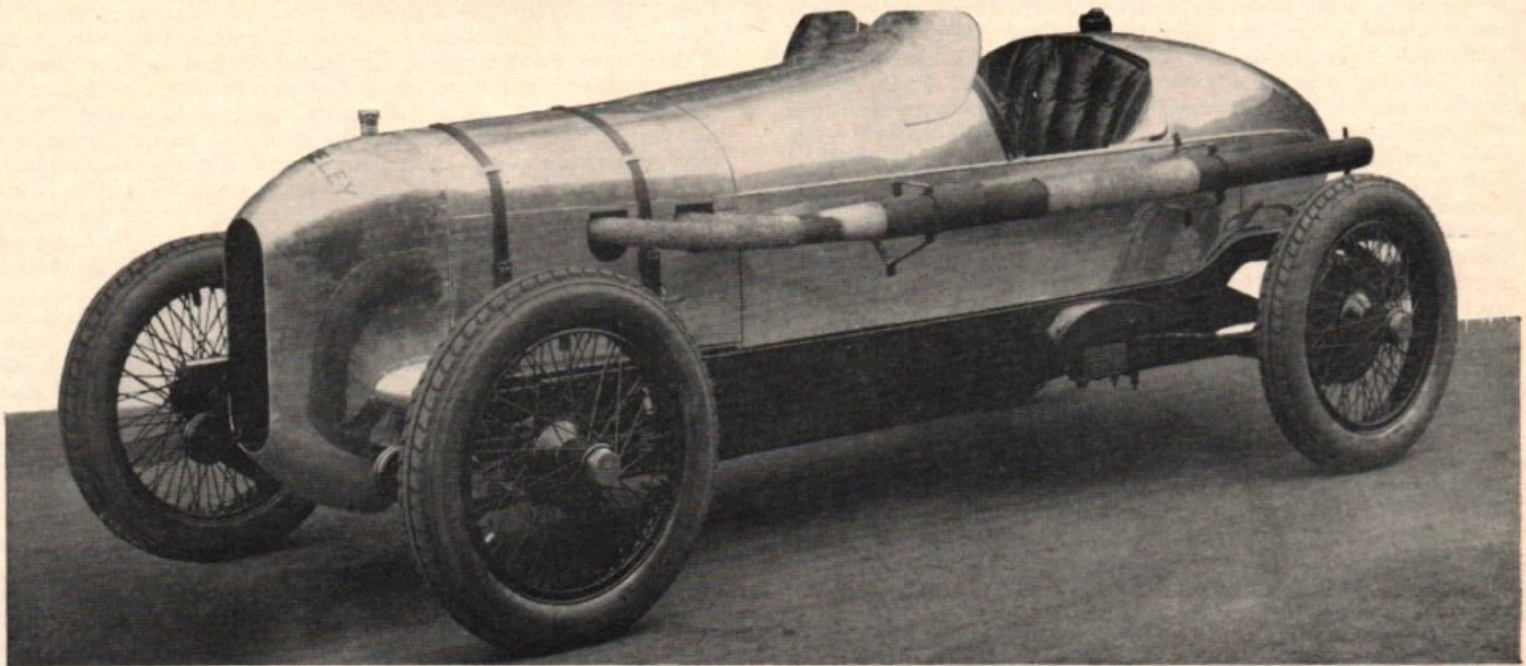


RACING WOLSELEYS



THE RACING VERSION of the Wolseley 15, of which two were built, one going out to the Argentine.

It so happened that when reporting last year's Clubman's Championship at Silverstone the Sports Editor of *Motor*, having commented that Alec Poole led from start to finish in the Saloon Car Race with his rapid Wolseley Hornet, went on to say that this is "probably the most successful Wolseley racer since the days of the Gordon Bennett cars." This reminded me that the exploits of the Wolseley racing cars at Brooklands from 1921 to 1930 must have been completely overlooked by this experienced writer; I do not propose to check on exactly how many races Poole won last season but I feel sure that the Wolseley racers of Capt. (later Sir) Alastair Miller, which I referred to briefly in the Wolseley Viper history published in the January issue, took more "firsts" than this saloon, which some of us might regard as just as much a front-drive B.M.C. Hornet or a Mini-Cooper as a Wolseley anyway, has ever done. Incidentally, I see that on the occasion in question Poole's little car lapped the Silverstone G.P. circuit at 81.81 m.p.h., admittedly in the wet, this being 6 m.p.h. slower than the speed at which Miller's Wolseley was capable of going round Brooklands 46 years earlier. Both had an engine capacity of approximately 1.3 litres. . . .

It is true that Wolseley built some highly exciting racers for the still-earlier Gordon Bennett contests but these were dismal failures. If success is measured in the number of places taken and records broken which can be advertised to the public, they were not in the same category as the Wolseleys Capt. Miller raced in the nineteen-twenties. Admittedly these scored only in English races, but the publicity value of their performances, at a time when both small and vast companies in the Motor Industry were struggling for a foothold towards prosperity during the post-Armistice slump, must have been considerable. So, as the third instalment of some winter Brooklands history, I propose to look in some detail at these convincing Wolseley performances. It may make for tedious reading to recapitulate such successes and failures race-by-race but only by so doing can the full weight and worth of Miller's efforts be appreciated; those allergic to the past can take comfort in the knowledge that this is the last article of its kind scheduled to appear in *MOTOR SPORT* for some time to come. But I know that many readers of various generations enjoy looking backwards as well as forwards at the motoring scene, so perhaps no apologies are needed for what follows.—Ed.

THE FIRST racing Wolseley was built by the Wolseley Tool and Motor Car Company in 1902, and the exercise was discontinued in 1905. These cars were notable because, with Napier, they were the sole representatives from Britain in Continental road races. They were the work of Mark Wild (chassis) and H. Pitt (engines), and all followed Herbert Austin's inclination to use nothing but horizontal engines. Anthony Bird, in a Profile, has told us that "In outright speed none of the Wolseleys was spectacularly fast. The designers' aim was to combine reasonable performance with reliability and good handling. Alas! the reliability they sought eluded them until nearly the end of their racing career." Speed is rather important in a racing car; reliability is also very important; the racing Wolseleys of a later era possessed both to a far higher degree than Austin's racers, as I shall endeavour to prove.

To dispose briefly of the Edwardian racing cars, the first was virtually a hotbed-up, stripped 20-h.p. touring car, used for sprints. Then came the 1902 G.B. car of a reputed 30 h.p., which clocked 43.6 m.p.h. over a flying kilometre at Welbeck but retired from the race with broken crankshafts (the plural is correct, as a spare had been fitted *en route*), although Austin himself was driving it. Three 4-cylinder 5½ in. × 5½ in. Wolseleys started in the 1903 Paris-Madrid, but Austin's and Foster's broke down and Porter's crashed, killing the mechanic. One of these Wolseleys retired from the Circuit des Ardennes that year but a 72-h.p. car driven by Girling finished ninth.

For the 1904 G.B. race a team of three 96-h.p. Wolseley "Beetles"

was entered, very exciting-looking cars, the pictures of which in "Ten Years of Motors and Motor Racing," by Charles Jarrott, thrilled me as a schoolboy. In spite of their formidable appearance they did no better than ninth (Girling) and 12th (Jarrott). In that year's Circuit des Ardennes Girling soon retired but Bianchi finished 12th, at 46.4 m.p.h. Britain was represented by a Napier and two 96-h.p. Wolseleys in the 1905 G.B. contest, and the latter came home eighth (Rolls) and 11th (Bianchi). Apart from insignificant sorties in minor events, that was all the racing this make did, before the First World War.

* * *

Wolseley had been taken over by the great Vickers armament concern in 1901 and when Austin resigned in 1905 they acquired the Siddeley Autocar Co. This gave them motor manufacturing and trading centres in Birmingham, London and Crayford. Before the 1914/18 War Wolseley was one of the largest motor manufacturers in the country, producing lorries, taxis, marine, aeroplane and stationary engines, and machine tools, in addition to cars. In order not to miss the small-car boom, they produced the Stellite, with 4-cylinder i.o.e. engine, 2-speed gearbox in the back axle and ¼-elliptic springing. In spite of extensions made to the Adderley Park factory in 1914 this small car was made at Aston and later at Ward End (to which Wolseley eventually moved) by the Electric and Ordnance Accessories Co., a Vickers' subsidiary. It proved a foil for the Standard, Singer, Swift and other light cars of the period but the war killed it off.

After the Armistice the Motor Industry met the difficult situation of a boom in motoring followed by a slump. This it often tried to counter with either a luxury model for the munitions' profiteers or a small car for demobbed officers and other ranks. Some makers went in for both, Wolseley among them. They had their semi-luxury 6-cylinder 20-h.p. £1,000 chassis ready by 1920, but they also catered for the small-car market. Deciding that the short-lived Stellite was not suited to the more sophisticated post-war demand, a new Wolseley Ten had been devised, which retained $\frac{1}{4}$ -elliptic springing and a worm-drive back-axle gearbox but had three forward speeds, the styling cleaned up, and an entirely new engine installed. During the war Wolseley had built Hispano-Suiza V8 aero-engines and from them had developed the very similar Wolseley Viper engine which had so effectively powered the S.E.5 fighters. For their post-war Ten and 15-h.p. cars Wolseley used engines in which slightly-inclined o.h. valves were operated by an overhead camshaft and rockers. From the front of the crankshaft a duplex chain drove a jack shaft, from which bevel gears took the drive *via* a vertical shaft, to the camshaft. This was claimed to be a refinement over the aero-engine, which had a normal vertical-shaft drive. That the war-time aero-engines had some influence on the car engines is unquestionable. But St. John Nixon, in his Wolseley history (Foulis, 1949), is going rather far in saying they "followed closely the Hispano engine," because not only did the car engines have the chain-driven jack-shaft but rockers were imposed between camshaft and valves, whereas the Hispano-Suiza car and aero-engines had no chain drive and the camshaft operated directly on the stems of the vertical valves. When the Wolseley Ten became the 11-22 in 1925 the chain was deleted and the o.h.c. Wolseley engines became "all-gear" power units, but the rockers were retained. The latter is true of all subsequent Wolseley o.h.c. engines; the Hornet had a dynamo incorporated in its vertical-drive, and later a chain o.h.c. drive, in two stages on the Hornet Specials.

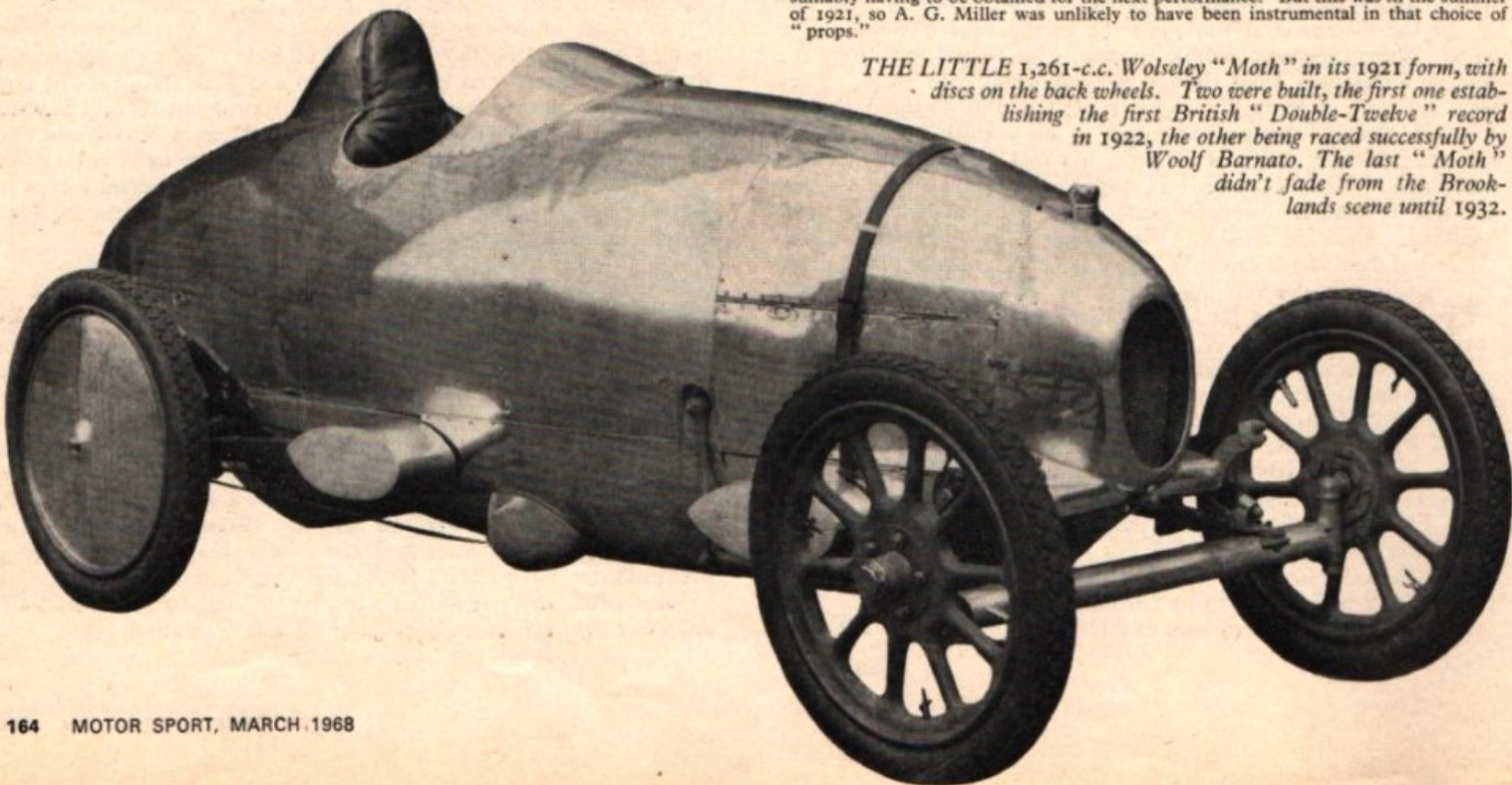
The new Wolseley Ten was announced at the beginning of November 1919 but delays ensued and it wasn't until late in 1920 that the Press was allowed to try the car, and it was not until the end of February 1921 that it was put into production. It was a well-made vehicle, but expensive at £545, and in spite of having complicated valve gear for a light car, its performance was distinctly pedestrian. Road-test reports spoke of these little o.h.c. Wolseleys running all-out at 40 m.p.h., with a level-road cruising speed of 30-35 m.p.h. The similar-sized Singer Ten, which also had a back-axle gearbox, and a smaller *side-valve* engine, sold for £385 in sporting form, and its top speed was quoted as about 45 m.p.h., while the normal two-seater Singer had much the same performance as the more expensive and elaborate Wolseley. So by the time the Wolseley Company was ready to build the Ten at the rate of about 60 a week it was no doubt very concerned to boost sales, to do which it had to overcome any idea that its little car was unusually sluggish! To combat the high price a Wolseley-Stellite version, without a lighting set or starter and of plainer finish, was offered at £465 in March 1921. Some special publicity was obviously vital if the Ten was to succeed, especially as a 7-h.p. flat-twin Wolseley was about to be introduced, to look after the inexpensive end of the light-car market. It was this, I assume, which

prompted Mr. A. J. McCormack, who had been appointed Joint Managing Director of the Wolseley Company in 1911, to agree with Capt. Miller (who had successfully raced the 1914 G.P. Opels at Brooklands during 1920) that he should run a team of Wolseley racers at the Track. At all events, Miller set to work and by the autumn of 1921 had the first of these racing Wolseleys in action. Admittedly, they could only win fame in this country, mainly on Brooklands Track, but large crowds were attending the re-opened Motor Course and race appearances there, and onslaughts on officially-timed records, would be a valuable source of publicity in the keenly competitive battle for light-car sales. And if Miller was discouraged by the low performance of the Wolseley Ten in catalogue form, at least he had good materials, in the form of Vickers' steels, to play with, and a £3-million Company behind him.

The car Miller evolved was an attractive single-seater of polished aluminium. In those days so much store was set by reducing wind-drag that the well-streamlined body, with high-sided cockpit and head-rest behind the driver, was augmented by fairings over the anchorages for the $\frac{1}{4}$ -elliptic springs and the brake gear and a fairing over the front axle, while when it first appeared discs covered the rear pair of artillery wheels. A small circular cowl enclosed the radiator, from which the characteristic indented Wolseley filler protruded, and the exhaust pipe ran along the n/s of the body. Although there was nothing unconventional in this excess of streamlining and the racing Wolseley Ten was a very pretty little car, it occasioned some journalistic comment, one paper explaining that it was not a submarine and another likening it to an aeroplane fuselage. All Miller had done was to sweep the bonnet and the scuttle (which was secured by a separate strap) up to a high cockpit so that the driver was enclosed up to his shoulders. Because he had adopted a central driving position the body was quite wide, presumably being built round standard chassis dimensions. Indeed, the chassis was frequently described as "practically standard" and although judging from the speed attained Miller presumably used a special camshaft, h.c. pistons, etc., and perhaps enlarged valves and ports for the Zenith carburettor, it is true that the engine dimensions remained at 65 x 95 mm. (1,261 c.c.) and that the back-axle gearbox, with a raised axle-ratio, was retained. As far as I have been able to ascertain, the cars were prepared, and their bodies built, in the Wolseley tool-room in Birmingham, four special engines being laid down, after which the cars were taken to Brooklands, where Miller housed them in his sheds and readied them for races. He later called the single-seater Tens "Moths," after a troupe of chorus-girls with whom he was friendly—Miller was a great patron of the theatre and the leading West End restaurants and clubs and in 1931 he directed the Midnight Revue "Kettner's Follies." (One wonders whether it was he who had been instrumental in getting George Robey to use a Wolseley Ten tourer, or "torpedo" as Wolseley still termed this body, in 1922 for his celebrated motoring act "Round in Fifty" at the London Hippodrome?*) He was a big man, so getting into the Wolseley

* This was not the first time a Wolseley light car had appeared on the stage, for one starred in "Out to Win" at the Shaftesbury Theatre. The story goes that two ladies who saw the play were so enamoured of the car that they insisted on having it. They went to the theatre, bought it, and drove off to Derby in it, a substitute presumably having to be obtained for the next performance. But this was in the summer of 1921, so A. G. Miller was unlikely to have been instrumental in that choice of "props."

THE LITTLE 1,261-c.c. Wolseley "Moth" in its 1921 form, with discs on the back wheels. Two were built, the first one establishing the first British "Double-Twelve" record in 1922, the other being raced successfully by Woolf Barnato. The last "Moth" didn't fade from the Brooklands scene until 1932.



must have presented difficulties; this prompted *The Light Car and Cyclecar* to publish a cartoon of him with one foot in the little Wolseley the other in the Viper, accompanied by this couplet:

The streamline car of modern times
Is long and lean and thin;
But drivers must be streamlined too,
Or else they can't get in!

The first Wolseley racer was ready for the last B.A.R.C. Meeting of 1921, being entered by Miller for the 75-m.p.h. Short and Long Handicaps. Alas, in the first race Walton's Bugatti lost its prop.-shaft and swerved into the Wolseley, hitting the "Moth's" o/s front wheel before overturning. Neither driver was hurt and Miller took a front axle from a standard Wolseley Ten that was in the Paddock and was able to start in his second race, but after an opening lap at a mere 56.4 m.p.h., he retired. This was an inauspicious start. But late in November Miller made a great impression with his new car by taking records in the 1½-litre class, although his engine was of less than 1.3 litres. As co-driver he had G. A. Vandervell, later of Vanwall fame, and between them they set out to take long-distance records held by Silver Hawk and A.C. cars, superintended by Mr. McCormack himself. To facilitate replenishment the Wolseley was provided with a long tube, terminating in a cap which could be removed through a hole cut in the n/s of the bonnet, for replenishing the sump after the old oil had been drained off by opening an accessible drain tap. The driver was given a little extra protection from a shallow cowl on the scuttle, but no aero-screen was fitted. The car had been prepared by Miller's mechanic Wood. It was on the Track for 6½ hours, during which time it broke the 250, 300, 400 and 500-mile, the 400 to 800 kilometres, and the three to eight-hour class records at speeds of from 64.3 to 82.82 m.p.h., the latter being its average for four hours. There were only two unintended stops, one for a puncture, caused by a nail, the other when Vandervell inadvertently turned off the fuel. Dunlop tyres were used and although the standard Wolseley had coil ignition, the racer used a B.L.I.C. ZA4 magneto. It ran on Shell petrol, Speedwell oil, Timken roller-bearings and Sphinx plugs. As a sort of preliminary canter, Miller had had the car on the Track in October 1921, making an officially-observed run of from 5 to 200 miles, at speeds of from 71.42 to 85.97 m.p.h., the latter over the f.s. 5-miles, as confirmed by Brooklands Certificates Nos. 894 to 903.

Nineteen twenty-two commenced for Capt. Miller with trying out a Wolseley 15 sports model, making business calls in London and at Brooklands in a Wolseley Ten (which a 'bus rammied in Piccadilly) and a Wolseley 15 saloon (he was using various "slave" cars at the time), and lunching with Mr. McCormack at the Bachelors Club to discuss future policy. He also attended B.M.C.R.C. Meetings, as a Committee Member, and went to a Kop hill-climb in a green Wolseley 15 saloon. Nights were often spent at the "Hand & Spear" while the racing Wolseley Ten and Miller's own Wolseley Viper were being prepared. On April Fools' Day the former won a 3-lap scratch match-race against the fastest motorcycle, Stewart's Trump-J.A.P., after a fine duel, at about 71 m.p.h. at a Public Schools M.C.C. Brooklands Meeting, Miller fitting this in between office work in London in the morning and dining in town that evening.

The season really opened with the Easter B.A.R.C. Meeting, at which McCormack had entered the little Wolseley for the Light Car Race and the 75-m.p.h. Short and Long Handicaps. After dining at the Vaudeville Club the previous night, Miller arrived at the Track and lapped at 63.34 m.p.h. in his first race, after which a plug blew out. The car was very slow, with laps at 63.26 and 64.38 m.p.h., in the next race, but matters improved in the "75 Long," and by lapping at 72.39, 77.09 and 73.24 m.p.h. Miller finished third, behind a Hampton and a Marlborough to which he had given an appreciable start. Then followed many journeys between London and the Track in a Wolseley saloon, while the Ten was tuned by a Zenith expert in preparation for another record-attack. At the J.C.C. Spring Meeting the Wolseley Ten was down on power but would have taken a third place had Miller not mistaken the location of the finishing line.

By now McCormack must have been wondering whether he had backed a sufficiently good horse, although he had the 1921 records to advertise and the car had shown that it was capable of some 90 m.p.h. On the Monday following the J.C.C. races, however, Miller commenced a very ambitious record-attack. It was permissible to try for a 24-hour record at Brooklands providing the car was locked-up during the night, and it was this "Double-Twelve" run at which the Wolseley was aimed. It was Miller's intention not only to establish the first British "Double-Twelve" record but to do this with a light car.

Very bad weather and some minor troubles hampered the first run and it was abandoned after eight hours. The next day Miller tried

again. He had established his depot at the Fork, with wooden jacks for tyre changing, and coloured signal flags. The Wolseley ran without wheel discs, with part of its radiator cowl cut back, and with a speed/r.p.m. chart attached to a steering-wheel spoke. The attempt started at 8.30 a.m., C. F. Temple driving. A change was made every two hours, Miller and then Vandervell taking over. The speed was held rather lower than before, but in spite of a nail puncture the average after four hours was 72.21 m.p.h. Soon after Vandervell had taken over the car came in, because metal straps holding the scuttle fuel tank had come adrift. A mechanic, inserted head first into the cockpit, effected temporary repairs. Twenty minutes later the tank had to be inspected again, and the body cut away to attend to it as it was fouling the throttle control. But thereafter the little car went on and on, and at the end of the day had taken five records, from 8 to 12 hours, at around 70 m.p.h.

Resuming on the Wednesday, Temple opened up too soon and although the engine oil had been warmed with a blowlamp, a big-end ran. Undaunted, the mechanics took off the undershield, dropped the sump, removed the offending con.-rod, fitted its piston to a new rod, and got the car restarted in under two hours. Later, however, a camshaft bearing seized. Still refusing to admit defeat, a camshaft was taken from a Wolseley Ten two-seater and the racer continued, although its speed seems to have been reduced by about ten m.p.h. Heavy rain in the morning returned in the evening but the run was successfully concluded, with 13 records broken, the "Double-Twelve" speed being 61.06 m.p.h. for the 1,465.6 miles. The best lap was at 79.05 m.p.h., suggesting that the Wolseley was either higher geared or less highly tuned than it had been for the November records; it weighed out at 1,536 lb.† The Dunlop tyres did well, one front one doing over 3,108 miles (800 of them on the Monday), the other front tyre ran the distance and had been on a back wheel during the Monday run, but two back tyres were changed, one punctured, the other cut. Speedwell oil and K.L.G. plugs were used. Miller, who at the time was contesting the "girl-bride" divorce case, celebrated at the Vaudeville Club, and by having a tooth out and buying a dog. . .

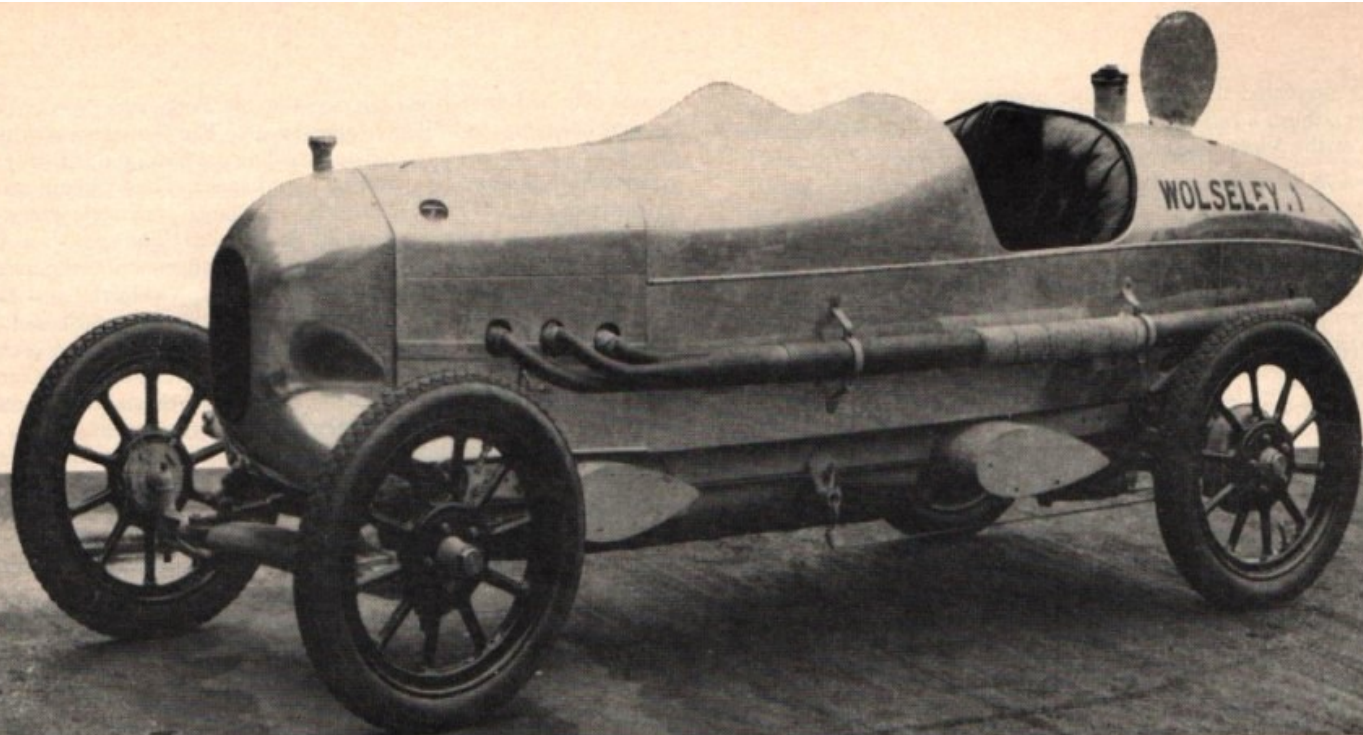
The Wolseley had created a lot of interest so was rested from the May Meeting. It ran at the Essex M.C. Royal Brooklands Meeting, without success. But before that Miller watched a B.M.C.R.C. Meeting, to which his father came in a new Wolseley Twenty, and the day after the Essex races he went for a drive in a new Wolseley Twenty tourer that had been sent down to him, perhaps as a replacement for the "slave" car which Col. Stewart had crashed. . .

As a result of the publicity Wolseley had gained through Miller's efforts on the Track, they introduced a sports version of the Ten, which, appearing first as a rather sober-looking disc-wheeled model, was catalogued for 1923 with artillery wheels, Hartford shock-absorbers, the extended oil-filler evolved for the racer, an outside exhaust system, and a guaranteed speed of 65 m.p.h. over the mile, these "Brooklands Speed" models, priced at £695, being built under the direction of Miller's competition department.

McCormack entered Miller for the "75 Long" at August but although lapping at 78.31 m.p.h. he was unplaced, after racing level with England's A.B.C., which was almost as fast.

There had been talk of entering three small Wolseleys for the I.O.M. road race but this did not materialise. However, Miller had proved a sufficiently good investment for Wolseley to extend their racing activities. I have said that the post-war models embraced a 15-h.p. as well as the Ten, this having virtually the same engine, but of 80×130 mm. (2,614 c.c.), with a spring-blade damper incorporated in the vertical drive to the o.h. camshaft, a 3-bearing crankshaft, and a 3-speed gearbox separate from the underslung worm back axle. Curiously, for a car of 9 ft. 10 in. wheelbase, ¼-elliptic springs sufficed for this chassis. The Wolseley Company had already made sporting bodywork on the 20-h.p. chassis and a bulbous-tail sports-tourer on this 15-h.p. chassis, so this image fitted in well with a racing programme. Miller had a conventional two-seater racing body put on one of these chassis, with cowed radiator, faired-in spring anchorages, outside hand-brake, and a fascia carrying splendid "period" instruments and air-pressure pump, etc. Head fairings behind driver and passenger were sometimes fitted. At first the racing Fifteen had bolt-on artillery wheels but these were later replaced by Dunlop centre-lock wire wheels shod with 33×4½ Dunlop Cord tyres, there being a transitional period when only the front axle was so converted. The axles, transmission and springing were standard, except for a raised

† After the record-breaking run the Wolseley Company was so confident that the racer closely resembled a standard model that it invited the R.A.C. to make an official comparison; the R.A.C. could not comply with this request.



THE TWO-SEATER racing Wolseley 10 which was built for the 1922 J.C.C. 200-Mile Race.

axle-ratio, but the cylinder head had very large ports and, as the valve gear of the racing Ten had given some anxiety, it was strengthened on this engine.

At the Southend Speed Trials in July 1922 H. J. Line and Miller were second in two classes, respectively with a 15-h.p. and a 10-h.p. Wolseley, but as these classes were for standard touring cars, presumably they were not using the racers on this occasion. In both cases they were beaten by Cushman's Bugatti, but the Ten was 4.6 sec. faster than the bigger Wolseley, so may have been the "Speed" model. While waiting for the new 15-h.p. racer Miller took the Ten out again to try to recover its 12-hour class record, which had been broken by Aston-Martin. K. Don, Brian McCormack and Miller took three-hour spells at the wheel but just after Miller had taken over he strained the gear-selector mechanism and had to hold the lever in top gear, so the run was concluded, after the 3, 5 and 6-hour records had been raised to 83.54, 82.9 and 82½ m.p.h. About a week later another attempt was made but was abandoned after two magnetos had given out, before which the car had lapped consistently at 85 to 86 m.p.h. On this occasion class records from 250 miles to 800 kilometres (seven in all) were taken, at around 82 m.p.h., the car running for just over six hours.

The new big Wolseley made its debut at an Essex M.C. Meeting at the end of July, with its "mixed" wheels, provision for carrying a spare wheel on the body side and the oil-filler protruding flush with the bonnet, but on the o/s. It netted a third place, as did the Ten in another race. Driven by B. McCormack, the smaller car won its race at the Ealing M.C.C. Meeting, at 75.12 m.p.h. Miller had no luck at the B.A.R.C. August Meeting, being too heavily handicapped, although the Ten lapped at 81.77 m.p.h. and the bigger Wolseley, its stroke increased to 140 mm., giving a capacity of 2,716 c.c., at 88.78 m.p.h. and, in a later race, at 89.58 m.p.h. The 2.7-litre engine was said to develop 77 b.h.p.

Meanwhile, there was another task ahead of Miller. In 1921 he could not run in the J.C.C. 200-Mile Race because the Wolseley had been built as a single-seater. For the 1922 race, with the Birmingham factory geared to his requirements, he was able to enter a very attractive polished aluminium Wolseley Ten two-seater, streamlined like the single-seater, but with Dunlop centre-lock wire wheels. It had a special camshaft, larger carburetter and aluminium pistons but otherwise followed the specification of the standard "Speed Model," for which customers could, if they wished, order aluminium pistons. The typical oil-filler arrangement was incorporated to assist pit-work and the bonnet was painted yellow to comply with race regulations. The fuel tank was in the tail, although gravity feed was retained, and the fly-off hand-brake had a button controlling its pawl. The car had to be entered in the 1½-litre class, although 239 c.c. undersize. Although running mostly last, delayed by needing water, a plug-change to cure pre-ignition, and because Miller stopped to inform officials that Chassagne's Talbot-Darracq had gone over the Byfleet banking, in spite of the fact that he was reported as finding the Wolseley hard to hold at the Vickers sheds, so that it finished outside the time limit

but was allowed to continue, to be placed 12th overall out of 13 finishers, or eighth and last in its class, at 66.2 m.p.h., it had shown reliability and was used subsequently for many shorter races.

The 15-h.p. racer, now with wire wheels all round, was driven in the Southsea Speed Trials without success and then, at the end of August 1922, was given the task of recapturing the "Double-Twelve" record, which the Wolseley Ten had lost to A.C. in the light-car class (71.23 m.p.h.) and to Spyker in the World's category (74.27 m.p.h.). The Wolseley carried a riding mechanic and made its first stop at 240 miles for the o/s front tyre to be changed, and for refuelling. Miller and Don shared the driving and stopped at the 173rd lap to change the o/s rear tyre, at the 208th lap for an unnecessary change of plugs, and at the 211th lap to change the magneto and the n/s rear tyre. After 270 laps a new contact-breaker was needed, as this, like the magneto, had shed a platinum point, and the n/s rear tyre was changed again, this being necessary also at 329 laps as a piece of steel had punctured it. The final stop that day was merely to give Miller a rest, as the Wolseley had been lapping at 88 to 94 m.p.h. It finished at 91 m.p.h., having been replenished during the stops. The wheels were now changed, in case tyre wear accentuated the wheel wobble which had been experienced. Fuel consumption had averaged 16 m.p.g. and the only real anxiety had been heavy rain early on and the breaking away of the exhaust pipes from the manifold, which altered the exhaust note and sent vivid tongues of flame curling within the bonnet. But the 12-hour record had fallen, at 76.2 m.p.h.

Given the time-keepers' signal the next morning, 17 min. 25 sec. were spent acetylene-welding the exhaust branches and examining the car. Don, tired out through coping with standard Wolseley suspension and uncomfortable seats, was not present and Miller had damaged his wrist, so Le Champion, who had ridden in the car the previous day, took over. For two hours the speed was badly down, at under 80 m.p.h., so a halt was called and when a defective exhaust valve was discovered the cylinder head was changed and the exhaust system again welded, in 48 min. 20 sec. Miller took the car on, but his wrist was troubling him, so Le Champion resumed, lapping at 90 to 92 m.p.h., with one lap at 93. As he came in with a badly skinned back a pin fell out of the torque-tube, and while it was replaced with a bolt from a lathe, S. C. H. Davis, who was reporting the run for *The Autocar*, was persuaded to take over.

The Wolseley then went on and on, holding 2,700 r.p.m. to lap at 90 m.p.h., although a tread left a tyre on one occasion. The run was completed at an average of 80.1 m.p.h. for the 1,922 miles 1,620 yards, beating the Spyker's record by 140 miles 614 yards. Thirty-nine Class D records were captured as well. This fine performance was achieved with the aid of Shell petrol, Speedwell oil, Lodge plugs, a B.L.I.C. magneto (or magnetos!), Dunlop wheels and tyres, a Zenith carburetter and Hartford shock-absorbers. The Wolseley Company stated that it was prepared to supply similar cars, guaranteed to lap the Track at 90 m.p.h., for £700 and one was delivered to the Argentine, after being tuned-up by Miller.

S. F. Edge tried to break this "Double-Twelve" record but his

Lanchester single-seater experienced steering gear trouble, which could not be rectified, although Miller sportingly offered the use of his Brooklands workshops. Eventually, after several failures, Duff's 3-litre Bentley put it out of Miller's reach, at 86.79 m.p.h.

As if Miller had not seen enough of Brooklands, he took the Ten, with a rather "peaky" radiator cowl, out for the S.E. Centre A.C.U. Meeting and won the Lightning Handicap, at 76.97 m.p.h.

Having done so well in Class D with the new big Wolseley, Miller devised a scheme for running it as a Class B car. In 1922 the revised International capacity classes were some years ahead and Class B covered cars of 101 to 125 cu. in., or a maximum of 2,048 c.c. So Miller used the resources of the Wolseley works to produce a special engine of 77.8 x 104.87 mm. (1,991 c.c.), which was installed in the 15-h.p. chassis. What might be described as the "Miller patent oil-filler extension" was used on the o/s, a big updraught Zenith carburettor fed into a two-branch manifold in this side and there was a breather on the valve cover. It was this engine with which, late in September, Miller attempted the Class B 12-hour record. An exhaust valve stuck up after six hours and the run had to be abandoned, but not before Miller and Le Champion had taken 12 records, from 150 miles at 80.84 m.p.h. to five hours at 75.26 m.p.h. He relied on his usual equipment, for which he must have drawn useful bonus money, but reverted to Sphinx plugs.

Next it was back to racing, Miller entering for all four handicaps at the Essex M.C. Brooklands Championship Meeting. He was well up but unplaced in the "Junior Short," in which George Newman drove the 200-Mile two-seater, but was third in the "Junior Long." Early in October 1922 Miller had the 2-litre-engined Wolseley out again, for a long-duration record bid. His depot was again at the Fork, Le Champion his co-driver. They had a wonderfully successful run, although discomforted by heavy rain which penetrated flying helmets and goggles, stopping only to refuel and to replace as a precaution first the n/s and then the o/s Dunlop tyres. The Wolseley, running on Shell aviation spirit and Speedwell "White Ideal" oil, mopped up 23 Class B records, starting after five hours at 78.2 m.p.h. and continuing for 12 hours at 77.93 m.p.h. The car was in action from 7.45 a.m. to 7.45 p.m., the stops occupying 7 min. 53 sec., including pulling up and restarting.

For the last B.A.R.C. Meeting of 1922 Miller entered the single-seater Ten and Newman the 200-Mile car, which had black wheels. The former never got going and a best lap at 77.81 m.p.h. availed the latter nothing. Miller brought out the 2.7 Wolseley for the "90 Short" but in spite of lapping at 92.23 m.p.h. a place again escaped him, until the "90 Long," when this car came home third behind Joyce in the very fast 1½-litre A.C. and Cook's 30/98 Vauxhall, the Wolseley lapping at 74.68, 91.5 and 92.23 m.p.h. There was still the "75 Long," in which Miller and Newman kept close company throughout, the latter, giving the single-seater 10 sec. start, being 1.96 m.p.h. slower on the first lap, but 1.53 m.p.h. faster on the next round, so that, while Miller was fractionally quicker on his last lap, Newman won, although the official race-speed was obviously mis-declared. Clement's scratch Bentley brushed between them to take second place, with Miller third.

The Track was then booked for an attempt by the big Wolseley on the class hour record, but it was never achieved, perhaps because the car was called in for being excessively noisy. At the same time Mrs. Knox took out the 200-Mile car and averaged 71.16 m.p.h. for an hour's lappery, an unofficial "record" but good publicity.

At the Armistice charity Brooklands Meeting the Wolseleys were decorated with Flanders poppies but Newman's non-started in the first race and both were off-form in the next, although Newman finished third in the 100-m.p.h. Handicap. That concluded the Wolseley team's first full season, with which Miller and McCormack cannot have been displeased.

In spite of rumours to the contrary, the Wolseleys continued to race in 1923 under the control of Capt. A. G. Miller, who had spent the winter in Monte Carlo, trying his luck at the Casino, calling at Voisin's *en route* to try and fix an agency. Indeed, a second single-seater Ten was built, to the order of Capt. Woolf Barnato, who was later to control the destiny of Bentley Motors and race Bentleys at Le Mans. His car was virtually identical to Miller's, even to the polished aluminium body, and it was now that the name of "Moth" came in useful, the older car being called "Moth I," the new one "Moth II." Both had the original shape radiator cowl, with its small circular air entry. Miller spent much time in his sheds working on them, staying overnight at the "Ship" in Weybridge.

At the B.A.R.C. Easter Meeting Newman took over the big Wolseley in 2-litre form but it soon fizzled out. Barnato then appeared on

"Moth II" in the "75 Short" and, lapping at a rousing 84.41 m.p.h., came home second, behind Bertelli's Enfield-Allday. Miller and Newman drove "Moth I" and the 200-Mile car, respectively, from the limit positions in the "90 Short" but fastest laps at 80.72 and 76.97 m.p.h. availed them nothing. The 2-litre car didn't get going in the "90 Long" but the 75-m.p.h. Long Handicap produced a memorable Wolseley race, the two "Moths" starting together and Miller doing his initial lap 1.11 m.p.h. faster than the "customer." Barnato was, however, 2½ m.p.h. quicker on the next lap and fractionally faster on the third, so that as the two little silver cars ran up the Finishing straight Barnato was about a length ahead as they crossed the line, his average 78.74 m.p.h., a veritable battle of the "Moths." Whether Miller let the "customer" win, or whether the newer car had the true advantage, we shall never know, but it was a great race, Champion's A.B.C., which was third, being passed by both Wolseleys on the last lap. Scarcely anyone can have noticed that Culmer had non-started in the 200-Mile car, entered by Harveyson, in two races. Miller celebrated that evening at the Savoy.

Having begun the season so well, Miller sought for further victories. In a mixed car-and-motorcycle race at a Public Schools M.C.C. Meeting Le Champion, in one of three Wolseleys running, was second to Eyston's Aston-Martin. The next victory came at the J.C.C. Spring races at the Track. After Newman's Ten had taken third

SUCCESSSES OF THE MILLER WOLSELEYS IN THE MAIN BROOKLANDS RACES

"Moth I"

- 1921 B.A.R.C. Easter Meeting
75-m.p.h. Long Handicap (A. G. Miller), 3rd.
- 1922 B.A.R.C. Autumn Meeting
75-m.p.h. Long Handicap (A. G. Miller), 3rd.
- 1923 B.A.R.C. Easter Meeting
75-m.p.h. Long Handicap (A. G. Miller), 2nd.
- 1923 B.A.R.C. Whitsun Meeting
75-m.p.h. Long Handicap (A. G. Miller), 3rd.
- 1927 Surbiton M.C. Meeting
50-Mile Handicap (D. Froy), 1st, at 82.31 m.p.h.

"Moth II"

- 1923 B.A.R.C. Easter Meeting
75-m.p.h. Short Handicap (W. Barnato), 2nd.
75-m.p.h. Long Handicap (W. Barnato), 1st, at 78.74 m.p.h.
- 1923 B.A.R.C. Summer Meeting
75-m.p.h. Long Handicap (W. Barnato), 2nd.
- 1923 B.A.R.C. August Meeting
75-m.p.h. Short Handicap (W. Barnato), 3rd.
- 1924 B.A.R.C. Easter Meeting
75-m.p.h. Short Handicap (W. Barnato), 3rd.
75-m.p.h. Long Handicap (W. Barnato), 1st, at 79.25 m.p.h.
- 1924 B.A.R.C. August Meeting
90-m.p.h. Short Handicap (W. Barnato), 2nd.
75-m.p.h. Long Handicap (W. Barnato), 3rd.
- 1924 B.A.R.C. Autumn Meeting
90-m.p.h. Short Handicap (W. Barnato), 1st, at 76.5 m.p.h.
90-m.p.h. Long Handicap (W. Barnato), 2nd.
- 1930 B.A.R.C. August Meeting
Cornwall Junior Short Handicap (A. G. Miller), 1st, at 71.08 m.p.h.

200-Mile Race Car

- 1922 J.C.C. 200-Mile Race (A. G. Miller), 12th, at 66.2 m.p.h.
- 1922 B.A.R.C. Autumn Meeting
75-m.p.h. Long Handicap (G. Newman), 1st (see text).
- 1922 Armistice Brooklands Meeting
100-m.p.h. Handicap (G. Newman), 3rd.
- 1923 B.A.R.C. August Meeting
75-m.p.h. Short Handicap (G. Newman), 2nd.
- 1923 J.C.C. 200-Mile Race (G. Newman), 10th, at 76.25 m.p.h.

Wolseley 15 (2.7-litre engine)

- 1922 B.A.R.C. Autumn Meeting
90-m.p.h. Long Handicap (A. G. Miller), 3rd.
- 1923 B.A.R.C. Summer Meeting
90-m.p.h. Long Handicap (A. G. Miller), 2nd.

Wolseley 15 (2-litre engine)

- 1923 B.A.R.C. Whitsun Meeting
90-m.p.h. Short Handicap (G. Newman), 3rd.
90-m.p.h. Long Handicap (G. Newman), 3rd.

N.B.—These cars were built primarily to break records and an account of their achievements in this field is given in the text, together with their not inconsiderable successes at the lesser Brooklands Meetings.

BEST LAP SPEEDS IN B.A.R.C. RACES

1921	"Moth I" (A. G. Miller)	56.44 m.p.h.
1922	"Moth I" (A. G. Miller)	81.77 m.p.h.
	200-Mile Race car (G. Newman)	79.43 "
	Fifteen (2.7-litre engine) (A. G. Miller)	92.25 " *
	(* On two occasions)		
1923	"Moth I" (A. G. Miller)	88.15 m.p.h.
	"Moth II" (W. Barnato)	87.22 "
	200-Mile Race car (G. Newman)	82.59 "
	Fifteen (2-litre engine) (G. Newman)	85.87 "
	Fifteen (2.7-litre engine) (A. G. Miller)	91.89 "
1924	"Moth I" (Norris)	79.05 m.p.h.
	"Moth II" (W. Barnato)	85.72 "
	200-Mile Race car (Randall)	61.13 "
1925	"Moth" (J. Noel)	68.22 m.p.h.
1926	"Moth I" (A. G. Miller)	86.92 m.p.h.
1929	"Moth II" (A. G. Miller)	76.85 m.p.h.
1930	"Moth II" (C. Paul)	84.27 m.p.h.
1932	"Moth" (A. Lyon-Clark)	72.39 m.p.h.

place in the "Junior Long" and Miller had been awarded the Sealed Handicap, at 78.06 m.p.h., with Newman second, Miller won the Grand 10-lap Handicap in fine style, at 81.25 m.p.h., from an A.B.C. and Eyston's Aston-Martin, Newman experiencing mis-firing in this race. At this meeting bonus was earned by running on 28 x 3½ Belgrave Cable Cord tyres.

The Ealing & Dist. M.C.C. races brought further honours. Eyston's 200-Mile Aston-Martin, doing close on 100 m.p.h., outmatched Newman's Wolseley in the 3-lap 1½-litre event, but it was second, well ahead of a Horstman, and then Miller took second place in the unlimited race behind Temple's Horstman, with Newman in the big Wolseley third.

Even better publicity was to accrue from the results of the B.A.R.C. Whitsun Meeting. Barnato's "Moth II" opened with a lap at 83.7 m.p.h. but was unplaced. Newman's 200-Mile car non-started and both "Moths" were unplaced in the "75 Short" but Newman, driving the 2-litre Wolseley, was third in the "90 Short," with a best lap at 84.41 m.p.h., which was nearly equalled by Barnato's "Moth II" (83.9 m.p.h.); it retired from the "90 Long" but the 2-litre car, increasing its lap-speed to 85.87 m.p.h., got Newman a third place, which Miller repeated in the "75 Long" in "Moth I" with a splendid fastest lap of 87.22 m.p.h., the 2-litre and "Moth II" defaulting.

At the Essex Meeting Miller's Wolseley won the Senior Short Handicap at 75 m.p.h. By the time the B.A.R.C. Summer Meeting came round it might have been expected that the handicappers would have tied up the Wolseley's chances. Perhaps the number entered confused them, however, for although the 75-m.p.h. Short Handicap produced nothing for them, in spite of "Moth I" lapping at 88.15, "Moth II" at 84.84, and the 200-Mile car at 82.58 m.p.h., Barnato was second in the "75 Long" (best lap=85.57 m.p.h.), although no rival for Marshall's Bugatti. Miller's 2.7 Wolseley III filled the same place in the "90 Long" (best lap=91.89 m.p.h.) although caught by Fiennes' Bentley. Successes continued to be scored almost to the point of monotony. At the Surbiton M.C. Meeting Miller took one second and three third places in various Wolseleys, apart from winning the 75-m.p.h. Short Handicap at 82.31 m.p.h. De Heaume drove "Moth I" at this meeting and Lucas a standard sports model, which he also ran at Bexhill. The B.A.R.C. August Meeting saw Newman finish second and Barnato third, in the "75 Short," with less than 2 m.p.h. lap-speed between the 200-Mile car and "Moth II," but Miller used an A.C. to win at an Essex M.C. Meeting.

Finally, so far as 1923 is concerned, H. J. Line was given the task of preparing Newman's two-seater for the 200-Mile Race, his mechanics having been employed on the record bids. The engine out of "Moth I" was apparently used, with a solid head gasket and a longer suction-pipe on the oil pump to obviate starvation when first started-up. More castor action cured the tendency to wander about the Track and Newman trained by running round Hyde Park! The car, now on Englebert tyres, made another steady run, non-stop this time, finishing 10th in its class, last but for the Hillman, although others failed to get home within the time-limit. It averaged 76.25 m.p.h.

Mr. McCormack resigned from the Wolseley Directorship at the end of 1923 and the link between Alastair Miller and Wolseley was severed. During the 1924 racing season, however, Barnato continued to race his "Moth II," taking two second and two third places at the main Brooklands Meetings and winning the 75-m.p.h. Short Handicap at Easter at 79.25 m.p.h. and the "90 Short" easily at the Autumn races, at 76.5 m.p.h. Pop Cory, the actor, who had had a share in the Viper, ran "Moth I" without success, Norris driving it on one occasion, and Randall entered the 200-Mile car, without gaining a place. Barnato had a number of retirements, the radiator leaking at a J.C.C. Meeting, although he took another second, on a day when Miller took time off from Bianchi preoccupations to drive his old "Moth," which retaliated by shedding a rocker. He drove it at other small meetings at the Track, getting a third in an M.C.C. race, while Cante appeared with the 200-Mile car in a 50-mile Handicap at an Essex M.C. Meeting, achieving a lap lead before serious misfiring caused it to retire.

By 1925 these cars, the design of which originated circa 1919, seemed at last to have ended their long and auspicious racing career, although Miller used "Moth I" for the ambitious Essex M.C. 100-Mile Race, and got as high as second in five laps, before No. 4 plug sooted up, a difficult one to remove, after 26 of the 37 laps. J. Noel entered one, painted black, its engine size declared as 67 x 90 mm. (1,270 c.c.), for the Whitsun and Summer Brooklands races, when it ran badly. (Unless it was the 200-Mile car this may have been "Moth I," as I believe Miller painted it about this time and displayed the name "Moth" on the radiator cowl in big letters, for the first time.)

J. S. Worters and Douglas Hawkes were to have driven Barnato's "Moth II" at the Autumn Meeting, but non-started. Miller made a re-appearance with "Moth I," now with a red stripe along its body and red bonnet, at the 1926 B.A.R.C. Autumn Meeting but although it was going extremely well, he was out-classed. The following year "Moth II" passed into the hands of F. W. M. Matthews and had black wire wheels (perhaps from the 200-Mile car?), this fact even being noted in the race-card. It cost him a three-sov. entry fee but never appeared. Later in the season, however, Dudley Froy drove "Moth I" to a convincing victory in the 50-Mile Handicap at a Surbiton M.C. Meeting, winning by 1½ miles, at 82.31 m.p.h. Even now, the "Moths" refused to lie down and die.

Miller entered one (as the original car) in 1928, still with aluminium body and black wheels, in one race, for K. C. Dodson, who lived in a nice house in Hampstead (today occupied by the attractive and well-mannered young ladies of St. Godric's Secretarial College), but it failed to appear, so was probably too slow to be any use. But in 1929 a rather remarkable thing happened.

It seems that Miller was told that a racing Wolseley had appeared in a showroom in Henley-on-Thames. Hastening there, he apparently found it to be "Moth II," in good fettle. The salesman spun him a tale, perhaps telling him that it had been raced by Segrave or Malcolm Campbell, but Miller was able to date the car as already ancient and obtain it at his price. He had set his heart on winning the Founders' Gold Cup, awarded for the Cornwall Junior Short Handicap at the 1930 B.A.R.C. August Meeting. Dodson and Miller shared the car during 1929 but made no impression. It came out again at the 1930 B.A.R.C. Whitsun Meeting, with a good handicap. Then, at the 1930 August Meeting, entered by Dodson, Miller started 4 sec. after Horsman's Triumph Super Seven single-seater, caught Horsman, lapped at 71.45 and 83.28 m.p.h., and stayed ahead to the end, winning the magnificent cup at a speed of 71.08 m.p.h., pursued by S. C. H. Davis in the experimental blown Riley 9, which, boiling, was 14 sec. behind but just pipped the Triumph to the finish by 1 sec., as Victor Gillow slid along the Railway straight underneath his s.v. Riley, which had burst a tyre—exciting; I was there to see it. The Autocar brushed the winning Wolseley off as "a quaint-looking car, rather like a goldfish on wheels," but I am sure that as Miller climbed out of the deep cockpit of the nine-year-old racer, he must have felt very pleased with himself. After all those years its speed had hardly diminished and it had taken the Gold Cup from a field of 13, which included Bouts' 5-litre Sunbeam, Dunfee's Ballot and Waite's works supercharged Austin 7. . . .

"Moth II," still aluminium and black, ran again, driven by Bamber, and at the Autumn Meeting by Cyril Paul, but it was now out-handicapped. It was for sale in Gt. Portland Street in 1931, at £125. That year the axe had fallen on pre-1931 cars at Brooklands, but in 1932 P. C. A. Thompson and A. Lyon-Clark somehow resuscitated one, which they soon painted green and black, and later red. This did nothing to alleviate a long run of trouble, and that was that. . . . But these little Wolseleys hadn't done too badly in their ten seasons of activity.

The effectiveness of the "Moth" engine was perpetuated in the Becke Powerplus, in which the spare engine laid down by Wolseley when their racing project was initiated was installed, circa 1928. This car performed creditably at Shelsley Walsh, etc., for many years both before and after the war and is, of course, still in existence, its capacity now reduced to under 1,100 c.c. The two-bearing crankshaft stands up to a boost of some 15 lb./sq. in. and a c.r. in the region of 9.0 to 1, but the original c.i. flywheel disintegrated during the Brighton Speed Trials one year, with unhappy results.

What became of the Miller Wolseleys is a mystery. All vanished without trace. During the war I heard that one of the "Moths" had been owned by a Law graduate at Oxford and was in a shed behind the "Three Tuns" at Henley. No trace of it was found, but it appears to have been converted into a two-seater by flattening and widening the bonnet, and fitting fixed cycle wings, lamps and horn. It had been registered for road use as UD 1570 and this, and its radiator cowl and artillery wheels, suggest that it was "Moth I."

Although this saga of the racing Wolseleys ends in 1930, the Track performance of the late 6-cylinder 57 x 83 mm. (1,271 c.c.) Wolseley Hornets, notably as modified by Michael McEvoy, must not be overlooked. Kay Petre, B. H. Wickens and Vic Derrington ran them in 1932, but even the last-named, with a blown car, did not go as fast as the old "Moths." But a team of them, driven by F. S. Hutchens, Wickens and E. J. Erith, won the L.C.C. Relay Race that year, at 77.57 m.p.h.—W. B.