a ballerina to drive this car.

Slip the gear lever into first and give the accelerator a good boot and you notice low the Ford Pinto engine pulls away cleanly, if not with electrifying acceleration. Work your way up through the gears, ignore the whine from a duff thrust bearing in the clutch, and keep the engine working hard. Several things will be happening but you probably won't notice them at first because you will be too busy trying not to react to being the centre of attention from other road users. You will also be revelling in the feel of driving a real British sportscar. So just enjoy it for a while.

But watch it, because you may well find yourself going faster than you think. The lack of buffeting in the cockpit (thanks to the effective side screens) and that quiet engine can lull you into a false sense of security. Cruising at 85mph is both pleasant and strain free, but remember ... this car can be spotted a mile away.

You need to concentrate here as you leave the motorway out of Glasgow and take to the side roads around the lovely Loch Lomond. These narrow and twisting lanes have a few surprises waiting for the unwary — and so does the HD 100.

Sharp corners it can handle with

equanimity, and the odd shower of gravel as you get too near to the undefined outside edge of the bend is nothing to worry about. But beware the hump-backed bridge. Firstly, as you top the rise the long bonnet completely obscures the road ahead. Unsighted as you are, it's a pound to a pinch of snuff that you won't see the next corner immediately under your left front wheel. Then, as you land on the other side of the hump, if you are going at any speed at all, the rear springs stand a good chance of bottoming out. It will be explained to you that the prototype has slightly soft springs, hence the comfortable

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ride, but the intention is to stiffen them up a little, especially for use on switch-back roads such as you will find in some areas of Scotland. It does demonstrate though that the company is not afraid to use the car in conditions which will quickly show up any weakness. This could well reinforce your opinion that you are dealing with two honest men.

Drive the car quietly and it will reward you with a comfortable and pleasant ride; on a fine day, with the hood down, there is no better way to travel. Drive quickly, but timidly or carelessly, and the car will return your lack of determination with a lacklustre couldn't-care-less performance, safe enough but uninspiring, with a good deal of understeer. But concentrate and don't turn in too early or too fast, or go on the throttle too soon, and you will find that you have a very easily controlled car under you. It responds well to being driven hard and fast and as you gain confidence you will realise the thing really does like to be firmly handled.

Ok, you're enjoying yourself, but you are supposed to be checking out the car. Take a look at the wind-screen surround (unless it has been sorted out, as the partners promised it soon would be), and you will notice that it flaps around a bit. Well, 'flaps' might be an exaggeration, but it does vibrate a lot; certainly the movement is enough to move the bottom sealing strip so you can see daylight through it.

Still on the subject of the windscreen, despite being a good copy of the original frame and pillars, it does not fold down as it did on the early Healeys. Then again, if it did fold you may find it intruding into the cockpit rather because it was inadvertently fitted incorrectly — which also explains why the hood did not fit properly when it came from the makers.

The slight scuttle shake which you noticed will be cured by the inclusion of the built-in beam under the dashboard of the production bodyshells, as you have already seen. And this should make an already remarkably shake and rattle-free car even quieter. All these things will be pointed out to you and will have been corrected on production cars, as your factory visit will show.

As you sit quietly in one of the many view-point car parks on the Loch side, your questions about the mechanical aspects of the car will be answered in some detail. Both partners have engineering degrees, both are active in motorsports, and they have built many specials and one-offs between them. Brian is a well known competition driver and had his own light aircraft construction company and a glassfibre fabrication company. Alasdair too, is an

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aeronautical engineer who currently specialises in wind turbines.

choice of Chevette mechanical components for the Haldane was a carefully considered one. Performance, ruggedness, availability, reliability and the cost were all factors which were taken into account. The fact that the front suspension beam can be used in its entirety was an important point in its favour, as was the ability to easily adjust camber and castor. Like the original Healey, the independent wishbones and coil springs, together with an anti-roll bar, combine to make an effective and reliable suspension

The solid rear axle of the Chevette is modified by the addition of four radius arms, and the existing Panhard rod is retained to give the proven five link set-up. Coiloverdampers replace separate springs and shock absorbers to try to iron out those increasingly large potholes that are appearing, more and more, on British roads. This system must be a considerable improvement over the Austin-Healey which used semielliptic leaf springs and lever arm dampers. Discs on the front and drums at the rear bring the brakes up to date and the original Burman cam and lever steering is replaced by the effective and widely available Chevette rack and pinion type.

Because the car is specifically designed for home completion — although the company will happily supply cars to various stages of build — as many Chevette parts as possible are used. Apart from the engine and gearbox, the instruments, a special alloy fuel tank and an Austin Mini wiper system, all the mechanical and electrical compo-

Likes
Good quality; handling;
practicality; quiet and
comfortable ride; fun to
be with
Dislikes
Poor interior; incorrect
rear spring rates; poor
windscreen frame

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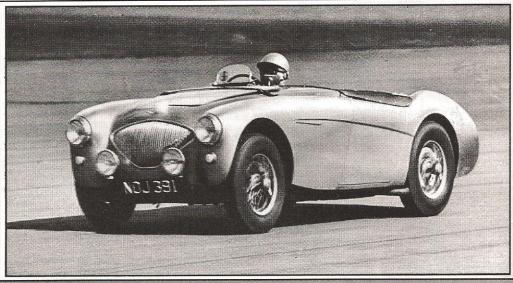
nents are of Vauxhall/Opel origin—even the door catches are used. And, of course, you will have already clocked the wheels—you spotted immediately that they came from an Opel Rekord, didn't you? But wire wheels are available, and the company can supply all of the repro bits from stock.

Construction is simplified by supplying the bodyshell pre-fitted to the chassis and all of the panels are hung and correctly gapped. Costs vary depending upon the stage of build supplied. For a basic package consisting of the GRP bodyshell finished in primer and mounted on the chassis with doors, boot and bonnet fitted; a moulded facia, steering link, heater cover, pedalbox, modified propshaft and rear axle - the cost would be £1950 ex VAT. So it should be possible to put a good quality replica on the road for under £5000 — a far cry from the cost of a genuine Healey.

What do you think of it, then? Would you sum up by saying the car is a fair copy of the original and good enough to fool most of the people most of the time? That it certainly drives like a sportscar should, with good road holding and the sort of performance which would not disappoint Mr Healey?

As for comfort, ride and practicality, would you agree that it probably out-performs the original? Also, can you honestly say that anything except corrosion is lost by constructing the bodyshell from glassfibre? As for the use of easily obtained mechanical components, you must agree that it makes a lot of sense — especially if cost is a consideration.

Not everything in the garden is rosy though, is it? That windscreen, for instance, and the spring rates at the back — they need sorting. The interior too could do with some attention, and it would be nice to be able to test the effectiveness of the weather gear. All round, though, would you say the Haldane HD 100 would make a super sportscar for someone who can live with a car that is more a look-alike than a replica? You would? Good, we agree.



#### HISTORICAL PERSPECTIVE

Remember the Austin Atlantic? It was one of BMC's more flamboyant failures, its heavy body and gross lines impressing neither the home nor foreign markets. However, strange as it may seem, it did have an influence on bringing one of the prettiest, the best performing sportscars ever made within the reach of the average British motorist.

As a result of the Atlantic disaster, there was a large number of four cylinder engines lying idle at Longbridge. At about this time Donald Healey had ideas for a new sportscar; one which would be a very fast road car capable of at least 100mph and which would appeal to buyers both in this country and the USA. But particularly in the States. He wanted it to be cheap to buy and maintain, but above all, it had to have the feel and looks of a genuine sportscar.

To keep the price within reasonable levels, Healey chose mechanical components from existing cars (just as Haldane has done), mostly from the BMC range. The mighty four cylinder engine and gearbox from the Austin Atlantic were among those components — and they served the car well, despite the fact that the gearbox had only three forward

sneeds

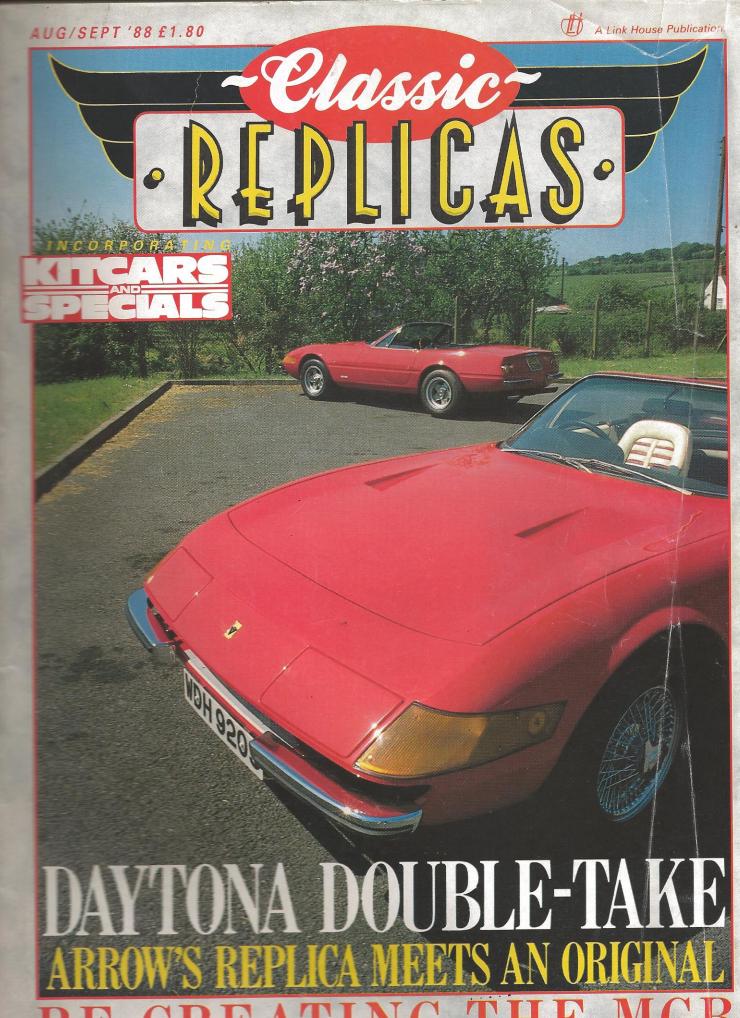
Launched at the 1952 Motor Show, the car was an immediate success and it was at the show that the deal with BMC was announced and from then on the car was known as the Austin-Healey. The outstanding feature of the car was the shape of its body. Designed by Gerry Coker, the style was both smooth and aggressive and while we may view it as a traditional sportscar today, in 1952 it broke new ground in sportscar design. It says something about the rightness of the design that despite a great deal of mechanical changes, the exterior of the last Big Healey was very much the same as the first.

The Healey 100/4 (100mph, four cylinders) was capable of speeds well in excess of 100mph and had a 0-60mph time of about 11.7secs. It proved to be amazingly tough and well able to stand up to the rigours of competition, but it was not long before more power was called for - and despite the addition of overdrive, the three speed gearbox could have stood a lot of improvement, too. So, in 1956 the Healey 100/Six was born, but the story of this six cylinder car is outside the scope of this brief article.

It would also take much more space than is available here to list the Healey's achievements in motorsport. Suffice it to say that it completed in every major event, on just about every track, in the world and enjoyed a huge measure of success. America, and California in particular, took the car to its heart and more than 70,000 were sold before the anti-pollution laws, and other legislation, killed it off.

Contempory drivers were used to heavy, awkward handling cars but even the racing drivers found the Healey something of a handful at times. The back-end showed a tendency to break away in unsympathetic hands, but in the majority of cases the car's handling received nothing but praise because it rewarded the skilled driver with exhilarating performance.

Production ceased, to cries of 'shame', in 1968 after 15 years of continuous production. The marque is kept alive by enthusiastic owners backed up by a number of Healey clubs, who are able to source and supply a large number of spares. It won't be long before someone, like British Heritage, say, produce a complete body-shell.



RE-CREATING THE MGB

PLUS ROAD/RACE COBRA, AUSTIN HEALEY, RILEY MPH