

1930 M.G. PROGRAMME

AMONG those to whom a high performance as regards acceleration and speed particularly appeals the M.G. range has become extremely popular. For 1930 a new model has been introduced, the 18-80 h.p. Mark II Six, which supplements the existing 18-80 h.p. Mark I Six, and the range is completed by the M.G. Midget, now available as an open two-seater and as an attractive sportsman's coupé.

For the new chassis the same engine as used in the Mark I model is employed, but the frame is stiffer throughout, a four-speed gear box is fitted, the front axle and steering are more robust, and very powerful brakes with 14in. diameter drums are standardised. These are the major differences between the two six-cylinder-engined chassis, but minor points of variance also exist, such as in the layout of the half-elliptic rear springs, the provision of central chassis lubrication, and the method of brake operation.

Exceptionally Smooth Running.

As regards details of the engine, the bore and stroke are 69×110 mm. (2,468 c.c.), the R.A.C. rating being 17.7 h.p. The cylinders and crank case form a single casting in iron of great strength and rigidity, and in this the robust and carefully balanced crankshaft is mounted in four large bearings. It is largely due to this construction that the engine has achieved an excellent reputation for its smooth, vibrationless running. In the detachable head are mounted the inclined valves, operated through rockers from the overhead camshaft, the latter being chain-driven from the crankshaft, with the drive so arranged that the head can be dismantled, complete with the valve gear, without disturbing the timing.

Two S.U. carburetters, each with its own float chamber, are fitted on the near side, each supplying three cylinders, and ignition is by coil, the

New Four-speed Six-cylinder Chassis to Supplement Existing Range. Midget Sportsman's Coupé.

distributor being driven by a vertical shaft on the off side at the front of the engine. The lower end of this shaft actuates the gear-type oil pump, which delivers oil under pressure to main and big-end bearings, to the camshaft and valve gear, and to the distribution gear. Also, on the off side and driven from the front of the engine is the 12-volt dynamo, while the water impeller is driven in tandem from the dynamo, being situated towards the rear of the cylinder block.

On the near side are the exhaust manifold, with its connection to the exhaust pipe at the front end, the water outlet to the radiator, the large oil filler, and the dipstick oil gauge for the sump. A new type breather is fitted to the aluminium valve gear cover, and leads oil fumes away from the vicinity of the dash and body.

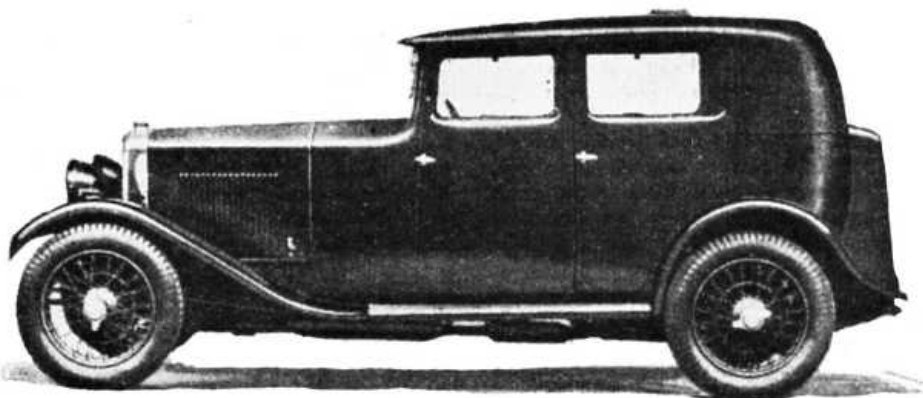
With the engine the five-plate clutch, having cork inserts and running in oil, and the four-speed gear

box form a compact unit. The gear box is especially interesting, as helical teeth are used for the constant-mesh and third-gear pinions, engagement being by dog clutches. Thus not only is a quiet third speed obtained, but the change from top to third, or from third to top, is very easy. Another point is that a central division in the gear box carries intermediate bearings for both main and lay shafts, so that the shafts are supported close to whatever gears are transmitting power. An extension rearwards from the lid of the box carries a short, stiff gear lever with a ball joint, a gear lock being incorporated. The ratios are 14.58, 8.5, 5.58, and 4.27 to 1.

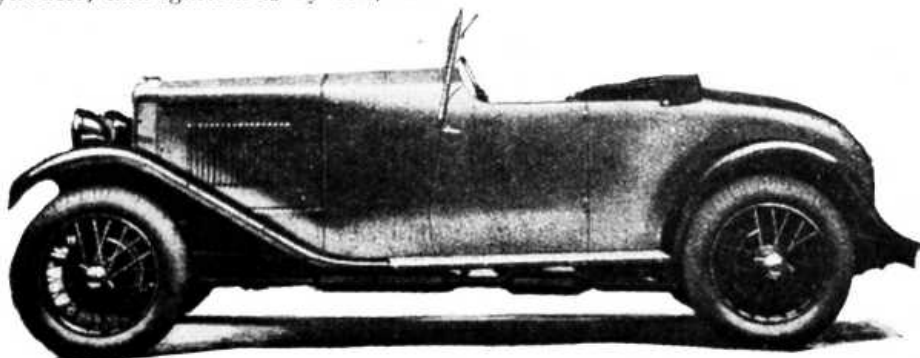
A Well-braced Frame.

At the rear of the gear box is the spherical joint at the head of the torque tube, enclosing the split-ring type universal joint at the head of the propeller-shaft. The final drive is by spiral bevel, and the rear axle is of stronger construction than that formerly used.

While the main frame members are similar to those of the Mark I chassis, except for minor modifications to give additional strength, being upswept at front and rear, they are united by a



M.G. Six saloon, Mark II.



The two-seater 18-80 h.p. M.G. Six.

box girder section cross-member just behind the gear box and by stronger front and rear cross-members. Stiffer tie bars are also fitted between front and rear dumb irons. Incidentally, use is made of the large central cross-member to carry the two batteries, one on either side of the torque tube.

The half-elliptic front springs are shackled at their forward ends, the shackles being fed by the Tecalemit automatic chassis lubrication system, which also attends to the steering pivots and joints, and to the trunnion bearings of the half-elliptic rear

springs on the axle casing. The rear springs are wider than those of the Mark I chassis, and are mounted at the side of, and not beneath, the main frame, Silentbloc bushes being used for the shackles. There are thus no points needing attention with the grease gun, and there are only the engine, gear box, back axle, steering box, and chassis lubrication tank to be attended to at fairly long intervals of time.

For the front axle a straight H-section beam with stiffened, upswept ends is employed. Marles steering is used, the column being adjustable for rake and carrying an 18in. Bluemel spring-spoked wheel with throttle and ignition levers in a neat mounting above it.

One of the advantages of the brake gear of the new chassis is that it leaves the body builder full scope for fitting foot wells. It is also extremely simple, for there is only one cross-shaft, carried by stainless steel cones received between three bronze rollers, so that lubrication is not necessary, and there is no possibility of the shaft binding owing to frame flexion. On each end of this cross-shaft are double-ended levers to which the operating cables are connected.

The brake drums are ground internally and have ribbed aluminium bands shrunk on them. Orthodox two-shoe expanding brakes are used, with Halo linings, giving a total braking area of 208 sq. in. The brake

lever is straight and is mounted on the frame, and it has the pawl and ratchet brought into engagement only when the knob is depressed, a reversal of normal practice and one which is favoured for sports and racing cars.

Petrol and Oil Supplies.

In the dash is mounted the auxiliary 2½-gallon fuel tank, which is fed by an Autovac from the 12-gallon main tank at the rear. A two-level tap for the auxiliary tank provides a reserve supply of 1 gallon. A Jaeger electrically operated gauge on the instrument board gives an indication of the state of the main tank, which has a 3¼in. diameter quickly detachable filler cap. A reserve oil supply of 1 gallon is also afforded by this tank, and the sump can be replenished merely by turning a tap.

The wiring has been made very neat, and a junction box on the dash carries the fuses and an inspection lamp. On the compact instrument panel are mounted clock, speedometer, revolution indicator, oil pressure gauge, and petrol gauge. Large Rotax head lamps are carried by stays, bracing radiator and wings. Rudge-Whitworth racing-type wire wheels are shod with 29in. x 5in. Dunlop Fort tyres, and the wheelbase and track are identical with those of the Mark I chassis—9ft. 6in. and 4ft. 4in. respectively. Accordingly, the coachwork is identical with that of the

Mark I range, the complete 1930 programme being as follows:—

Mark I.—Chassis, £445; two-seater, £510; tourer, £515; sports saloonette, fabric £550, coachbuilt £555; four-door saloon, fabric £560, coachbuilt £570.

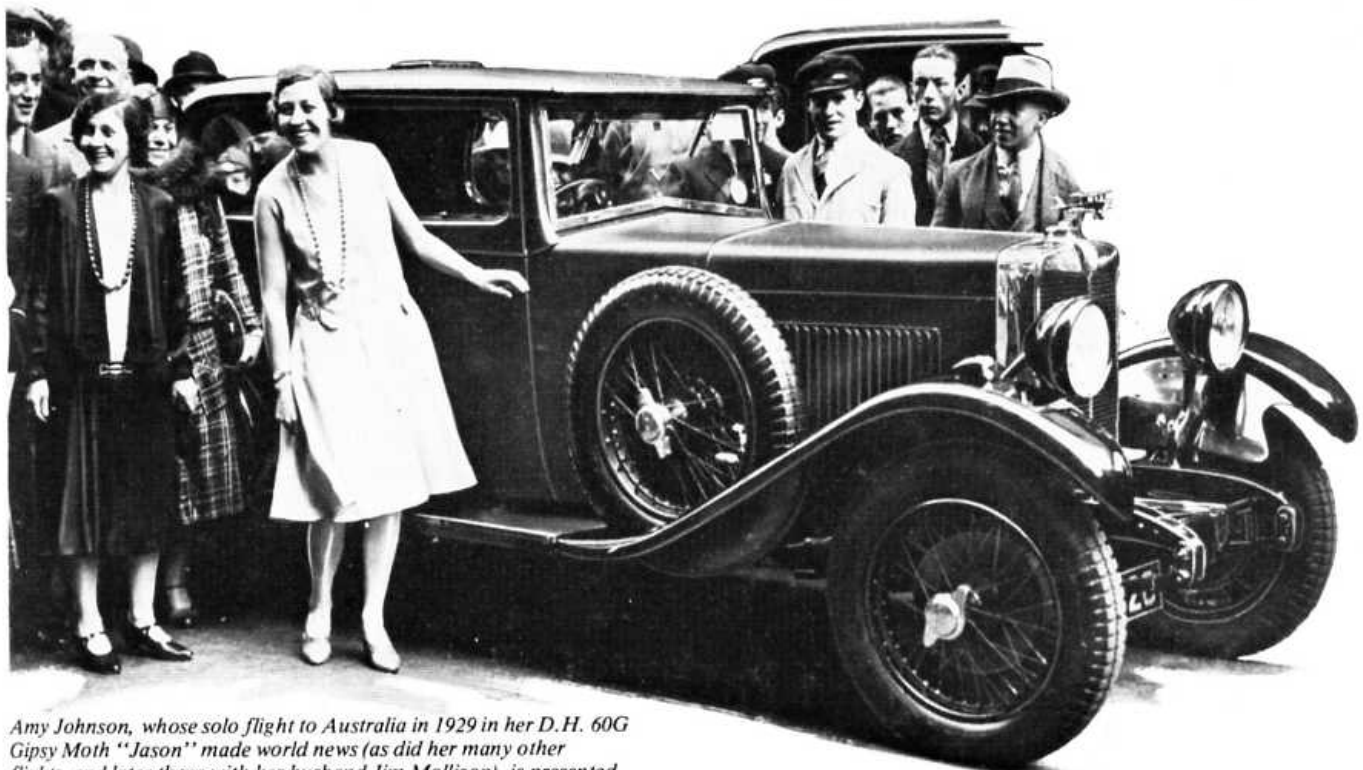
Mark II.—Chassis, £550; two-seater, £625; tourer, £630; sports saloonette, fabric £655, coachbuilt £660; four-door saloon, fabric £660, coachbuilt £670.

Midget.—Two-seater, £185; sportsman's coupé, £245.

In producing the 8-33 h.p. Midget sportsman's coupé the M.G. Car Co., whose address is now Pavlova Works, Abingdon-on-Thames, Berks, have aimed at providing a really comfortable and well-finished small car, as well as one capable of a high performance. It is possessed of good lines, but is also roomy, and has wide doors which assure ease of access, and a sliding sunshine roof in which are let lights, so that, even when the roof is closed, the occupants of the rear seat do not feel shut in.

The front bucket seats are adjustable and have pneumatic cushions, while the rear seat has both pneumatic cushion and squab. The doors are recessed to give additional elbow room and carry useful pockets. Triplex glass is fitted throughout as standard, and the rear luggage trunk has the spare wheel mounted on the hinged lid. The oval instrument panel is sunk into the fascia board, which provides a very useful locker at each end.

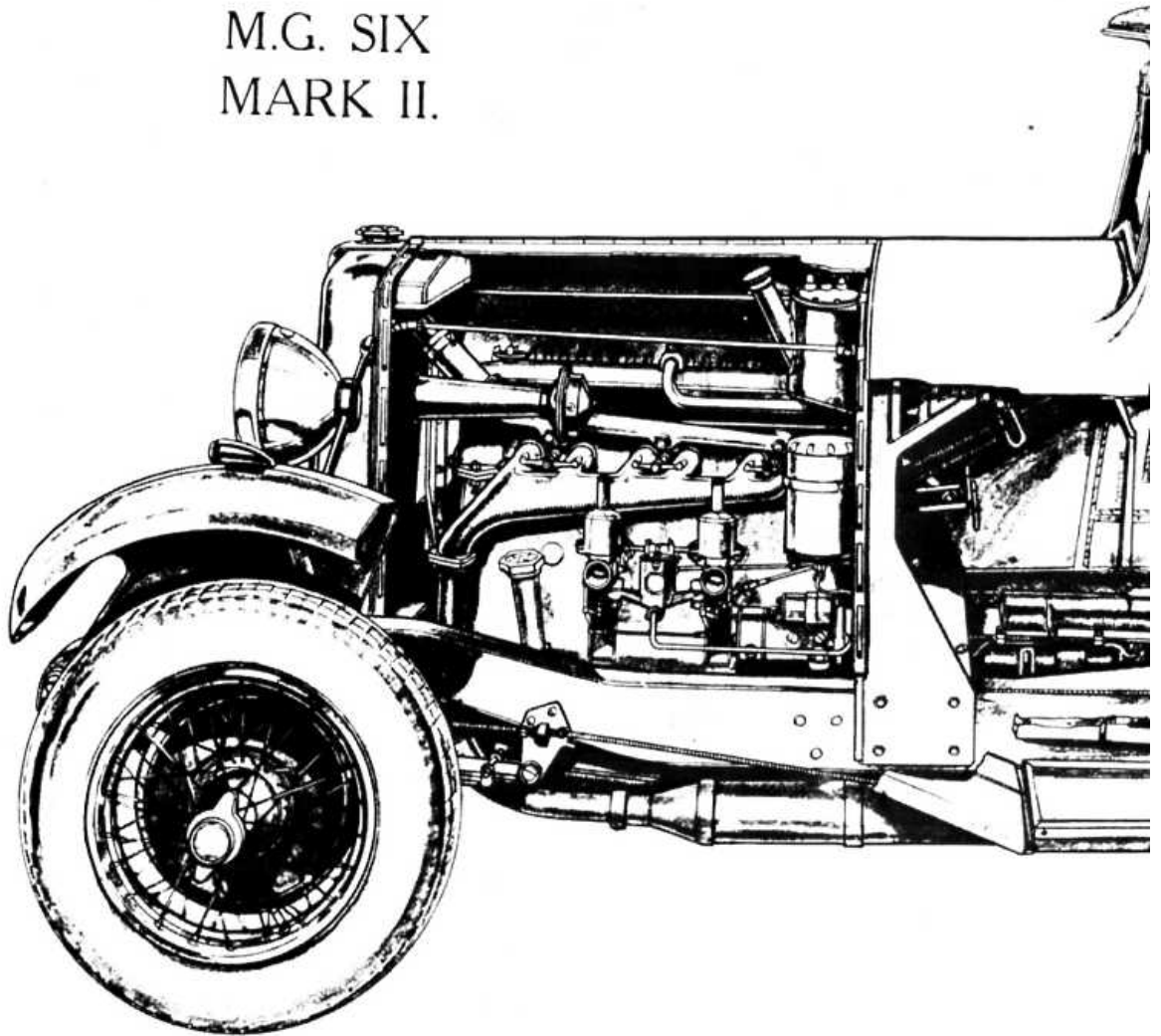
A sectioned drawing of the Mark II Six saloon appears in the photogravure pages.



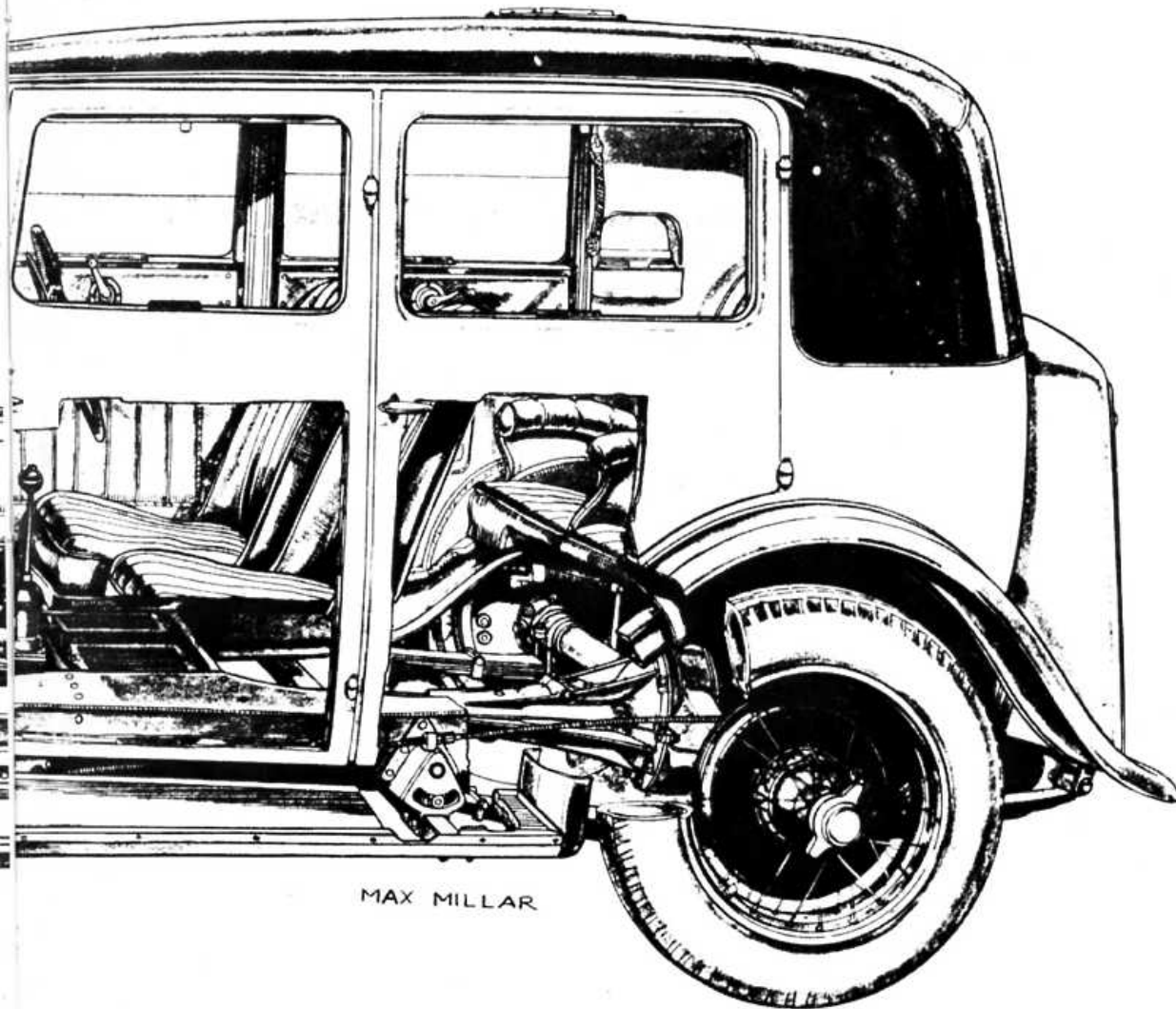
Amy Johnson, whose solo flight to Australia in 1929 in her D.H. 60G Gipsy Moth "Jason" made world news (as did her many other flights, and later those with her husband Jim Mollison), is presented with an M.G. Six Mark I saloon by Sir William Morris, later Lord Nuffield. The radiator mascot is a model of the Gipsy Moth, and alongside Amy Johnson is her mother.

The Autocar

THE 1930
M.G. SIX
MARK II.



An addition to the range of an increasingly popular Sports Car. Its features include a strong and very rigid frame, a high-efficiency engine and four-speed gear box with constant mesh helical gears for third speed.



MAX MILLAR

RACING AND THE M.G.

THE *AUTOCAR* is informed that there is no truth in the rumour that Sir William Morris has authorised the M.G. Car Co. to enter for races during the coming season. However, there are private entries for the "Double-Twelve-Hour." L. G. Callingham and H. D. Parker are driving an M.G. Six Mark II, and a privately organised team of three Midgets, probably under the leadership of C. J. Randall, will run in the same race.

INEXPENSIVE SPEED.

THE directors of the M.G. Car Co. in general, and Mr. Cecil Kimber in particular, are to be congratulated warmly on the fine plant, at the Pavlova Works, Abingdon-on-Thames, for production in considerable numbers of M.G. sports cars, which was formally opened on Monday last. At a very largely attended lunch Sir William Morris, Bart., made a characteristic and vigorous speech on the outlook for the motor industry and for M.G. sports cars in particular. He emphasised that very shortly enthusiasts would be able to obtain, in either the three- or the four-speed types, high-

efficiency cars moderate in running cost, distinctly attractive in price, and with an efficiency comparable to that of any rivals. Sir William paid warm tribute to the keenness and loyalty of the staff and workmen engaged in the production of the cars, and uttered a powerful plea for a common-sense attitude on the part of the Government towards the British motor industry.

The works themselves are admirable—new, large and airy, and already the M.G. Midget and the Mark I and Mark II Sixes are coming through in routine production on assembly lines. It is obvious that M.G. products will be well to the fore in the sporting events of 1930 and onwards.