

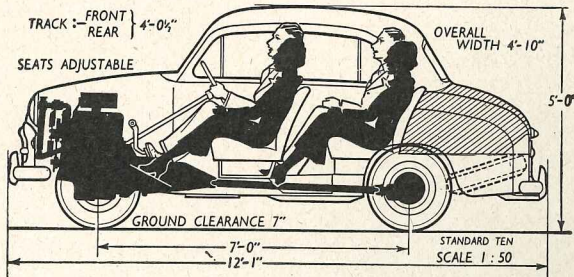
# The Motor Road Test No. 23/54 (Continental)

**Make:** Standard

**Type:** Ten

**Makers:** Standard Motor Co. Ltd., Coventry

## Test Data



**CONDITIONS.** Warm, dry weather with strong wind.

### INSTRUMENTS

Speedometer at 30 m.p.h. .. .. 3% fast  
 Speedometer at 60 m.p.h. .. .. 9% fast  
 Distance recorder .. .. 1% fast

### MAXIMUM SPEEDS

**Flying Quarter Mile**  
 Mean of four opposite runs .. .. 69.0 m.p.h.  
 Best time equals .. .. 73.2 m.p.h.

### Speed in Gears

Max. speed in 3rd gear .. .. 53 m.p.h.  
 Max. speed in 2nd gear .. .. 33 m.p.h.

### FUEL CONSUMPTION

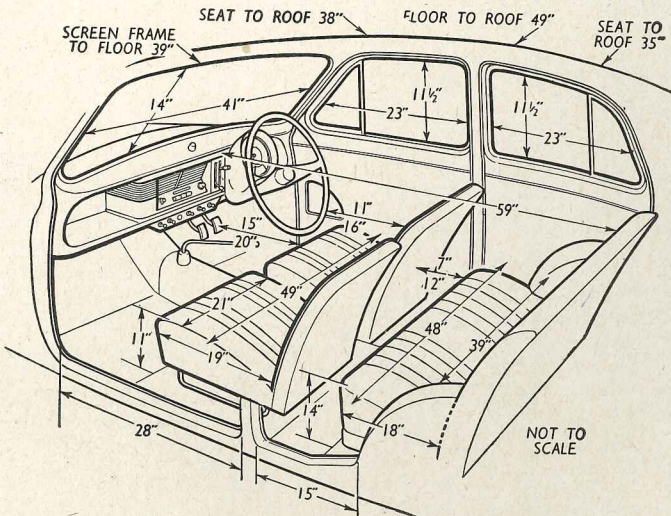
50.5 m.p.g. at constant 30 m.p.h.  
 46.5 m.p.g. at constant 40 m.p.h.  
 41.5 m.p.g. at constant 50 m.p.h.  
 34.0 m.p.g. at constant 60 m.p.h.  
 Overall consumption for 3,843 miles, driven very hard, 111.9 gallons, = 34.4 m.p.g.  
 Fuel tank capacity 7 gallons.

### ACCELERATION TIMES Through Gears

0-30 m.p.h. .. .. 7.5 sec.  
 0-40 m.p.h. .. .. 13.2 sec.  
 0-50 m.p.h. .. .. 22.2 sec.  
 0-60 m.p.h. .. .. 38.3 sec.  
 Standing Quarter Mile .. .. 25.5 sec.

### ACCELERATION TIMES on Two Upper Ratios

	Top	3rd.
10-30 m.p.h. .. ..	15.0 sec.	9.8 sec.
20-40 m.p.h. .. ..	16.4 sec.	11.3 sec.
30-50 m.p.h. .. ..	18.7 sec.	15.0 sec.
40-60 m.p.h. .. ..	26.9 sec.	—



### WEIGHT

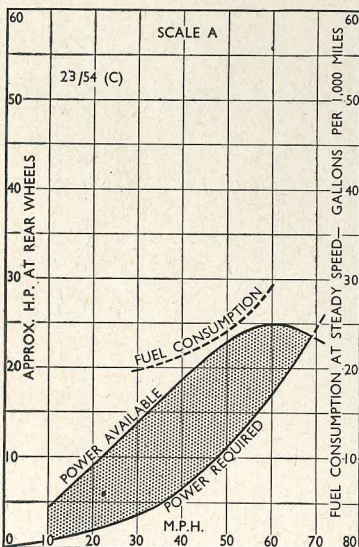
Unladen kerb weight .. .. 15 cwt.  
 Front/rear weight distribution .. 57/43  
 Weight laden as tested .. .. 18½ cwt.

### HILL CLIMBING (at steady speeds)

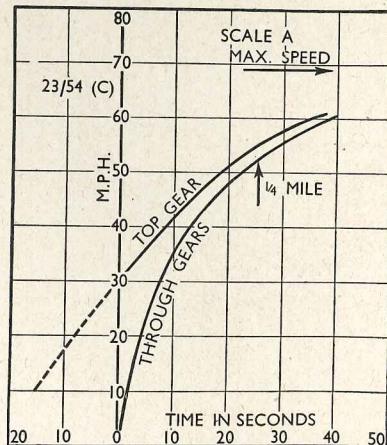
Max. top gear speed on 1 in 20 .. .. 51 m.p.h.  
 Max. top gear speed on 1 in 15 .. .. 42 m.p.h.  
 Max. gradient on top gear .. .. 1 in 13.2 (Tapley 170 lb./ton)  
 Max. gradient on 3rd gear .. .. 1 in 9.0 (Tapley 250 lb./ton)  
 Max. gradient on 2nd gear .. .. 1 in 5.9 (Tapley 375 lb./ton)

### BRAKES at 30 m.p.h.

0.94 g retardation (= 32 ft. stopping distance) with 80 lb. pedal pressure  
 0.90 g retardation (= 33½ ft. stopping distance) with 75 lb. pedal pressure  
 0.62 g retardation (= 48½ ft. stopping distance) with 50 lb. pedal pressure  
 0.28 g retardation (= 108 ft. stopping distance) with 25 lb. pedal pressure



Drag at 10 m.p.h. .. .. 26 lb.  
 Drag at 60 m.p.h. .. .. 106 lb.  
**Specific Fuel Consumption** when cruising at 80% of maximum speed (i.e. 55.2 m.p.h.) on level road, based on power delivered to rear wheels .. .. 0.84 pint/b.h.p./hr.



## Maintenance

**Sump:** 7 pints, S.A.E. 20 (winter), S.A.E. 30 (summer). **Gearbox:** 1½ pints, S.A.E. 30. **Rear Axle:** 1½ pints S.A.E. 90 E.P. gear oil. **Steering gear:** ½ pint S.A.E. 90 E.P. gear oil. **Radiator:** 7 pints (2 drain taps) Chassis lubrication: By grease gun every 1,000 miles to 21 points. **Ignition timing:** 6½° before T.D.C. **Spark Plug gap:** 0.032 in. **Contact breaker gap:** 0.015 in. **Valve timing:** I.o., 10° B.T.D.C.; I.c., 50° A.B.D.C.; E.o., 50° B.B.D.C.; E.c., 10° A.T.D.C. **Tappet clearances:** (Cold) Inlet and Exhaust 0.010 in. **Front wheel toe-in:** Parallel to ¼ in. toe in. **Camber angle:** 2° positive (unladen). **Castor angle:** 1° positive (unladen). **Tyre pressures:** Front 22 lb., rear 20 lb., (two up), 24 lb. (fully laden). **Brake and Clutch fluid:** Wakefield Girling (Crimson). **Battery:** Lucas GTW, 7A 12-volt 38 amp./hr. **Lamp bulbs:** Headlamps (Home), 42/36 watt (Lucas No. 354) Sidelamps and rear number plate lamp, 4 watt (Lucas No. 222). **Stop/tail lamps,** 6/18 watt (Lucas No. 361). **Trafficators,** 3 watt (Lucas No. 256). **Warning lights,** 2.2 watt (Lucas No. 987). **Interior light,** 6 watt, (Lucas Festoon Type No. 254).

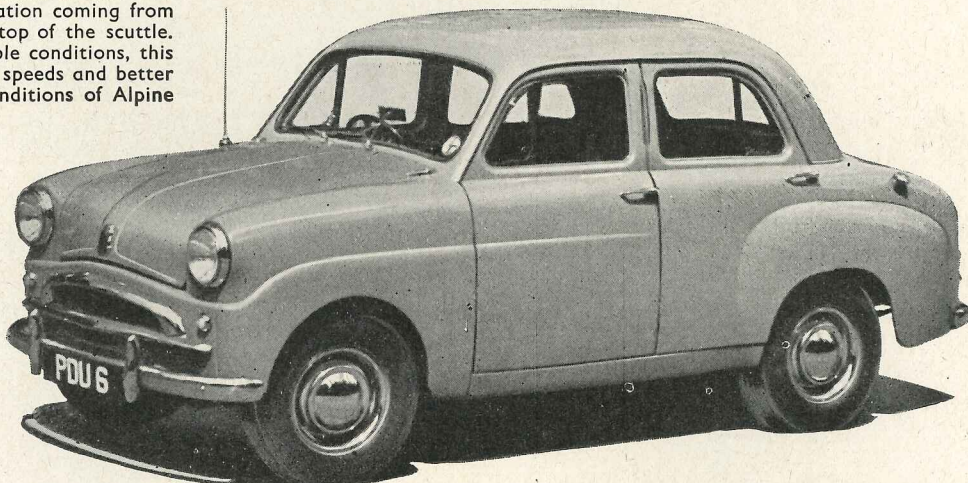
# The STANDARD Ten



FOUR DOORS incorporate wind-down windows and also hinged ventilation panels, further ventilation coming from an air intake to the optional heater, on top of the scuttle. Capable of 70 m.p.h. in slightly favourable conditions, this model gives 40 m.p.g. at normal touring speeds and better than 30 m.p.g. in the most arduous conditions of Alpine driving.

CUSTOMARILY, when a new small car is announced in Britain, we are able to test an example during a period of about 10 days and to drive it for about 1,000 miles. In the case of the new Standard Ten, however, we have been allowed to treble our usual test period, and to include a 3,000-mile continental tour in a test extending to 4,000 miles. It was only at the conclusion of all this running, after the car had been hustled through five countries and over 20 major and minor Alpine passes, that we submitted the car to our usual performance tests, with no more tuning or preparation than ourselves checking the fuel filter, sparking plug gaps and contact-breaker setting.

Undoubtedly, the merits of the Standard Ten which showed up during this extended test are the valuable ones which should ensure its being in brisk demand. Superficially, it may have rather less "charm" than have one or two other small cars of approximately comparable cost. But, in very strenuous use, the Standard Ten gave absolutely no trouble save for failure of the horn (which in any case was too muted for fast driving in France), and appeared



ready to go on being driven hard over bad roads almost indefinitely. Driven around the Alps almost as fast as it would go, following parts of the Alpine Rally, the car's fuel consumption never quite fell to 30 m.p.g., despite incessant use of 2nd and 3rd gears, oil was needed only at the rate of a pint every 1,000 miles, and no water at all was required. New this model may be, but it evidently has benefited fully from the manufacturer's experience with the closely related "Eight" which they put into large-scale production last year.

Incorporating the main components of the Standard Eight, but with enlarged cylinder bore, modified gear ratios, and fuller equipment, the Standard Ten is still essentially a small car with very low running costs, but offers appreciably more performance, much greater refinement of running and more comprehensive furnishing than does the lower-priced model. Conventional instead of "hammock" seats, wind-down instead of sliding windows, and full trimming of the interior, are coachwork changes which beyond all doubt will appeal to a majority of purchasers, even although they reduce fractionally some of the interior dimensions.

Like most small cars, this model is at its most comfortable as a two-seater, when the leg room, headroom and width provided

## A Quiet and Economical New British Small Car, Tested Over an Extended Mileage

are very ample. The individually adjustable front seats are rather low, however, so that for long journeys tall people tend to set them both quite far back, reducing the knee room in the rear. Quite a substantial amount of luggage may be loaded into the rear locker, through a lift-up lid with a slightly precarious prop which also gives access to the separately accommodated spare wheel. Minor items are readily stowed inside the car, in two big map pockets inside the front doors, in a large

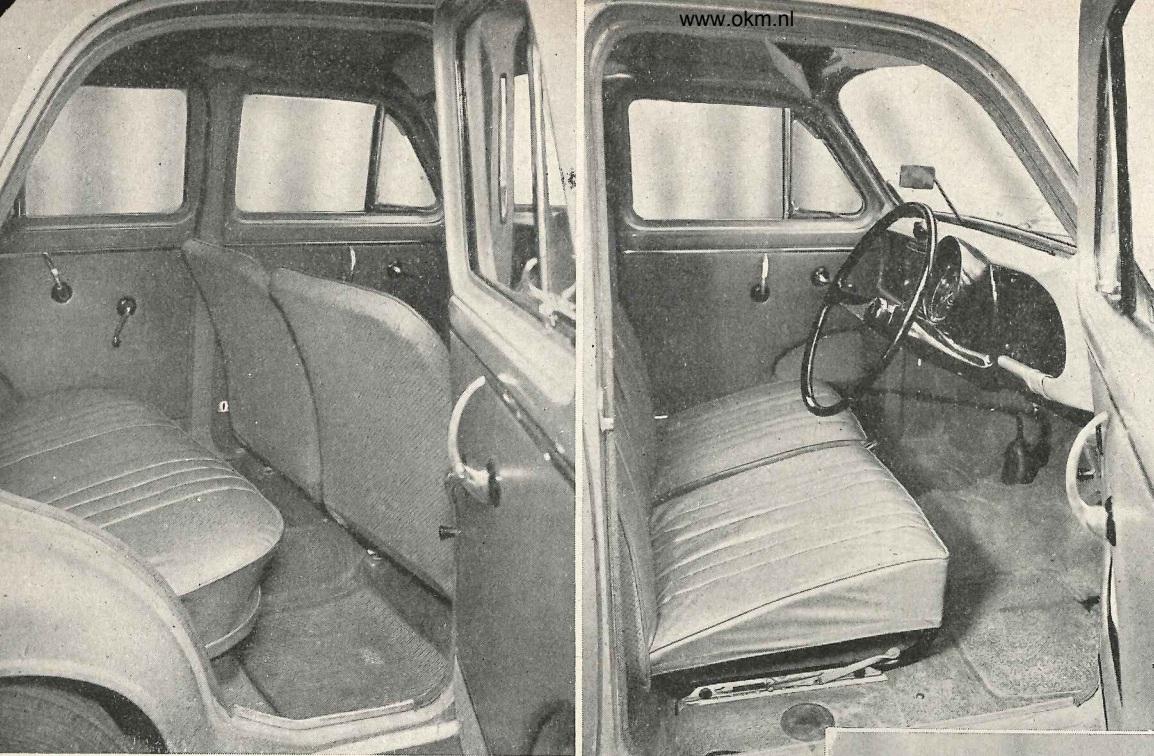
and a smaller parcel space on the fascia panel, and on a ledge below the rear window.

Plain but not aggressively austere, the fascia layout is neat and practical, the large and clearly calibrated speedometer mounted above the steering column incorporating in its hooded dial a fuel contents gauge and the warning lamps for lack of dynamo charge or of oil pressure. The plastic moulding around this instrument nacelle is extended laterally across the parcel shelf to provide very neat accommodation for the heater controls and for the radio receiver when these optional items of equipment are specified.

An unusually sharp tug was needed to operate the starter switch on the car submitted for test, but the engine always started easily even after outdoor parking overnight in near-freezing weather at Alpine resorts. Tuned for premium-grade fuel, and so pinking quite vigorously when an experiment with non-premium petrol was made, the Standard Ten power unit otherwise proved most commendably quiet, flexible and economical. In relation to the modest cost of the car, there is remarkably little mechanical, exhaust or carburetter noise at any time, either at tick-over or if engine speeds well beyond that providing maximum power are used

### In Brief

Price: £409 plus purchase tax	
£171 10s. 10d., equals £580 10s. 10d.	
Capacity ... ..	948 c.c.
Unladen kerb weight ... ..	15 cwt.
Fuel consumption (driven very hard) ... ..	34.4 m.p.g.
Maximum speed ... ..	69.0 m.p.h.
Maximum speed on 1 in 20 gradient ... ..	51 m.p.h.
Maximum top gear gradient	1 in 13.2
Acceleration:	
10-30 m.p.h. in top ... ..	15.0 sec.
0-50 m.p.h. through gears ... ..	22.2 sec.
Gearing: 14.7 m.p.h. in top at 1,000 r.p.m.; 74 m.p.h. at 2,500 ft. per min. piston speed.	



SEATING for four people is provided, the two front seats being individually adjustable fore and aft. A central lever controls the four-speed gearbox, the pull-up handbrake also is centrally mounted, and the large speedometer dial is hooded to prevent reflections of its illumination in the windscreen. Pedal spacing 'is adequate to permit driving in wide shoes.

### The Standard Ten - - - - - Contd.

in the indirect gears or downhill in top gear. Furthermore, the engine pulls smoothly down to below 15 m.p.h. in top gear.

With a swept volume of only 948 c.c., this car has nevertheless been provided with a rear axle ratio high enough to make it feel completely "unburstable" in top gear. On French main roads, we covered distances of around 250 miles in about five hours on a seven-gallon-tankful of fuel, and on a good stretch 32.2 km. (20 miles) were timed by stop-watch at an average of 62 m.p.h. Fuel consumption figures of around 35 m.p.g. when driving in this fashion are very noteworthy, and the average motorist should cover appreciably more than 40 miles on each gallon of fuel.

#### Deceptive Performance

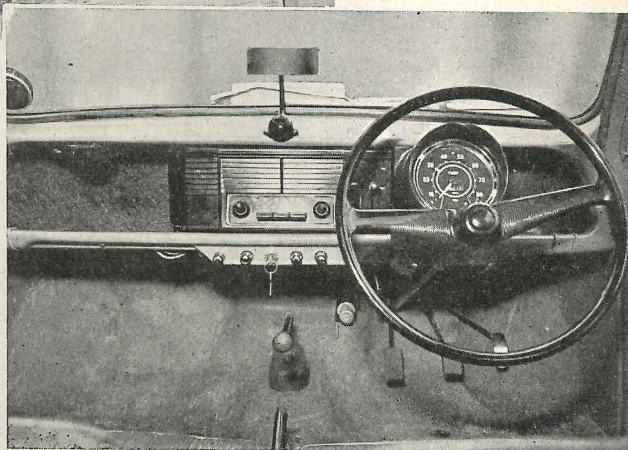
Inevitably, a top gear which gives a small car "seven-league boots" does not provide dazzling acceleration. The stop-watch, however, reveals that acceleration in top gear is, in fact, rather more rapid than a driver realizes, being disguised to some extent by the smoothness and quietness of the engine. Proper use should be made of the four-speed gearbox for accelerating past other traffic when time must be saved, however, the synchromesh mechanism being efficient, third gear unusually silent for an inexpensive vehicle even at 40 m.p.h. or more, and the two lowest gears by no means noisy. The gear lever is of the central type, curved backwards but nevertheless slightly shorter than a tall driver sitting back from the controls might like.

Mechanical quietness begins to be offset by wind noise, unfortunately, when the speed rises above 50 m.p.h. or so, this noise being especially evident to occupants of the rear seats. The ventilation system, by four wind-down windows and four pivoted ventilators, appears to have been designed conventionally rather than by practical trial, and apart from noise falls well short of the ideal of providing a draught-free supply of fresh air. Road noise is not evident at most times, but on some cobbled and other surfaces resonance of body panels can be induced.

In relation to the suitability of the Standard Ten for fast and economical travel, the suspension system has been made rather more flexible than might have been expected. Completely free from pitching, the car rides comfortably under widely varying conditions, the lightly damped springs absorbing large or small bumps very well, but it tends to "rock" laterally at times, especially when being cornered briskly on a bumpy road. Fast driving over rough roads in France worked the suspension rather vigorously, but effective rubber buffers provide not-too-fierce limits upon spring movement.

Unqualified praise cannot be given to the steering, which is satisfactory but by no means a masterpiece of precision. After we had negotiated literally thousands of blind corners at least as fast as was discreet, however, our respect had greatly increased for steering which, although not "doing the driver's job for him," was sufficiently quick and light to make sudden changes of direction easily possible whenever necessary. Rather similar comments fall due to be made about the brakes, which initially were noted as apt to smell if used down long hills without help from an indirect gear and apt to pull slightly sideways when applied hard, but which later proved capable of doing a lot of work without fading and of locking all four wheels instantly in emergencies. Adjusting the front brakes after the Alpine journey proved a quick and perfectly easy job, using the car's own jacking system—the rear brakes showed very much less wear. After they had been worked at all hard, however, the brakes showed an irritating tendency to squeal.

Two windscreen wipers clear a large part of the windscreen, which is not curved or divided. Outward vision is generally satisfactory, although rubber mouldings

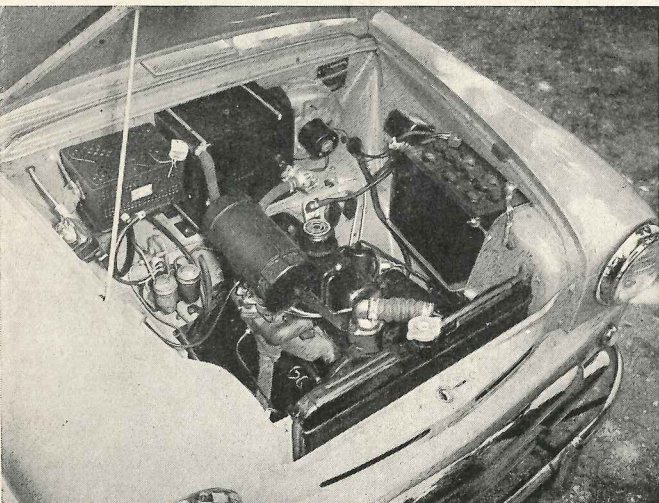


make the windscreen pillars rather thick: a minor blind spot in the direction of the nearside front wing is caused by the driving mirror, and augmented when the scuttle ventilator is opened fully—this ventilator is equally effective when only half open but cannot be fixed securely thus. Those who like to sit high will find just enough room below the dished two-spoke steering wheel to allow use of a thin cushion on the driving seat.

Using continental-pattern yellow bulbs which also modify the beam characteristics,



IDENTIFICATION.—The chromium-plated grille is the most prominent feature which distinguishes the Ten from the Eight.



ACCESSIBLE beneath the bonnet when an external catch is operated are the carburetter, radiator and oil fillers, ignition distributor, battery, and brake and clutch hydraulic fluid reservoirs. The mechanical petrol pump is set rather low down, but on the opposite side of the engine to the exhaust pipe.

we could not form a correct impression of the headlamps, but these are of the usual Lucas "700" pattern as used on the great majority of British cars. An interior lamp is provided in the body, and the speedometer is discreetly lit from its edges whenever the side or head lamps are switched on. Semaphore-type trafficators do not cancel themselves after a corner, but the switch incorporates a warning lamp and is prominently placed at the centre of the fascia panel. Dual sun vizors can be swung round to shade the side windows when required.

#### Ventilation

Optional but very valuable, the car interior heater and screen de-mister draws fresh air from a trap-door on top of the scuttle: we never closed this air intake except during heavy rain, when it allowed some moisture to come through on to the driver's left foot if left open. Without the air intake open, the heater is substantially inoperative but the fan can still provide effective windscreen de-misting. Also fitted on the test car was a radio, the smallest of the Radiomobile range, which operated most satisfactorily in Southern England and near to the French coast although (perhaps due to limitations of the side-mounted aerial) it gave little or no useful reception of distant stations.

During our travel abroad in this car, routine greasing at intervals of rather more than the recommended 1,000 miles was undertaken by roadside garages, but the lubrication points would appear to be

reasonably accessible for a private owner using the car's side jacking system (very simple but quite effective) instead of a hydraulic lift. Apart from wheel change equipment, the tool kit is an optional extra. Battery topping-up is very easy, but as is nowadays usual the gearbox and rear axle have combined level and filler plugs positioned horizontally so that oil should be put in with the aid of a syringe or a pump-type oil can. No water was put into the car while it was abroad, there being no hint of engine overheating or fuel boiling at any time, but unseasonably cool weather in the Alps did not provide a very severe test in this respect.

#### Smooth and Reliable

In sum, we would say that although it may perhaps be possible to obtain for the same or a slightly higher price cars which are a little roomier, a little livelier or a little more stylishly furnished, the Standard Ten will fully meet a great many people's requirements in these respects. Whether it is driven gently or hard, however, it should use very substantially less fuel than would other cars with which it may be compared when run at similar speeds. Most important of all, both the performance and the delightful mechanical silkiness of this little car proved to be so entirely unimpaired after it had been driven hard indeed under adverse conditions for 4,000 miles, as to suggest the probability of really large potential mileages of smooth, economical and trouble-free motoring.

SEPARATED from the spacious external luggage compartment is the spare wheel, the clamping strap for which also secures the jack and wheel-brace. A hinged prop holds open the locker lid, which has two handles of which one may be locked. Seven gallons fuel capacity gives a useful touring range of fully 250 miles even at fast cruising speeds.



## Mechanical Specification

<b>Engine</b>	
Cylinders ... ..	4
Bore ... ..	63 mm.
Stroke ... ..	76 mm.
Cubic capacity ... ..	948 c.c.
Piston area ... ..	19.35 sq.in.
Valves ... ..	Pushrod o.h.v.
Compression ratio ... ..	7.0/1
Max power ... ..	33 b.h.p.
at ... ..	4,500 r.p.m.
Piston speed at max b.h.p.	2,240 ft. per min.
Carburetter ... ..	Solex 26ZIC downdraught
Ignition ... ..	12-volt coil
Sparking plugs ... ..	Champion NA8 14 mm.
Fuel pump ... ..	AC mechanical
Oil filter ... ..	By-pass

#### Transmission

Clutch ... ..	Borg & Beck 6½-in. s.d.p.
Top gear (s/m) ... ..	4.55
3rd gear (s/m) ... ..	6.62
2nd gear (s/m) ... ..	11.2
1st gear ... ..	19.45
Propeller shaft ... ..	Hardy Spicer open
Final drive ... ..	Hypoid bevel
Top gear m.p.h. at 1,000 r.p.m.	14.7
Top gear m.p.h. at 1,000 ft./min.	piston speed
...	29.4

#### Chassis

Brakes ... ..	Girling hydraulic, 2LS front
Brake drum diameter ... ..	7 in.
Friction lining area ... ..	68 sq. in.
Suspension:	
Front ... ..	Coil and wishbone I.F.S.
Rear ... ..	Semi-elliptic
Shock absorbers:	
Front ... ..	Girling telescopic
Rear ... ..	Armstrong piston-type
Tyres ... ..	Dunlop 5.60 x 13

#### Steering

Steering gear ... ..	Burman screw and nut
Turning circle: Left ... ..	31 feet
Right ... ..	33 feet
Turns of steering wheel, lock to lock ... ..	2½

**Performance factors (at laden weight as tested):**  
 Piston area, sq. in. per ton ... .. 20.9  
 Brake lining area, sq. in. per ton ... .. 73.5  
 Specific displacement, litres per ton mile 2,090

Fully described in *The Motor*, Mar. 24, 1954.

## Coachwork and Equipment

Bumper height with car unladen:	
Front max. 20 in., min. 10½ in.	
Rear max. 19½ in., min. 10 in.	
Starting handle ... ..	Yes
Battery mounting ... ..	Alongside engine
Jack ... ..	Screw pillar type
Jacking points: 2, beneath openings in floor alongside front seats.	
Standard tool kit: Combined starting handle, jack handle and wheel brace, jack, screw-driver. Fuller tool kit available as optional extra.	
Exterior lights: Two headlamps, 2 side lamps, 2 tail lamps, number plate lamp.	
Direction indicators ... ..	Semaphore type, non-self cancelling
Windscreen wipers ... ..	Electrical 2-bladed non self-parking
Sun vizors ... ..	Two, universally pivoted
Instruments: Speedometer (without decimals or "trip"), fuel contents indicator.	
Warning lights: Dynamo charge, oil pressure, direction indicators.	
Locks:	
With ignition key. Ignition and driver's door.	
With other keys ... ..	Luggage locker
Glove lockers ... ..	Nil
Map pockets ... ..	Two in front doors
Parcel shelves Two on fascia panel, 1 behind rear seat.	
Ashtrays ... ..	One on fascia panel
Cigar lighters ... ..	Nil
Interior lights: One on near side door pillar.	
Interior heater: Optional extra, Smith's fresh-air type with windscreen de-misters.	
Car radio ... ..	Optional extra, Radiomobile
Extras available: Heater, radio, leather upholstery, roof luggage rack, tool kit, opening rear window.	
Upholstery material ... ..	Vynide
Floor covering ... ..	Rubber (with felt below)
Exterior colours standardized: Four (Black, Elfin Green, Salvador Blue, Birch Grey).	
Optional at extra cost, black top with any standard colour, or blue top on grey car.	
Alternative body styles ... ..	Nil
(Standard 8 has simplified equipment and lower powered engine but similar coachwork dimensions.)	