

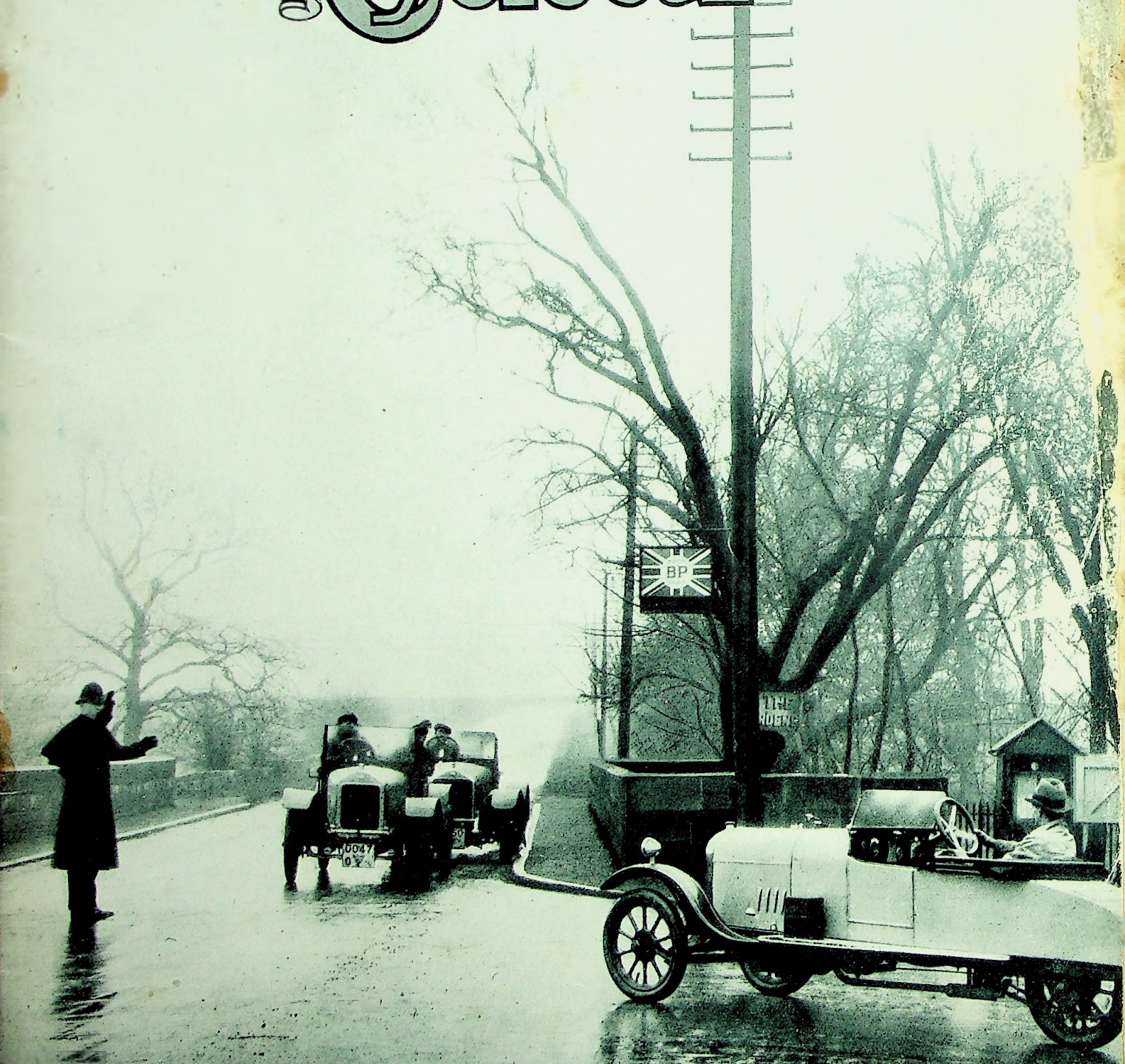
# The Light Car and Cyclecar

Founded 1912

The only Small Car Journal

4<sup>p</sup>

Vol. XIX, No. 484  
Mar. 4, 1922  
*Registered at the GPO  
as a Newspaper*



### Confusing Traffic Signals.

The drivers depicted above might well be excused if they misunderstood the signals of the policeman, for in no sense is his meaning clear. When will a universal system of traffic signalling be adopted throughout England? We refer to the matter editorially.

“——it is all one could wish for”

What Mr. Martin Secker says of  
his 10.5 h.p. Charron-Laycock.

Bridgefoot,  
Iver, Bucks.

October 7, 1921.

Dear Sirs,

I have genuine pleasure in expressing my entire satisfaction with the performance of the Charron-Laycock which I bought from you in April last.

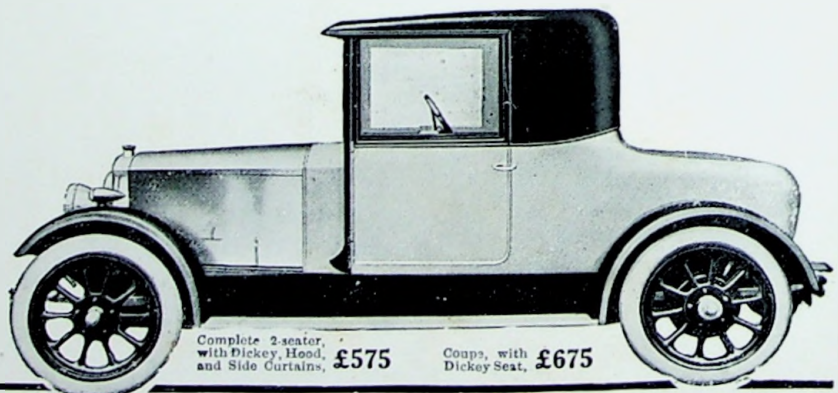
The car has been in continuous use and was well tested recently on a 600-mile tour, which included many of the severe gradients west of Exeter. In reliability, in ease of control, in smoothness of running and in general comfort it is all one could wish for.

Yours faithfully,

*Martin Secker*

**CHARRON**  
**LAYCOCK**

BRITISH BUILT  
THROUGHOUT



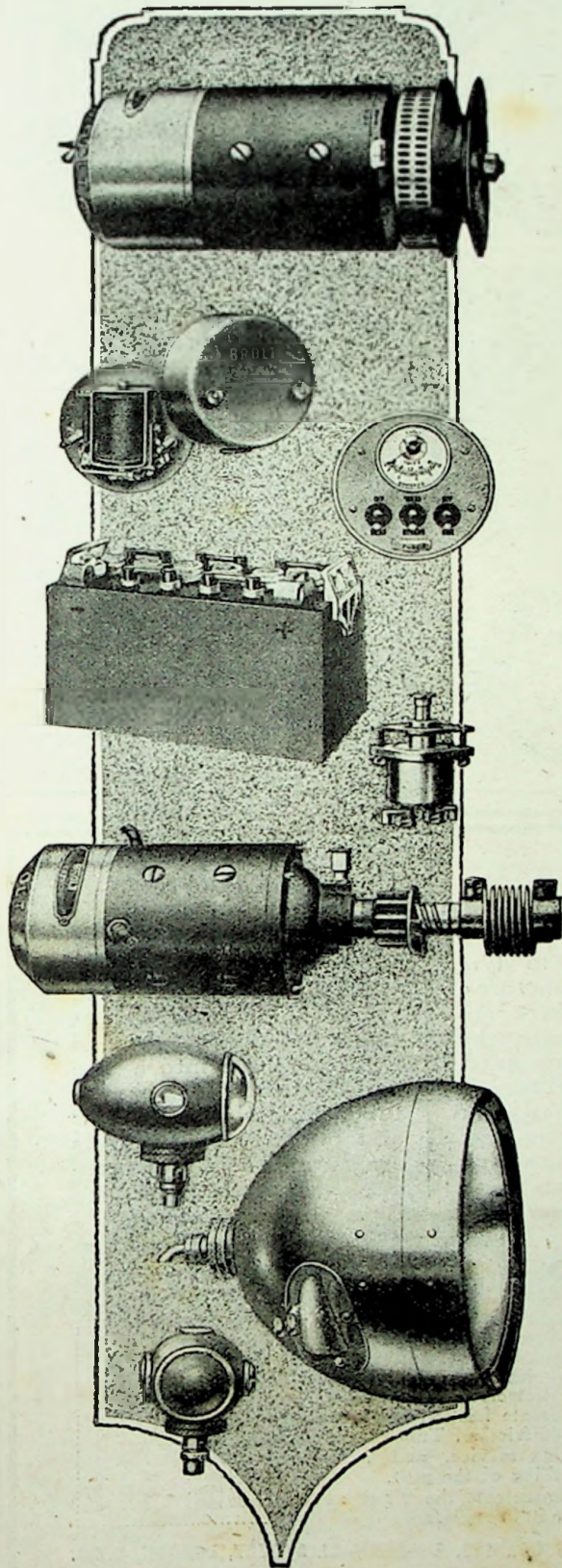
Complete 2-seater,  
with Dickey, Hood,  
and Side Curtains, £575

Coupe, with  
Dickey Seat, £675

SHOWROOMS - - - - 13, ALBEMARLE STREET, LONDON, W.1.  
and 33-37, WARDOUR STREET, LONDON, W.1.  
WORKS: W. S. LAYCOCK, LTD., VICTORIA WORKS, MILLHOUSES, SHEFFIELD.

St. James's 42

PLEASE REFER TO "THE LIGHT CAR AND CYCLECAR" IN YOUR LETTERS TO ADVERTISERS.



# A Favourite Specification

**M**ANUFACTURERS who have for many years past found in Brolt Lighting and Starting Sets the ideal equipment are now confirmed in their decision to specify such reliability.

The popular set at the present time, for the good reason of its efficiency, as well as its reliability, is the

# BROLT

*Typically British.*

A characteristic equipment consists of:—

- DYNAMO - - Type DV3. Ventilated pattern.
- CUTOUT - - Automatically disconnects the dynamo when engine is stopped or is running slowly. Positive in action.
- SWITCHBOARD. A really handsome instrument for dashboard fitting.
- BATTERY - - 48 ampere hour. Ebonite cells in whitewood box, lead handles.
- STARTER - - Type N3. Suitable for engines up to 75 mm. bore, noted for its small current consumption.
- STARTER SWITCH. Can be arranged for either foot or hand control.
- LAMPS - - Set of five: 8½ in. headlamps, two torpedo side and ball tail.

*We shall be pleased to quote you for such an equipment, or to suggest an alternative to suit your choice of Light Car.*

**BROLT LIMITED,**  
20, Oldbury (Worcester).

**TO THE READER**

*By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.*



## An old friend

in a new guise, the 10 h.p. CALCOTT Two-Seater has returned to enhance its pre-war reputation. Modest in cost and upkeep, yet stamped with that distinction which is the heritage of "The Classic CALCOTT," this model complete and ready for the road at

**£350**

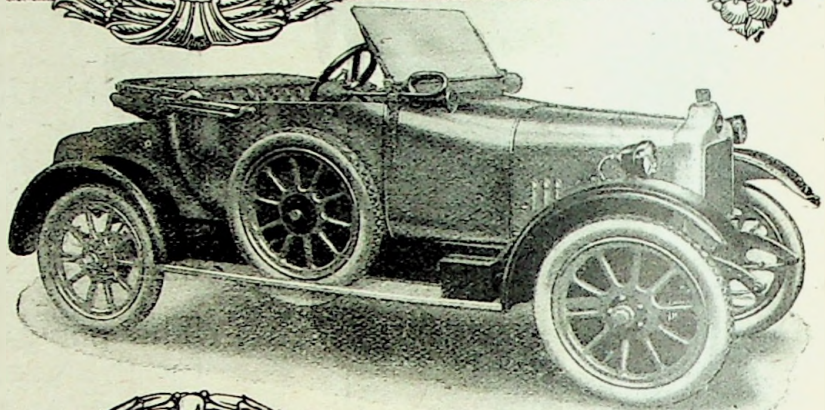
represents the best value in its class.

All CALCOTT Cars are fitted with Dunlop Tyres.

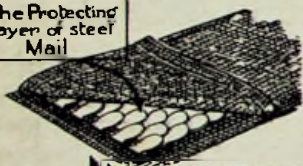
Illustrated particulars from

CALCOTT BROS., LTD., COVENTRY.

Established 1885.



The Protecting layer of steel Mail



Fits between the outer cover and the inner tube



## Punctures impossible once and for all!

An absolute end to tyre troubles at last. Punctures, bursts and pinchings are an impossibility with the "Tube Protector" on guard. The "Tube Protector" is a cleverly constructed layer of extremely flexible steel scale mail, encased in strong canvas. Like the old time

warrior's "suit of steel" it will resist the thrust of the sharpest of instruments. A strong penknife plunged with full force into a tyre will fail to reach the inner tube. Glass, flints, nails and other tyre destroyers are turned aside and rendered harmless. The

# Tube Protector

is guaranteed to prevent punctures—absolutely. Pinchings and bursts cannot happen because the flexible steel layer between the cover and tube is an assurance of immunity. Being made with loose overlapping ends the "Tube Protector" cannot sag, warp or buckle. It does not create friction but actually absorbs the ordinary road friction. Tubes protected in this way give lasting service, and roadside "Holdups" become a thing of the past.

Ask your trader to demonstrate the "Tube Protector," or send to us for full details.

### Prices of "Tube Protectors" for Motor Cars.

Width	Each.
80/85 mm.	£1 5 6
90 mm.	1 8 6
100/105 mm.	1 14 6
120 mm.	1 19 6
125 mm.	2 8 6
135 mm.	2 15 0
150 mm.	2 19 6

A. STUART MORRIS & CO., 101, LEADENHALL STREET, LONDON, E.C.3.

RB

A2

HELP THE MOVEMENT

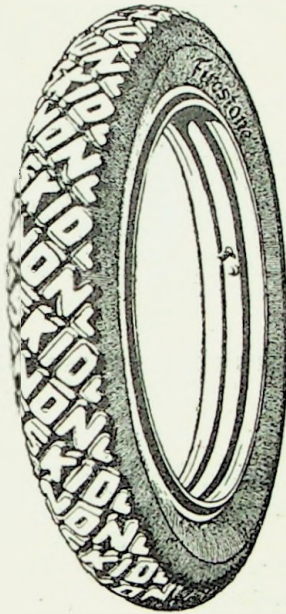
by letting advertisers know that their advertisements in "The Light Car and Cyclecar" interest you.



## The Essentials of Tyre Service

All the essentials of satisfactory Tyre Service are combined in the Firestone.

To its making has been brought the experience of an organisation which has for years successfully manufactured tyres to the standard of "Most miles per shilling." Its sturdy case and tough rubber tread give it stamina and strength. Everywhere it gives exceptional mileage at a remarkably low cost.



Fabric.

And the Firestone Tyre possesses more than durability. Safety is assured by the scientific design of the tread, which resists skidding and slipping. Its generous air capacity and resilience protect the car and increase the comfort of the passengers.

---

**Most Miles per Shilling**

---

# Firestone

FIRESTONE TYRE AND RUBBER CO., LTD.,  
216, Tottenham Court Road, London, W.1.

Telephone: Museum 1915.

DEALERS EVERYWHERE

St. James's 4.

TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.

A3

## EASY TO BUY AND EASY TO RUN

The recent reduction of £50 in the price  
of the

# DEEMSTER

THE LITTLE CAR OF LION HEARTS

### STANDARD SERVICE MODEL

brings this remarkable little car within the reach of the majority. Add to this the fact that the "Deemster" is now purchasable on the easy payment system through any of our agents, and it comes within the reach of all.

Make up your mind that you will have a "Deemster" to enjoy luxurious and trouble-free motoring AT ONCE and pay for it LATER.

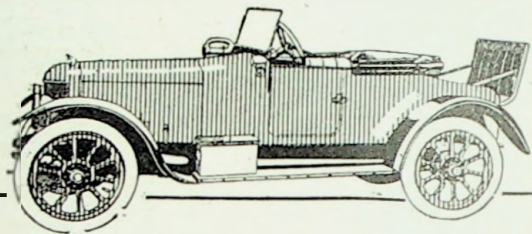
#### PRICES.

10 h.p. 2-Seater "Cabriolet Coupe" (including Dicky Seat) .....	£525	12 h.p. "Cabriolet Coupe" 4-seater .....	£575
10 h.p. "Sports Model" .....	£435	New "Service Model" (exclusive of Clock and Speedometer) .....	£375
12 h.p. Standard 4-Seater .....	£475		

Deferred Payments arranged.

#### LIST OF "DEEMSTER" AGENTS.

London and the Home Counties—Leverett, Thorpe & Kearton, Ltd., 122, New Bond Street, London, W.1. North Midlands—The Northern Light Cars Ltd., 16, Harecross St. (next to G.P.O.), Burnley. Midlands—Goodwin's Motor Agency, Ltd., 24, Edmund St., Birmingham. Northampton and South Midlands—Arthur Mulliner (London), Ltd., Bridge St., Northampton. Devonshire and Cornwall—Richardson's Garage, Ltd., Wellington, Somerset. Northumberland and Durham—John Macleod-on, Orchard St., Newcastle-on-Tyne. Nottingham and Lincoln—T. Skye, Ltd., 37, Milton St., Nottingham. Cumberland and Westmorland—Townson & Ward, Duke St., Barrow-in-Furness. Portsmouth and District—E. R. Locke, Kingston Cross Garage, Portsmouth. Scotland, South West—Claude Hamilton, Ltd., The Garage, Smith Street, Hillhead, Glasgow, W. Kincardine and Forfarshire—Luthie & Sons, 62, High St., Montrose. Ulster—O. B. Carr, Ltd., Dunmore, Antrim Rd., Belfast. Rest of Ireland—Eunsey Bros., 67, Gt. Brunswick St., Dublin.



THE OGSTON MOTOR Co. (1918), LIMITED  
DEEMSTER WORKS, VICTORIA ROAD, ACTON, W.3.  
(Nearest Station: Willesden Junction.) 'Phone Nos.: Chiswick 2044-2045.

# Peugeot "Quad"

## A Miniature of Great Value

embodying all those features which have made the larger models world famous. Smallest Water-Cooled Engine. Three Speeds and Reverse. Worm Drive. Petrol Consumption 60 m.p.g. Of equal interest is the Peugeot 11 h.p. Model.

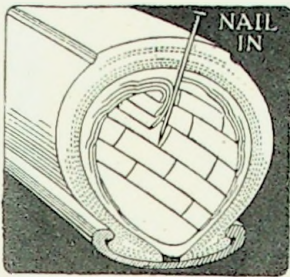
**Models and Prices**

"QUAD"	6 h.p. chassis alone, with five wheels and five tyres, electric lighting	£225
"QUAD"	6 h.p. chassis, as above, with two-seater side-by-side (staggered) body	£250
"QUAD"	6 h.p. chassis, as above, with van body	£220
11 H.P.	Normal chassis alone, with five wheels and five tyres, electric lighting and starter	£360
11 H.P.	Normal chassis, as above, with standard torpedo body	£470
11 H.P.	Long chassis, as above (alone)	£400
11 H.P.	Sports chassis alone, as above	£430
11 H.P.	Sports chassis, as above, with standard torpedo body	£550

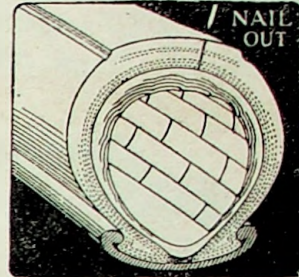
Extra for front wheel brakes on 11 h.p. chassis, £10.

For particulars of the above and the larger models apply to—

**PEUGEOT (England), LIMITED,**  
10, BROMPTON ROAD, LONDON, S.W.1  
Telephone—671 Kensington



What Leading Car  
Manufacturers say  
they know.



*Jeff*

# PATENT TUBES

(Made in all sizes.)

Every Tube is a PERMANENT MECHANICAL PUNCTURE-SEALER

ONLY RUBBER AND AIR.

"IT'S THE FLAP THAT DOES IT."

**15 PUNCTURES  
IN 3,500 MILES**

COPY OF LETTER dated 2nd Feb., 1922  
from **RILEY (COVENTRY) LTD.,**  
Riley Works, Foleshill, Coventry.

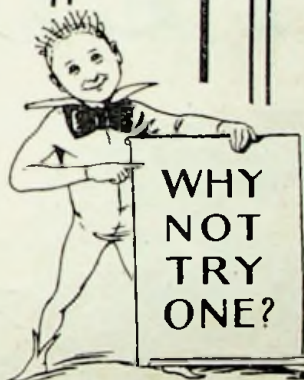
A. E. COILEN, ESQ.,  
MESSRS. THE JEFF PATENT TUBE, LTD.,  
PEMBROKE ROAD, WALTHAMSTOW, E.17.

Dear Sir,

We have pleasure in confirming our conversation that we have had a set of your tubes now in use on our test cars for some considerable time, the mileage now being about 3,500 miles. During the period one tyre picked up about fifteen nails and other bits of wire, one of which was a hooked piece, which went in at the side and came out again about an inch away. The other tyres have averaged about eight to nine nails, etc. All the above nails, etc., have been pulled out, without in any way affecting the tyres. They have not been blown up since hitting, and are still up to standard pressure, and are still in use as originally fitted.

We would like to say we are extremely satisfied and astonished at their behaviour. They are, in our opinion, the limit of reliability as regards all puncture-proof tubes. We therefore from personal experience have every confidence in recommending them to all our friends and clients.

Yours faithfully,  
For **RILEY (COVENTRY), LTD.,**  
(Signed) H. Rush,  
Works Manager.



LITTLE JEFF

When you have read these—

**40 PUNCTURES  
IN ONE TUBE**

COPY OF LETTER dated 16th Jan., 1922  
from **MORGAN MOTOR CO., LTD.,**  
Pickersleigh Road, Malvern Link.

Dear Sir,

Thank you for the trouble you have taken to demonstrate your "Jeff" Tube to me.

The tyre was quite hard on Saturday after the seven nails we put in and out of it on Friday, so I thought I would see what I could do; I collected every sort of puncturing material I could think of, several ordinary nails, a bradawl, a strong needle, a very sharp scriber, and one or two blunt file ends. I amused myself puncturing the tyre with these articles no less than 20 times, putting several things in at once, but of course spinning the wheel after each one was taken out.

This morning the tyre is as hard as ever. There is no doubt your tube is puncture proof, and should be particularly useful to "Morgan" users.

Please send along the 50 sample tubes as soon as possible.

Yours faithfully,  
(Signed) H. F. S. MORGAN.

EXTRACT FROM LETTER OF MESSRS. THE MORGAN MOTOR COMPANY, DATED 24th JANUARY, 1922.

"We shall be obliged if you will increase our order to 150 tubes. We may say that your tube has now been punctured over 40 times, and still holds wind properly."

Send for Illustrated Folder and Price List to

THE *Jeff* PATENT TUBE LIMITED,  
Reliance Works,  
67, PEMBROKE ROAD,  
WALTHAMSTOW, LONDON, E.17.

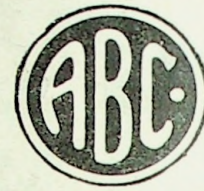
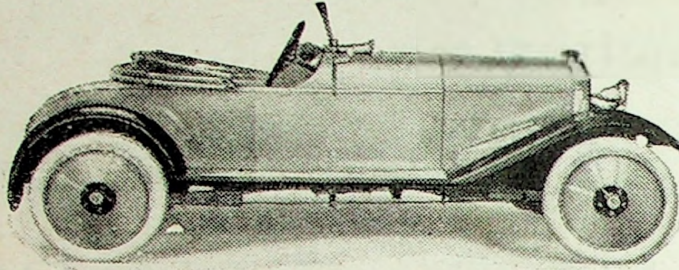
AUTHORISED AGENTS—

Messrs. COPPEN, ALLAN & CO.,  
143-149, Great Portland Street, London, W.1  
Messrs. A. W. GAMAGE, LTD.,  
Holborn, London, E.C.1.  
Messrs. WILLIAM WHITELEY, LTD.,  
Queen's Road, London, W.2

TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.

**LONDON-EXETER**  
FOUR A.B.C.'s FINISHED, with  
the result:—**4 Gold Medals.**



**REDUCED  
PRICES.**

Sports Model £295

Standard 2-seater £325  
(With Dicky)

**DEFERRED TERMS.**

—Car Delivered on First Payment—

A.B.C. Sports Model — £295 0 0

4% Interest — 11 16 0

£306 16 0

First Payment — £76 16 0

12 Monthly Payments of 19 3 4

Cars or Motorcycles taken in  
PART PAYMENT.

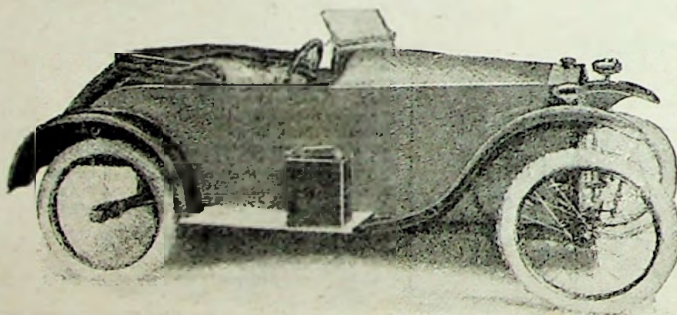
**A**NTICIPATE THE SPRING RUSH,  
AND PLACE YOUR ORDER WITH  
THE LARGEST AGENTS.

*Gordon Watney & Co*  
Ltd.

'Phones: Mayfair 2965 — 2966  
'Grams: "Gordowatmo, London."

31, Brook Street, Bond Street, W.1.

**WHITELEYS**



*Wonderful Offer*

**BLERIOT WHIPPET  
CARS for £139 : 10 : 0**

SLIGHTLY SHOP SOILED, but in spite of the immense reduction each car bears the Maker's standard Guarantee. There is only a very limited number available. Manufactured to sell at £250 (approx.), each car is splendidly finished and a great bargain.

*Features*—8.9 h.p. Blackburne engine, mechanical starter, simple, foolproof variable gear, detachable wheels, wonderful economy—averaging 50 m.p.g. of spirit, and the best suspension of any light car.

*Equipment*—One-man hood, adjustable windscreen, electric lamp set and accumulators, mechanical horn, spare wheel and tyre, petrol tin and carrier, tool kit, jack and pump.

A LIMITED NUMBER AND ONLY TO BE PURCHASED FROM

**WM. WHITELEY LTD., QUEEN'S ROAD, LONDON, W.2.**

**DEFERRED TERMS.**

4% extra on the Cash Price is all that Whiteleys ask for the convenience of Deferred Payments.

Whiteleys Motor Sales and, more important still, the Deferred Payment Plan (a system that Whiteleys originated) are entirely under the control of Whiteleys and free from outside influence of any kind.

*This*

**BLERIOT WHIPPET**

delivered on the deposit of

**£34 : 10 : 0**

Balance in Twelve  
Monthly Payments of

**£9 : 4 : 4**

*Catalogue on application*

**Rovers, Coventry-Premiers,  
G.N.'s, Standards and Citroens**  
on similar terms.

# NEW HUDSON

## Leadership in Car Values

To build a better car at a lower price is an achievement worth recording.

Since the New-Hudson Light Car was first put on the market the Technical Press has proclaimed it—"The best three-wheeled car"—and actual road performance has supported this statement.

### In Competitions

It has been recognised as "the 100% car." There has been a full percentage of awards in every trial entered.

### In Construction

It is built on car lines throughout, with 10 h.p. water cooled engine of 1,100 c.c.; strong chassis of pressed channelled steel strengthened by tubular cross-members, with half-elliptic and quarter-elliptic suspension front and rear. All parts are designed to give the maximum degree of accessibility and durability. Three speeds forward and one reverse is provided by the New-Hudson Gearbox, controlled by special gate lever.

### In Appearance

It is graceful and luxurious with comprehensive equipment suggestive

of high-grade car production, with an appeal to the most fastidious.

### In Comfort and Economy

It has the convenience of the expensive car, at the same time affording the economy of a motor-cycle combination, both in respect of mileage and taxation, with greater protection, comfort and sociability. It should go far to meet the needs of the economically-minded motorist.

### In Equipment

and in the details of specification the New-Hudson Light Car stands alone for excellence and real value:—Dunlop Car Tyres 700 x 80; Lucas Magdyno Electric Lighting with set of Lamps; Spare Wheel, interchangeable with all wheels, with tyre; Permanent Rear Wheel Jack,

and full set of tools; Hood, Screen, Horn, etc. All ready for the road. It lacks but little the discriminating buyer desires.

### In Price

the New-Hudson maintains its leadership of car values. Compare its road experience, its absolute dependence, the high quality exemplified in every part of construction, the speed, low maintenance costs—approximately 50 miles per gallon—and low tax, £4

**£230** Complete

Call at your local agents or write us for trial run.

Send for illustrated catalogue of mechanical details.

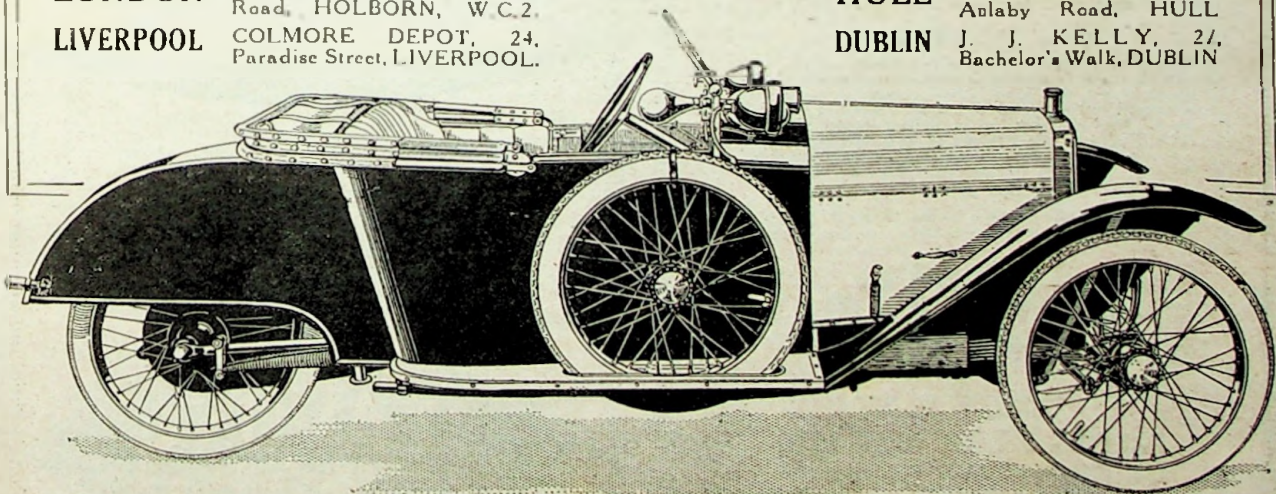
## NEW-HUDSON, LTD., BIRMINGHAM

LONDON PASKELLS, 45, Gray's Inn Road, HOLBORN, W.C.2.

LIVERPOOL COLMORE DEPOT, 24, Paradise Street, LIVERPOOL.

HULL CHAS. SANER, 58, Aulaby Road, HULL

DUBLIN J. J. KELLY, 27, Bachelor's Walk, DUBLIN



## THE CAR ON THREE WHEELS

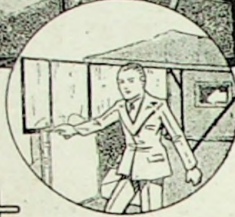
TO THE READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.

B3



## Coupe Comfort



**R**IDE IN STATE anywhere. Whether snow is swirling around the door or Summer smiling through the screen, "Easting's" mean better journeys—all the comforts of a stately ride with its year-round protection.

A set of Easting Side Windows and Curtains make the difference between unbroken satisfaction and continuous annoyance; the construction reveals their intrinsic value under the most adverse conditions. They are built to increase the comfort, appearance, and utility of open Cars throughout the entire year.

Ride in comfort through the Winter and the Spring's uncertain weather, and you still can have the open freedom with protection from wind and dust for fine weather.

### BRIEF SPECIFICATION.

Flexible steel frames covered with leatherette, fitted with a highly polished transparent panel, fittings heavily nickel-plated, of first-class finish. Hood curtains of best quality waterproof material, fitted with small transparent windows, can be fitted and detached in a few minutes. PRICE PER SET, two side windows and two curtains, complete with the necessary screws for fitting to the "Rover 8," £4-10-0. Side windows only. £3-7-6 per pair.

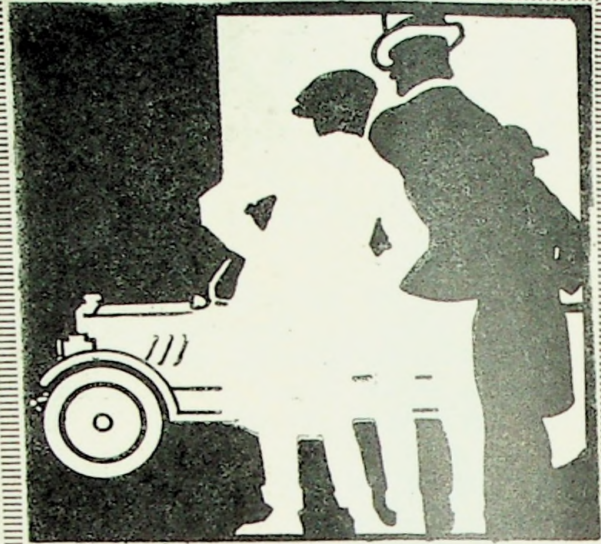
Although especially designed for the "Rover 8" these side windows are adaptable to many other two and four-seater cars



Obtainable from all garages and agents. Write for descriptive list.

**EASTING WINDSCREENS LTD.**  
132, STEELHOUSE LANE, BIRMINGHAM.

London Office and Service Depot:  
24, FINSBURY SQUARE, LONDON, E.C. 2  
Telephone Clerkenwell 1904.



## Distinction

**Y**OU need never fear that the appearance of your car will be marred by fitting Jeavons Lubricating Spring Gaiters: on the contrary they invest it with neatness and distinction, lacing neatly underneath the spring and fitting like a glove. Their chief claim for distinction lies in their original construction and super-efficiency, for they are much more than merely covers, being lubricators also by distributing a constant flow of oil through the spring leaves, preventing all possibility of rust and decay—a distinctive feature which has marked their superiority over all other forms of spring covers, giving greater resiliency, preserving the springs against breakage, and your car against undue wear and tear.

Jeavons Lubricating Spring Gaiters are flexible protecting covers strongly made of oil-dressed leather, which completely enclose the springs; inside the cover is an oil-soaked wicking which is kept constantly oiled through the usual medium of an oil cap, thereby ensuring constant lubrication of the springs, which is the original and distinctive feature of the Jeavons Lubricating Spring Gaiter, and the chief reason for its superiority over all others. These gaiters fit like a glove, and are neatly laced underneath, the ends being secured by straps, thereby preventing all possible escape of oil.



Prices from 2 guineas per set.

*Don't fit any kind of Spring Gaiter  
Fit the Jeavons, it lubricates as well.*

Obtainable from all Garages and Agents.  
Write for descriptive Booklet.

**RAMSDENS (HALIFAX), LIMITED.**  
STATION WORKS - HALIFAX.

London Office and Service Depot:  
414, Ullater Chambers, 168, Regent Street, W.1.  
Telephone: Regent 3451.

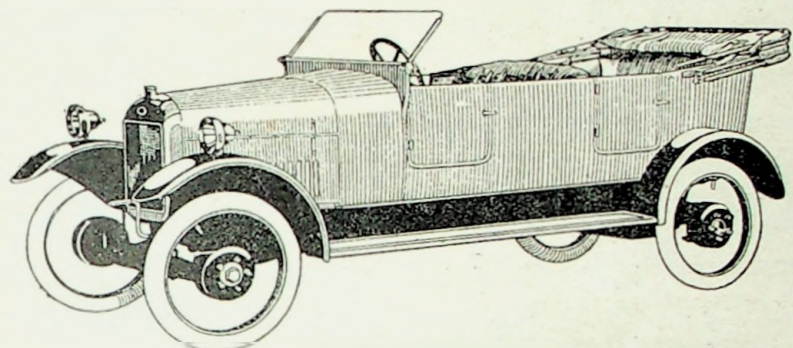


4 - CYL.,  
10.8 H.P.  
WATER-  
COOLED.



4 SPEEDS  
AND  
REVERSE.

# A Pedigree Car of Proved Reliability



Here is the 4-Seater G.W.K. with 4-Cylinders and 4-Speeds at a wonderfully low price.

### 100% Record of Successes:

The G.W.K.'s reputation for reliability has been gained by arduous competition work. For the past ten and a half years the "G.W.K." has gained a Gold Medal or Special Prize in every open reliability trial in which it has entered—making a total, to date, of

**65 Gold Medals and 14 Silver Cups.**

#### OTHER MODELS:

**2-Seater.** Model "H." 2-seater with folding dicky seat, dynamo electric lighting, hood, screen, and spare wheel and tyre : : : : **£285**

All-weather fittings to convert these models into cosy enclosed cars are obtainable at a very reasonable figure.

**De Luxe Coupé.** Model "H." De Luxe Coupé, with folding dicky seat, electric self-starter, dynamo electric lighting, speedometer, clock, fibre mat floor board, 710 x 90 tyres, spare wheel and tyre, finished in any colours to choice : : : : **£360**

### 4 - Seater

Model "H"  
This includes hood, screen, dynamo electric lighting, spare wheel, comfortable and roomy body, finished in soft grey, with high-class coachwork finish.

**£295**

Catalogues Post Free on request. G.W.K. Cars are now obtainable on easy payment terms.

TO AGENTS: A few territories are still open and applications are invited.

EASIEST  
GEAR-  
CHANGE  
IN THE  
WORLD.

**G. W. K. (1919), LIMITED,**  
Cordwallis Works ... MAIDENHEAD.  
Telephone: Maidenhead 624. Tel. Address: "Cars, Maidenhead."  
Northern Depot - THOMAS SANDERSON,  
64, Northumberland Road, Newcastle-on-Tyne.  
London - MANN, EGERTON & CO., LTD., 378, Euston Rd., N.W.1.

OVER 10  
YEARS'  
REPUTATION  
FOR  
RELIABILITY.

TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.

"The MOTOR SHIP" is a high-class monthly journal, devoted entirely to ocean-going motor vessels, and dealing with every phase of motor ship and large oil engine construction and operation. :: :: :: Fully illustrated.



**The 14,000 Ton "Lochkatrine."**  
R.M.S.P. Co.'s First Motor Vessel.  
*(Illustrated.)*

**March Issue of "The Motor Ship."**  
**Now on Sale — Price One Shilling.**

*Other Articles include the following :*

- A MODERN MARINE DIESEL ENGINE-BUILDING WORKS. *(Illustrated.)*
- FURNESS WITHY'S NEW 3,000 H.P. SINGLE-SCREW MOTOR SHIP.
- THE STILL COMBINED STEAM AND OIL ENGINE. *(Illustrated.)*
- MAIDEN VOYAGE OF THE 12,000 TON M.S. "WILLIAM PENN," THE UNITED STATES SHIPPING BOARD'S FIRST MOTOR VESSEL.
- A NEW 2,000 H.P. TWO-STROKE DIESEL ENGINE.
- METHODS OF GOVERNING DIESEL ENGINES.
- A LARGE DIESEL MOTOR YACHT.

"The Motor Ship" is published on the first of each month and is obtainable from all Booksellers and Newsagents. Subscription 16/- per annum. Post free.

**TEMPLE PRESS LIMITED,**  
7-15, Rosebery Avenue, London, E.C.1.

**THE  
MOTOR  
SHIP**

*W. THOMAS '20*

# Delsize

## BRADSHAW-MODEL

9 h.p.—PRICE £275

EARLY  
DELIVERY  
DEFERRED  
TERMS

CAR DELIVERED  
on First Payment.

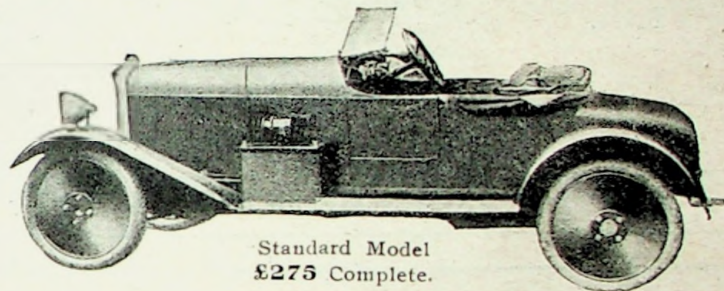
Delsize-Bradshaw	£275 0 0	
4% Interest	11 0 0	
		286 0 0
First Payment	... ..	71 10 0
12 Monthly Payments of	... ..	17 17 6

COMPLETE.

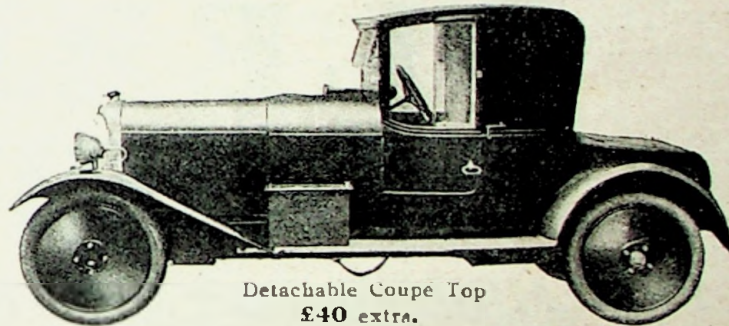
Easy  
Gear Changing  
Easy Steering  
Light Springing  
Comfortable  
Driving Position  
Fewest Possible  
Lubricating  
Points  
Easy Starting  
Handsome  
Appearance

NO TROUBLE  
TO DRIVE  
OR KEEP

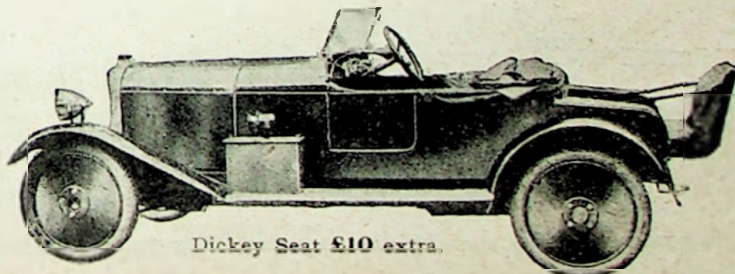
*"The Car with the  
Oil-cooled Engine."*



Standard Model  
£275 Complete.



Detachable Coupe Top  
£40 extra.



Dickey Seat £10 extra.

Particulars  
from

*Gordon Watney & Co.*  
Ltd.

31, BROOK ST.,  
BOND ST., W.1.

\*Phones—Mayfair 2965, 2966.

\*Grams—"Gordowatmo. London."

TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.

B7

**£225**

Complete.

Dicky Seat,  
£5 Extra.



**£225**

Complete.

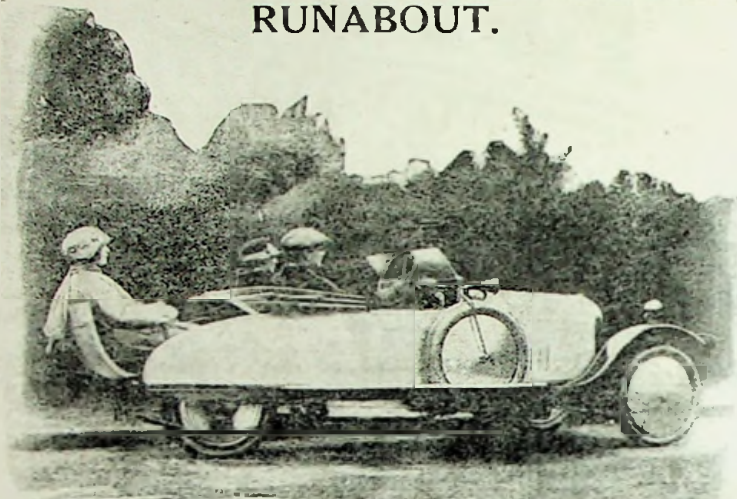
Dicky Seat,  
£5 Extra.

RUNABOUT.

FOUR  
Cylinder.

Dynamo  
Lighting.

Shaft  
Drive.



ALL Wheels  
Interchange-  
able.

Reverse  
Gear.

Built to  
Last!

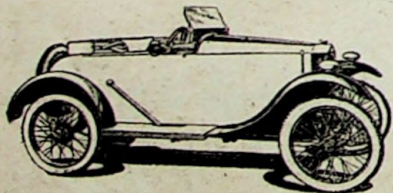
DELIVERIES OF 1922 MODELS NOW COMMENCING.

Sole Manufacturers  
and Patentees:

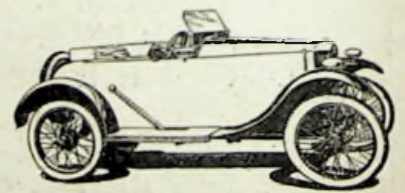
**The Castle Motor Co., Ltd., Kidderminster, Eng.**

# BLERIOT WHIPPET

PRE-EMINENT FOR SERVICE AND VALUE.



**£198**



## BLERIOT WHIPPET

SPECIFICATION FREE.

**Air Navigation & Engineering Co., Ltd., Addlestone, Surrey.**

B8

HELP THE  
MOVEMENT

by letting advertisers know that their advertisements

in "The Light Car and Cyclecar" interest you.

# Motorists-

Let your 1922 Car be the

Silent

# UNIT

## £268

4-CYL.  
10 H.P.  
WATER  
COOLED

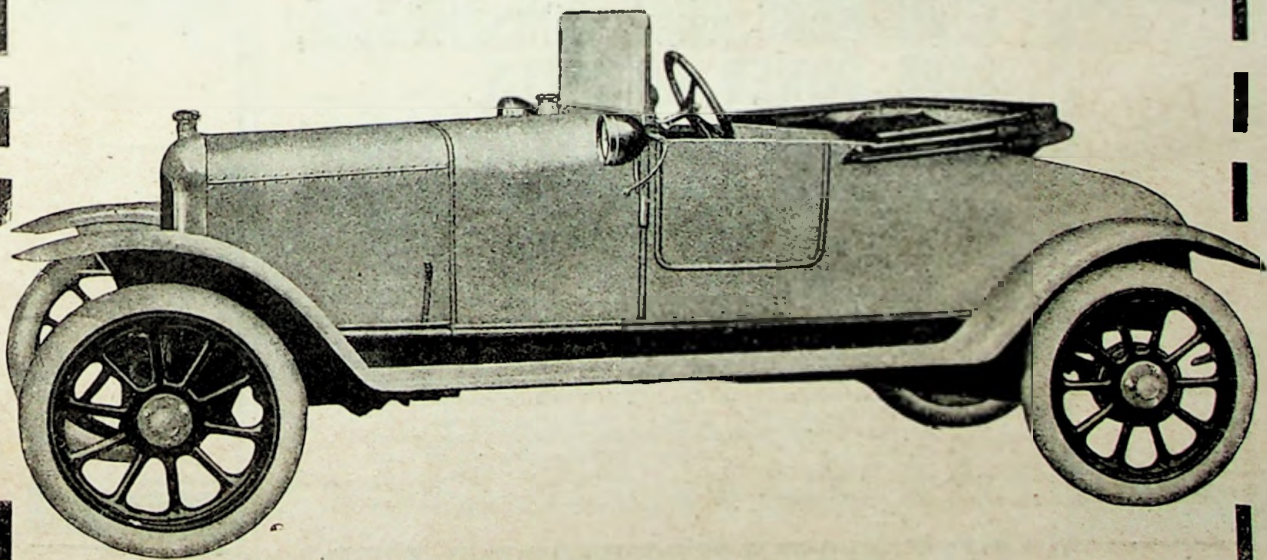
4 SPEEDS  
AND  
REVERSE

Patent Frictional Gearbox.

Two-Seater, Dicky Seat. Detachable Wheels.

DYNAMO LIGHTING

Four-Seater - - £293



**ROTARY UNITS, Ltd., Wooburn Green, Bucks.**

TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.

B9

**“BAYLISS THOMAS”**



**“Exceeded Expectations.”**

Jan. 20th.—“We are more than surprised with the little car. She holds the road extremely well, is beautifully sprung, and the steering is everything one can wish for. The body is roomy and comfortable, and in every way by far the car exceeded our expectations.”

Extract from “Yorkshire Post,” Jan. 27, on

**SCOTTISH SHOW.**

“One of the nicest models shown also on the Rennie Motors’ Stand is the new ‘Bayliss-Thomas.’ It is a comfortable roomy 2-seater, with a stout-looking engine of 4-cylinders, rated at 10.5 h.p. The bodywork of the little car is good, and the spring and general chassis layout very serviceable.”

**“Always a Goer.”**

Jan. 21st.—“I trust you have plenty of cars on order. You ought to, because it is the best little car on the market. Never a bit of trouble, always a goer.”

ENGINE—4-cylinder water-cooled.  
GEAR BOX—3 speeds and reverse.  
BACK AXLE—Semi floating.  
SPRINGS—Four 4-elliptic.  
IGNITION—Lucas Magneto set.

**BAYLISS, THOMAS & CO.**  
(Excelstor Motor Co., Ltd.)

Telephone:  
125 Acock’s Green.

**TYSELEY, BIRMINGHAM.**

Telegrams:  
“Monarch, Hay Mills.”



**THE COX “ATMOS” CARBURETTER  
MEANS MUCH MORE  
THAN MERE FUEL CONSUMPTION,  
MORE POWER ON HILLS,  
SMOOTHER AND MORE FLEXIBLE ENGINE**

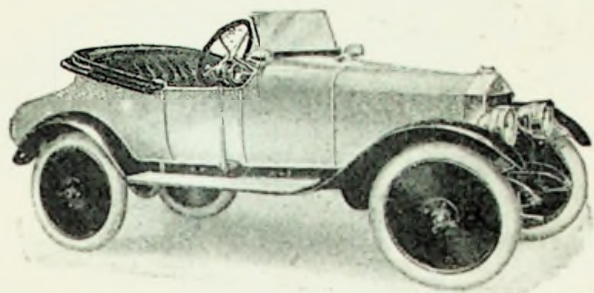
The actual experience of those who have had them in use for long periods, coupled with extended tests carried out by leading car manufacturers, has proved beyond all argument that the peculiar type of mixture delivered to engine by the Cox “ATMOS” Carburetter does have the effect of very greatly prolonging the life of engine bearings, due to the fact that, owing to perfect combustion being obtained, no free fuel reaches the base chamber oil, as occurs with many other types of carburetters. This also means longer life of cylinders and piston rings.

Further, it has also been proved that the peculiar smoothness of engine produced by the Cox “ATMOS” Carburetter prolongs the life of transmission and driving wheel tyres to a very considerable extent. Tests re tyres have shown 25% to as much as 50% increased life, depending for the difference between these two figures on type of driver handling vehicle.

Enquiries invited, estimates free, including comprehensive booklet on carburation.

**COX CARBURETTERS LTD.,  
LOWER ESSEX STREET, BIRMINGHAM.**

# 10-22 H.P. *Eric-Campbell*



## £ 300

or £78 down and  
12 monthly pay-  
ments of £19:10:0

*ABRIDGED SPECIFICATION.*

10 h.p., 4-cylinder Coventry Simplex Engine. Zenith carburetter, dynamo lighting set with 5 lamps, 5 Michelin steel wheels and tyres 710 x 90, speedometer, clock, horn, revolution counter, hood, screen, broad two-seater body finished all aluminium, pump, jack, all tools.

By special arrangement with the  
**Colchester Motor Hire Purchase Co.,**

Limited,  
75, Crouch Street,  
COLCHESTER.

MANUFACTURED BY

## VULCAN IRON & METAL WORKS 1918 LTD

### DURDAN WORKS, SOUTHALL.

Telephone :  
206 Southall.

Telegrams :  
"Durdan, Southall."

SOLE CONCESSIONNAIRES :

## DOBSON & SMITH, LTD., 56, Knightsbridge, S.W.1.

Telephone : Victoria 1126.

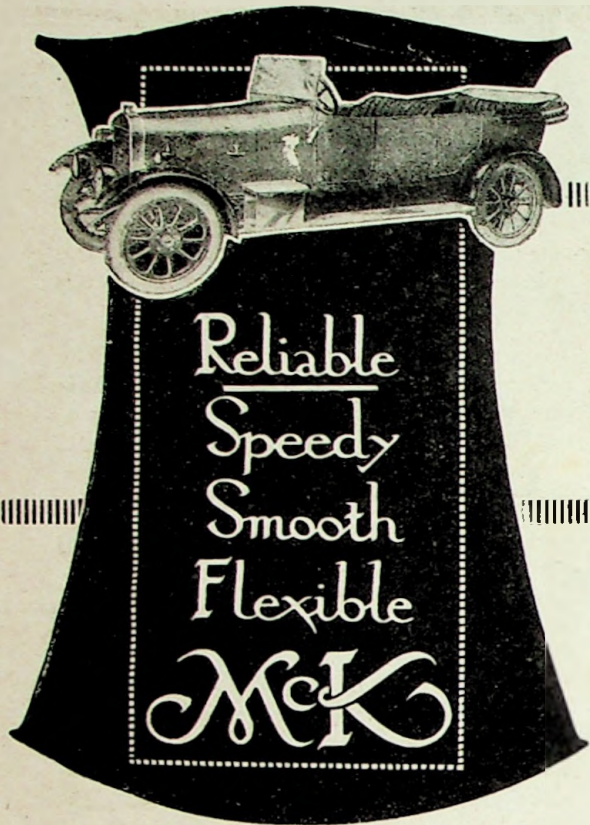
Telegrams : "Ortomobili, Knights, London."

TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.

Misc:

Br



## McKENZIE LEADERS — 3.

*Mechanical Perfection  
and Beauty of Line.*

**P**RIDE of possession is often sought after but rarely attained in a car. Why? Because some shortcoming of the mechanical or æsthetic element bars the way to its attainment. But a McKenzie is different. Mechanically it is perfect—experienced motorists have proclaimed it so; whilst its line and beauty of finish stamps it a machine of obvious superiority.

**Specification:**  
105 h.p. 4-cylinder Engine. Bolt Lighting and Self-Starters. Equipment, five Lamps, three Speeds and Reverse. Spiral Bevel Back Axle. Long Semi-elliptic Springs. Spare Wheel. Hood and Screen. Full Tool Kit.

**PRICES:**

Two-Seater	£425
Four-Seater	£460
Coupe Utility	£495
Coupe de Luxe	£525

Tax £11-

# McKenzie

MOTORS LTD.

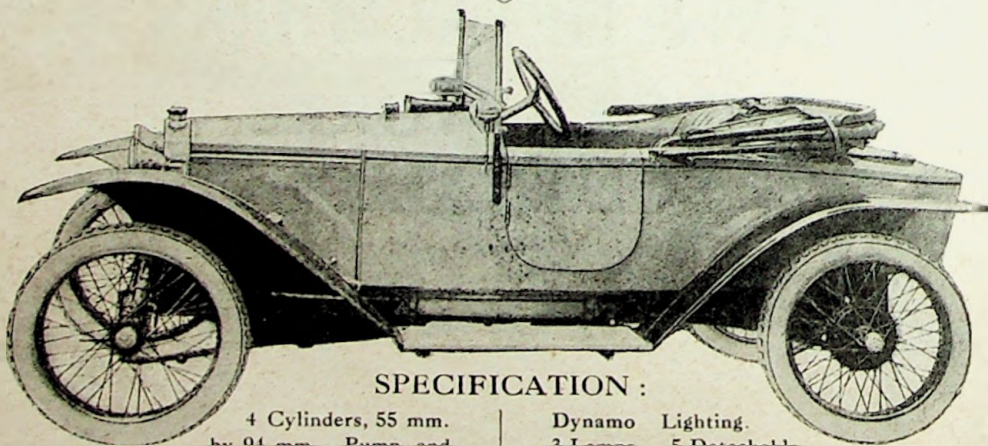
Charles Henry Street, BIRMINGHAM.

Sole London Agents:  
HARRODS LTD., 118, Brompton Rd., S.W.1

7.5 h.p.



Two-Seater.



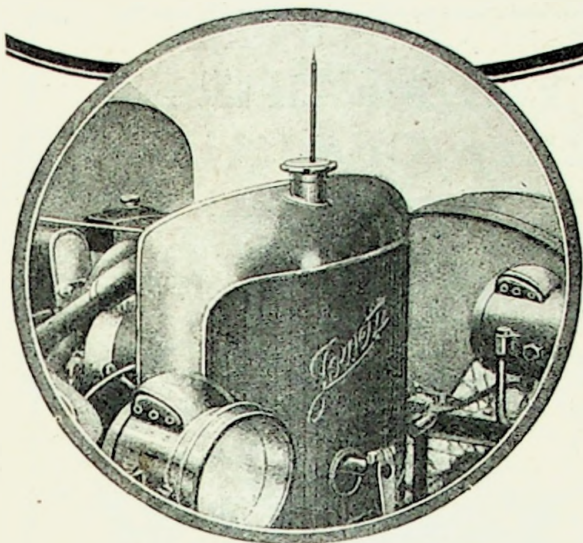
### SPECIFICATION :

4 Cylinders, 55 mm.  
by 94 mm. Pump and  
Trough Lubrication. H.T. Magneto.  
3 Speeds and Reverse. Gate-change.

Dynamo Lighting.  
3 Lamps. 5 Detachable  
Wire Wheels. 4 Tyres, 710 by 90.  
Kit of Tools.

Complete Car **£295**

**VINOT CARS LTD., 147-149, GT. PORTLAND ST., W.1.**



THE accompanying photograph is a half minute exposure showing a pencil balanced on the radiator cap of a 7 h.p. JOWETT car while the engine was running at varying speeds from its slowest to 1,000 r.p.m.

The photograph was taken by "The Light Car and Cyclecar" who state that there was absolutely

**NO VIBRATION.**

*Vibrationless*

7 h.p. JOWETT Car  
**£300**

Complete with Electric Lighting Set, Speedometer, Spare Wheel, Tyre and full kit. Wide Dickey Seat £10 extra. Tax only £7.

De Luxe Model £335  
 including Dickey Seat.

MIDLAND LIGHT  
 CAR TRIALS

Feb. 11th.

**2 JOWETTS**

entered, awarded

**2 GOLD MEDALS**

Their average petrol  
 consumption was

**64.4 M. P. G.**

For serviceability and economy, combined with comfort, there is no better investment in the light car market than the 7 h.p. JOWETT — here it is



"The little engine with the big pull"

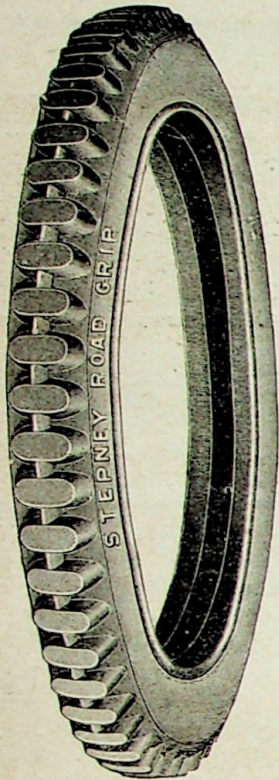
Illustrated Catalogue post free from  
**JOWETT CARS LIMITED,**  
 IDLE, BRADFORD

*The*  
**Jowett**

*First in 1911—Foremost ever since*

TO THE  
 READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.



STOCKED BY ALL GOOD GARAGES.

## The IDEAL TYRE for All Roads in All Weather Conditions.

**STEPNEY ROAD - GRIP TYRES** are constructed with prominent grippers on the tread to ensure safety at all times.

They are built at our own British Tyre Factory, by British Workmen, with the best materials, under the most modern principles, and they may be relied upon to give the utmost value obtainable in Tyres.

# STEPNEY ROAD-GRIP TYRES

**STEPNEY SPARE MOTOR WHEEL, LTD.,**

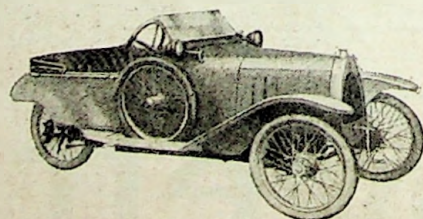
STEPNEY WORKS, and 168, GT. PORTLAND STREET, LONDON, W.1.



THREE-WHEELER

TAKE THE NEAREST ROAD however Rough or Hilly, they're all the same on the **T. B. THREE-WHEELER.**

**£175**



**THOMPSON BROS. (BILSTON), LTD.,**  
Bradley Engineering Works—BILSTON.

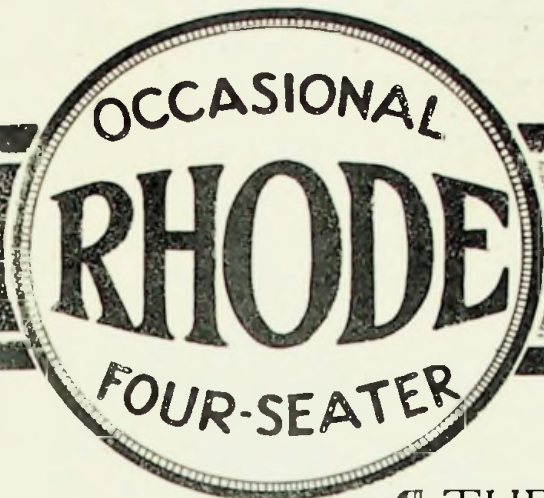
Telegrams: "Thompson Bros., Bilston."

Telephone: No. 10 Bilston

Bt4

**HELP THE MOVEMENT**

by letting advertisers know that their advertisements in "The Light Car and Cyclecar" interest you.



THE IDEAL  
"ECONOMY"  
CAR.

*Low Initial Outlay.  
Low Upkeep Cost.  
Low Running Cost.*

Four-cylinder, Water-cooled, Dynamo lighting, Five Wheels and Five Tyres, 40/50 m.p.g., 40/50 m.p.h.

Tax £10.

Price, complete.

**£275**

*Sole Distributors  
London and South  
of England :*

**Mebes & Mebes**  
144, Gt. Portland St.,  
W.I.

Telephone:—Langham 2230.

THE RHODE CAR

is agreed—on all sides—to be the finest value - for - money proposition ever put before the motoring public.

It represents  
**MAXIMUM EFFICIENCY**  
at  
**:: MINIMUM COST ::**

**SANGSTER CUP TRIAL,**  
Lond's End to Birmingham,  
Whitsuntide, 1921. One  
Car entered. **GOLD  
MEDAL.**

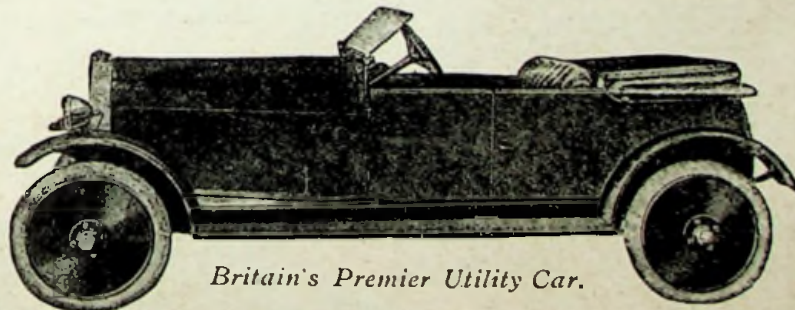
**NEWPORT MOTOR CLUB  
RELIABILITY TRIAL,**  
September, 1921. One Car  
entered. **GOLD MEDAL.**

**SCOTTISH TWO DAYS'  
TRIAL,** September, 1921.  
One Car entered. **GOLD  
MEDAL.**

**MACCLESFIELD MOTOR  
CLUB TRIAL,** October,  
1921. One Car entered.  
**GOLD MEDAL.** *And only  
car to complete the course  
non-stop.*

**LONDON—EXETER TRIAL,**  
Xmas, 1921. Two Cars  
entered. **2 GOLD MEDALS**

**MIDLAND LIGHT CAR  
CLUB'S Economy Trial,**  
Feb. 1922. **GOLD MEDAL.**



*Britain's Premier Utility Car.*

**THE RHODE MOTOR CO.**

**Tyseley, Birmingham.**

'Phone - - - Acocks Green 109.  
'Grams - "Rhocar, Acocks Green."

**TO THE  
READER**

*By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.*

**B15**

# "The Prettiest Car on the Road"



**A**T the price B.A.C. Light Cars represent extraordinary value. £345 will purchase a smart two-seater with dicky, the specification including a four-cylinder water-cooled engine, four-speed gearbox, detachable wheels with spare, and C.A.V. electric lighting and starting.

Two-Seater with dicky	£345
Four-Seater	£395
All-Weather Coupé	£455

(Illustrated.)

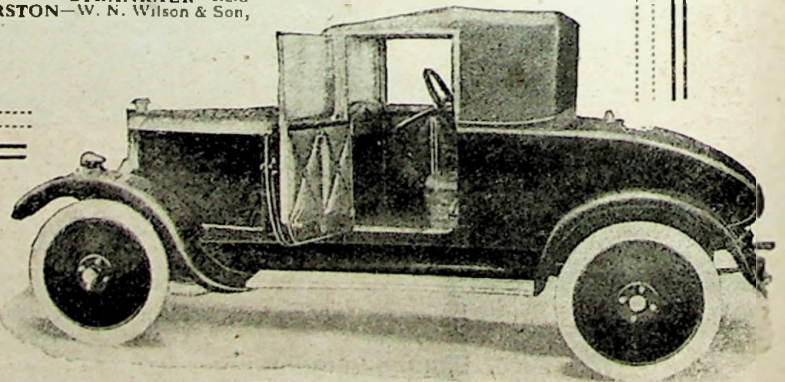
Deferred terms can be arranged through the Industrial Guarantee Corporation, 134, Great Portland Street, W.1. Booklet "G" will be sent on request from the manufacturers or your local agent.

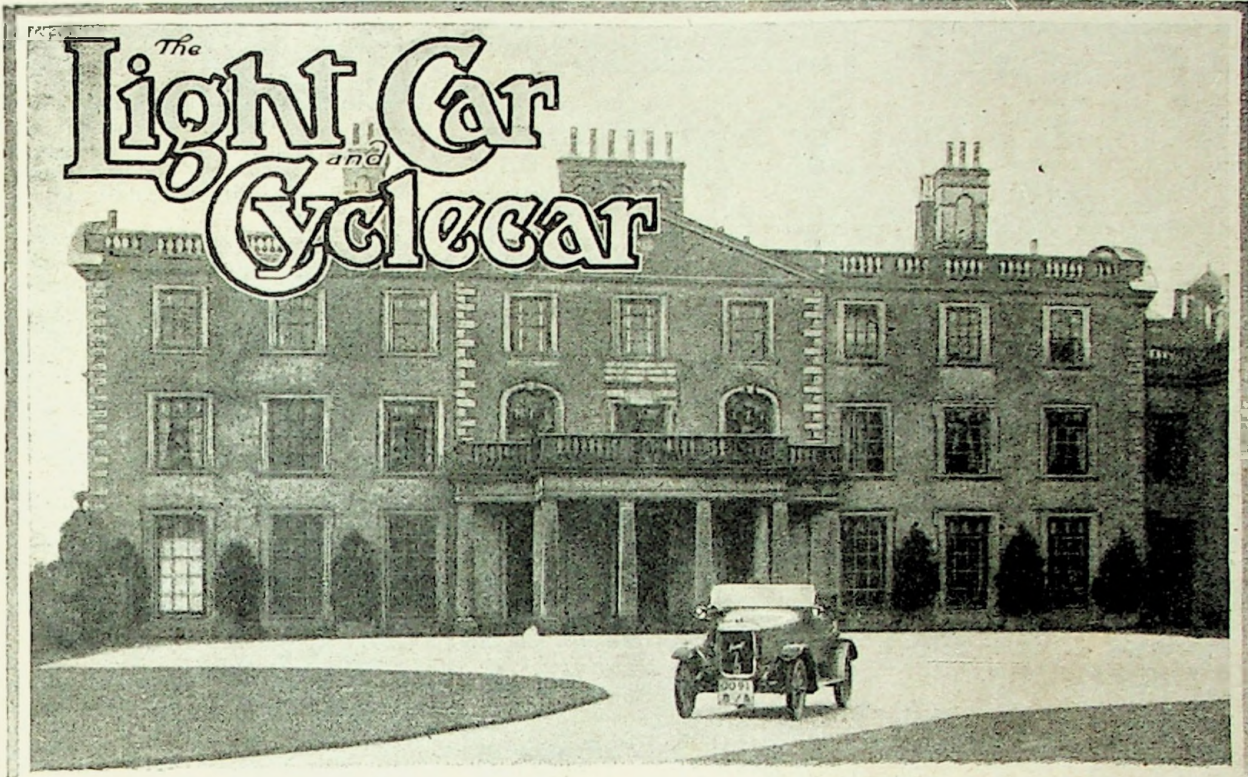
## B.A.C. LIGHT CARS, 19, Great Portland Street, London, W.1.

Telephone: Langham 2936 (4 lines). Telegrams: "Racegod, Wesdo, London."

### LOCAL AGENTS:

**ABERDEEN**—Barry Henry & Cook, Ltd., Engineers. **BIRMINGHAM**—Hydes, 18-20, John Bright Street. **BRADFORD**—Grange Motor Co., Grange Road. **BRISTOL**—Flook & Hall, Stokes Croft. **CARDIFF**—John Lewis, Frederick Street. **COLCHESTER**—The Motor & Electrical Instruction Co., 85, East Hill. **GLASGOW**—Maxwell Park Garage, 65, Sprinkell Avenue. **HULL**—Central Motor Mart, Ltd., Station Garage. **KENDAL**—Henry Jackson, New Road. **LEICESTER**—The Willowbrook Motor Co., Belgrave Gate. **LITH**—William Morrison & Son, Jane St. **LIVERPOOL**—Field & Slater, 81, Renshaw Street. **MANCHESTER**—British Tractors, Ltd., 64, Bridge Street. **NEWCASTLE-ON-TYNE**—The Percy Motor Co., 64, Northumberland Street. **NOTTINGHAM**—H. W. Gardiner, Thurland Street. **NORTHAMPTON**—W. N. Wright, 96, Simington Road. **PLYMOUTH**—Light Motors, 28, Tavistock Road. **ROTHERHAM**—Robert Jenkins & Co., Ltd., Engineers. **STRANRAER**—Reid & Adams, Bellevilla Garage. **ULVERSTON**—W. N. Wilson & Son, Motor Engineers.





THE ROYAL \_\_\_\_\_ Princess Mary is spending the first part of her honeymoon at Weston Hall, Shropshire, the HONEYMOON. residence of the Earl of Bradford. The cyclecar in the foreground is a 7 h.p. Jowett.

## Notes, News and Gossip from all Quarters.

### Opening Rally of the J.C.C.

The opening Rally of the Junior Car Club takes place to-morrow (Saturday, March 4th) at Burford Bridge Hotel. Members and their friends are particularly requested to attend, and an interesting social programme has been arranged.

### Scottish Six Days.'

We are informed that the Stoneleigh utility car should be included in Class 1 in the list of cars eligible to compete in the Scottish Six Days' Light Car Trial, this section being for cars priced at under £250 complete. We would also point out that a 12 h.p. Talbot-Darracq is given by the R.S.A.C. in their list as having an engine capacity of 1,460 c.c. This is an error, apparently copied from a list published by a contemporary. We learn that a big entry in this trial is anticipated.

### Under Repair.

Priest's Bridge, in the Upper Richmond Road, between Roehampton Lane and Hogger's Corner, is under reconstruction, and will not be opened again for about three months. It will be possible to pass only a single line of traffic at a time, and drivers, therefore, are advised to follow alternative routes.

No. 484. Vol. XIX.

### New Club-house at Weybridge

If sufficient support is forthcoming, it is proposed to open a new club at Weybridge, the situation of which will be adjacent to Brooklands. The annual subscription will be three guineas, and those who are interested should communicate with G. G. Dixon, Esq., 28, Inverness Terrace, Hyde Park, W. 2.

### Essex Club Hill-climb.

The 14th annual hill-climb of the Essex Motor Club takes place on Saturday, March 25th, and will be an open event for all types of cars—touring, sports, and racing models. Particulars and entry forms are now ready, and can be obtained from Mr. E. J. Bass, 40, Chancery Lane, London, W.C.2. There will be separate classes for three and four-wheeled touring type cyclecars, while sports models will apparently compete in the 1,500 c.c. sports class.

### LIGHTING-UP TIMES

for Saturday, March 4, 1922.

London ..	6.13	Edinburgh ...	6.20
Newcastle...	6.15	Liverpool ...	6.23
Birmingham	6.19	Bristol ...	6.23
Dublin ...	7.6		

Lighting-up time in Ireland is one hour after sunset and in Scotland half-an-hour after sunset. Lighting-up time in England and Wales is half-an-hour after sunset.

Moon.—First quarter March 6th.

### All About Insurance.

The 1922 edition of Stone and Cox Motor Tables has just been issued, and contains valuable information concerning the various insurance companies and their policy conditions. The price of the book, which can be obtained from Stone and Cox, Ltd., Arundel Chambers, 188-9, Strand, London, W.C.2, is 2s. 9d.

### Indian Maharajah's Light Cars.

That the light car is steadily gaining in popularity abroad is proved by the number of cars which have been recently imported into India. H.H. the Maharajah of Dholpur has purchased no fewer than three Wolseley "Tens"—namely, a two-seater, a torpedo, and a two-seater coupe.

### Hill-climb at Aston Clinton.

Commencing at noon on March 4th, the annual inter-varsity motorcycle and light car hill-climb competition will be held at Aston Clinton. The event will include a class for light cars.

### B.S.A.s Coming Through.

The Birmingham Small Arms Co., Ltd., are making deliveries of the new B.S.A. light car, and demonstration models can now be viewed and tried at all the Daimler depots. Trial runs can be arranged with the Daimler repair depots direct or through the B.S.A. car department.

### The Social Side.

A successful dance was recently held by the Evesham Motor Cycle and Light Car Club at the Town Hall, Evesham. The club now boasts of nearly 100 members, and an attractive programme has been arranged for the coming season.

### Crocks v. Others.

On April 8th the Disabled Society are proposing to hold a rather novel competition entitled "Crocks v. Others," in which a team of disabled light car drivers will compete against a selected team. The event will take place at Saffron Walden, and further details will be given at a later date. The address of Lt. L. F. Maxwell, the secretary of the society, is 48, Grosvenor Square, London, W. 1.

### IMPORTANT EVENTS IN 1922.

March 11th.—Junior Car Club General Efficiency Trial.  
 March 25th.—Essex M.C. Hill-climb.  
 April 1st.—A.C.U. Western Centre Hill-climb.  
 April 8th.—B.M.C.R.C. Meeting.  
 April 15th.—M.C.C. London-Land's End Trial.  
 April 17th.—B.A.R.C. Meeting.  
 April 29th.—J.C.C. Brooklands Meeting.  
 May 6th.—B.M.C.R.C. Meeting.  
 May 13th.—B.A.R.C. Second Meeting.  
 May 27th.—Midland Centre A.C.U. Brooklands Meeting.  
 June 2nd.—M.C.C. London-Edinburgh Trial.  
 June 5th.—B.A.R.C. Third Meeting.  
 June 5th-10th.—Scottish Light Car 1,000-mile Trial.  
 June 10th.—J.C.C. London-Manchester Trial.  
 June 10th.—B.M.C.R.C. Meeting.  
 June 17th.—Ealing and D.M.C.C. Brooklands Meeting.  
 June 20th.—International T.T. and 1,500 c.c. Races in the Isle of Man.  
 July 8th.—M.C.C. Brooklands Meeting.  
 July 22nd.—Essex Motor Club's Meeting.  
 August 7th.—B.A.R.C. Fourth Meeting.  
 August 12th.—B.M.C.R.C. Meeting.  
 August 19th.—J.C.C. 200-Mile Race.  
 August 21st.—Start of A.C.U. Six Days.  
 September 9th.—J.C.C. South Harting Hill-climb.  
 September 16th.—B.A.R.C. 500-Mile Race.  
 September 16th and 17th.—Grand Prix des Cyclecars.  
 September 16th-18th.—Light Car and Cyclecar Grand Prix Races at Le Mans.  
 September 23rd.—B.M.C.R.C. Meeting.  
 October 14th.—B.A.R.C. Sixth Meeting.  
 October 21st.—B.M.C.R.C. Championship Meeting.

### Hot-stuff Petrol.

A correspondent sends us a cutting from a daily newspaper, in which the allotment letter of a certain very well-known petrol-marketing concern is misprinted as "hell allotments." Apparently fuel for really warm engines.

### Cost of Bodies.

It may surprise owners to hear that the cost of a decently made and finished body is nearly as much as that of the chassis. Coach-builders who have gone into the cost of putting up a pressing plant for bodies have abandoned the idea on account of the cost, and also because the plant would enable them to produce enough bodies of one pattern in a week or two to supply a world-wide demand. In this connection it is said that the Ford body-pressing plant only runs for a few months in the year.

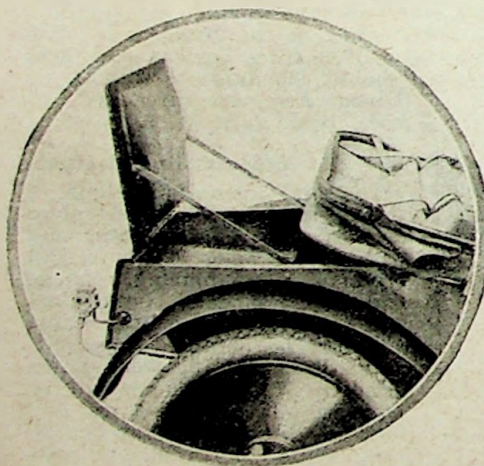
### Rubber Roads.

Referring to our comments in "Rich Mixture" on rubber roads, we have received from the secretary of Rubber Roadways, Ltd., 38, Eastcheap, London, E.C. 3,

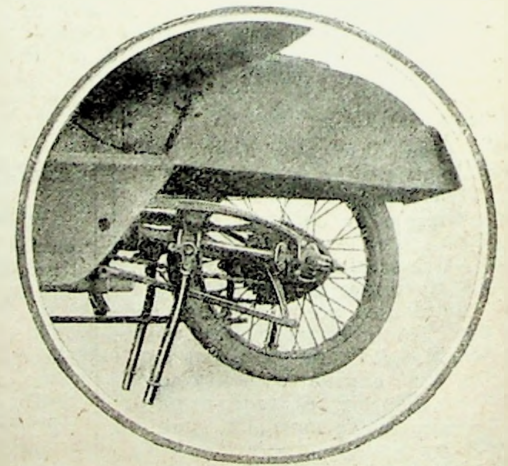
some interesting data on the question of slipping on surfaces of this type, and it is stated that on a patch of rubber roadway which had been under trial during a period of one year and nine months, no case of slip or skidding had been observed. The traffic carried by this stretch of road averaged 190 tons per yard of street width per hour.

### Real Tests of Efficiency.

In the Easy Starting Test in the J.C.C. General Efficiency Trial, failure of the electric starter ultimately to set the engine going entails total loss of marks in this test. Information on how best to see this interesting trial will be given next week.



Two ingenious innovations. (Left) The dickey seat fitted as standard in the new Coventry-Premier cyclecar. (Right) A novel permanently fixed jack for Morgan cyclecars.



### Parking of Cars in Leamington.

With a view to ascertaining whether some provision could not be made in Leamington Spa for the parking of cars, an A.A. official recently called upon Mr. T. T. Earnshaw, the chief constable, who explained that whilst he wished to emphasize the fact that cars could not be allowed to remain in the Parade or Bath Street, there was no objection to their remaining for a reasonable time in Mill Road.

### A Jack for Morgans.

A stand for jacking up a Morgan has been produced by Lyndon and Holt, 44, Clemens Street, Leamington Spa. It consists of a pair of clips attached to the chain stays and two arms carrying the steel tubes which form the supporting lip. The stand can be locked in both positions and the wheel raised when it is down by being moved slightly backwards.

# SWITCHBACK TRIAL IN THE COTSWOLDS.

Cyclecars Do Well  
in "Colmore Cup."

THE seventh annual Colmore Cup Trial attracted 17 cyclecars and close on 200 motorcycles and sidecars. As the cyclecars were despatched last, they had the worst of the roads on the succession of test hills situated on the western flank of the Cotswolds.

The course was of a switchback nature, first going up Aston Hill—where an acceleration test was held—then doubling back to enable the competitors to climb Saintbury, where a stopping and restarting test was carried out, and thence back to Willersey, up Sudeley, and so on to lunch.

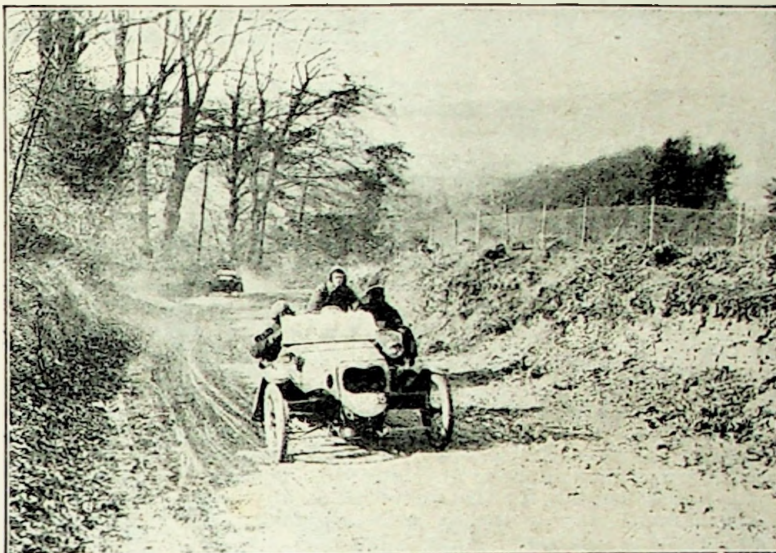
After lunch the switchback process was even more pronounced. Rising Sun or Gambles Lane was the first climb, and after it a sharp descent brought the men back into the valley, only to face the worst hill of the trial—the dreaded Bushcombe. This lane, grass-grown in parts, is narrow and steep, and joins the main Winchcombe-Cheltenham Road at the summit of Cleeve Hill. The steepest gradient is perhaps 1 in 5, but the surface was thick with slime.

### Through the Mud.

Owing to the numerous failures amongst the single-track machines the cyclecars had to wait some 20 or 40 minutes at the foot, and by the time that the T.B.s arrived all the helpers were well-nigh exhausted with their efforts. Mr. Meredith (T.B.) made a splendid climb, not using too much engine, and thereby preventing his wheels from spinning. Mr. and Mrs. Morgan, armed with a Parsons chain, followed, and ploughed their way through.

Mr. Pedley's T.B. became embedded in the mud, whilst Mr. Ridley's New Hudson required a little assistance. Mr. Carr's Morgan made a clean ascent, but Mr. Hulse, on a similar machine, failed. Mr. Yates (New Hudson) made a very good climb, but Mr. Allday's Rhode, despite its Parsons chain, Stepney road grip covers, and differential-less axle, stopped with wheel spin. Mr. Norris (Morgan) failed, but Mr. Denley (Rhode) very nearly made a clean ascent, and only required the slightest assistance.

The G.N. made a practically clean ascent, and the Deemster, which had been delayed at Cheltenham with contact breaker trouble, soon surmounted the gradient.



ON SUDELEY HILL.

Mr. W. A. Carr followed by Mr. Norris, both driving Morgan cyclecars. See also pictures on other pages.

Compared with this hill the others were child's play. The most interesting part of the morning's run was the stopping and restarting test on the greasy bend on Saintbury Hill.

All three T.B.s performed well and got away cleanly. Like the Morgans, they were fitted with Parsons chains, on which they ran throughout the day. Mr. Morgan caused considerable amusement by removing in his back wheel all the tapes that had been carefully nailed to the ground, and it was some time before he realized that he was making off with the club's property. His restart was excellent. Messrs. Hayes and Hulse, also on Morgans, both stopped, one apparently owing to clutch slip. Mr. Cave's G.N. made a really fine restart, as did Mr. Denley's Rhode, which emitted considerable noise from its exhaust pipe. Less spectacular, but equally sure, were the performances of Messrs. Carr (Morgan), Allday (Rhode), Ridley and Yates (New Hudsons).

### The Survivors.

Later on it was reported that one of the Morgans had retired owing to its Parsons chain and driving chain joining company. Otherwise incidents were few, and the following clocked in in the dark at the Stonebridge Hotel:—J. W. Meredith, F. S. Spouse and J. H. Pedley (T.B.s); E. W. Bewsflea, H. F. S. Morgan, C. E. Hulse, W. A. Carr and N. Norris (Morgans); W. Ridley and P. Yates (New Hudsons); J. Allday and H. Denley (Rhodes); J. Cave (G.N.); and G. W. Wilkin (Deemster).

## ENTRIES FOR GENERAL EFFICIENCY TRIAL.

The General Efficiency Trial, organized by the Junior Car Club, to take place on March 11th, has attracted no fewer than 42 entries. These are as follow:—

#### Two-seaters under 1,000 c.c.

- J. S. Bennett (Metro-Tyler).
- J. W. Meredith (T.B.).
- Mrs. Emma M. R. Chavasse Marsden (Rover).
- Capt. C. A. H. Mason (Amilcar).
- F. S. Spouse (T.B.).
- S. A. Wenmouth (Derby).
- H. B. Colbourne (Amilcar).

#### Two-seaters under 1,100 c.c.

- Major R. C. Empson (Webb).

- A. Hooper (Deemster).
- C. J. Mebes (Rhode).
- Capt. A. Frazer Nash (G.N.).
- V. F. M. Oliver (Diatto).
- W. J. H. Phillips (Deemster).
- H. F. Griffiths (B.S.A.).

#### Sporting Cars under 1,500 c.c.

- G. Bedford (Hillman).
- C. A. Bertelli (Enfield-Allday).
- H. R. Godfrey (G.N.).
- F. F. Wesel (A.B.C.).
- A. Warren-Lambert (Warren-Lambert).

#### Two-seaters under 1,500 c.c.

- C. E. Best (Mercury).
- Capt. A. W. Brittain (Calthorpe).
- J. W. Ewen (Alvis).
- W. F. Knight (McKenzie).
- E. Magee (Swift).

- W. F. Milward (Charron-Lagonda).
- Capt. E. J. Needham (Lagonda).
- G. B. Pollard (Alvis).
- A. Noble (A.-C.).
- Major W. H. Oates (Lagonda).
- T. H. Short (Deemster).
- A. A. Pollard (Alvis).
- M. Summerfield (Seabrook).
- S. Watson (Surrey).

#### Four-seaters under 1,500 c.c.

- F. G. McKim (Citroen).
- E. A. Johnson (Albert).
- A. W. Knight (Surrey).
- H. Merks (Enfield-Allday).
- J. G. Offord (Hilay).
- W. Hopper Shephard (Calthorpe).
- H. J. Smallwood (Palladium).
- A. Noble (A.-C.).
- F. H. Beer (Enfield-Allday).



# ESSENTIALS OF THE CYCLECAR.



*In this article, points of particular interest to those who are contemplating the purchase or production of a cyclecar are discussed in a straight-forward and interesting manner.*

## Appealing to the Widest Market. Power and Performance *versus* Price.

**I**F the cyclecar is to appeal to a wide field of purchasers, it is obvious that it must possess certain definite attributes. Likewise, it is clear that in no way must it have anything that is superfluous or extravagant, for the inclusion of anything but the bare necessities means a corresponding increase in price. What, then, are the essentials?

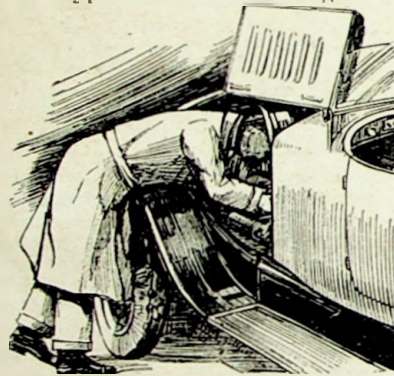
### What is a Cyclecar?

There are still some to whom the term cyclecar has apparently a vague meaning. In certain quarters we hear the most modern types of small and light cars described as "cyclecars (so-called)," which statement merely means a failure to grasp the idea of what a cyclecar really is.

The true cyclecar is a utility machine designed to carry one, two, or more passengers, as the case may be—an automobile which is meant to sell as a hack to be used for business and for pleasure in the same way as does the ordinary bicycle to-day.

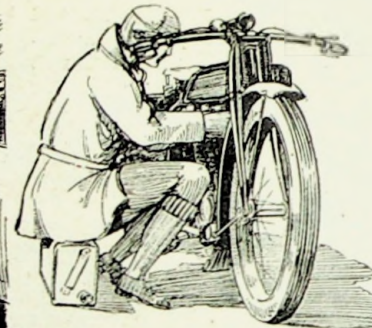
Primarily, let us deal with the all-important question of price. Although it is impossible to be dogmatic in these days of fluctuating prices of raw materials and labour, to be wholly a success the cyclecar should sell at well below £100 complete.

Then, as to performance, it is strange what a



**THE NECESSITY FOR ACCESSIBILITY.**

The solo motorcycle has the most accessible engine of any automobile. The cyclecar power unit should be readily reached for carrying out adjustments.



### Is Speed Necessary?

The maximum speed of the average 35 h.p. motorcycle and sidecar outfit is possibly in the neighbourhood of 37 m.p.h. to 40 m.p.h., yet their owners are quite satisfied, and a cyclecar with a maximum of 35 m.p.h. would suit several purchasers.

It is not maximum speed so much as acceleration and speed on hills that matter. It is in this direction that American cars score, particularly the Ford. Acceleration, we are told, is a matter of

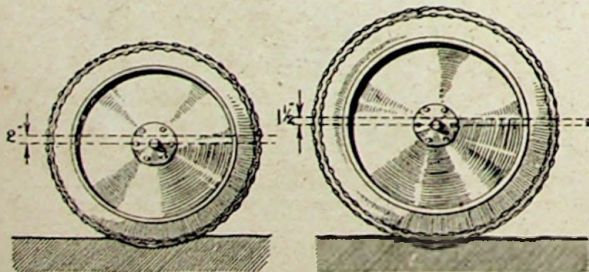
power-weight ratio, and as the power given off by an internal-combustion engine depends on the rate at which it revolves, then obviously acceleration depends upon gearing.

It is in their aim to obtain a high maximum speed that so many manufacturers of simple cyclecars have failed to attain the main desiderata of simplicity of control and liveliness. A cyclecar which will only do 35 m.p.h., but will get up to that speed quickly and maintain it up slight gradients, is far more acceptable than one which will do 45 m.p.h. on the level, but wants humoring at speeds below 20 m.p.h. on top gear.

### Making for the Masses.

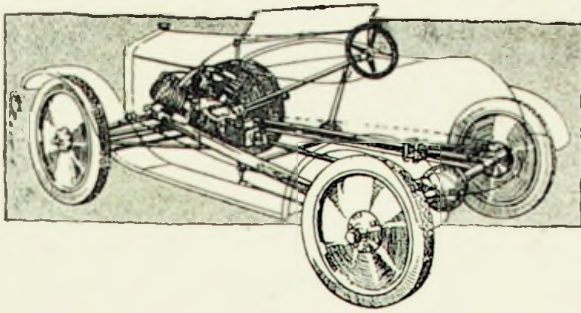
Now, the simple cyclecar should be made to appeal to a class that hitherto has not owned or handled an automobile of any sort. The motorcycle sidecar combination of to-day is a highly developed production, and, except in the matter of weather protection, satisfies the majority of its owners.

Therefore, it would be more difficult to produce a machine which would induce present sidecarists to forsake their first loves than it would be to make a cyclecar which will appeal to members of that far greater class who have heretofore been debarred from



This simple diagram plainly shows how an axle shod with big wheels moves less than does one fitted with small wheels when a pothole is encountered.

fetish seems to exist in the minds of motor manufacturers with regard to maximum speed of their production. Judging by the conversation of a cer-



Is there any adequate reason why the engine and back axle of a light and simple cyclecar should not be built as a partially unsprung chassis as shown above? The body is sprung on the chassis.

the ownership of a car owing to high prices, and have shunned the motorcycle on account of its inadequate weather protection.

This is a point well worth bearing in mind, for it means, among other things, that the manufacturer of a cyclecar must introduce his production and advertise it in such channels as have always dealt with the simple type of car and not mainly with the motorcycle and sidecar.

The main desiderata of the simple machine are that it should be fool-proof, easy to drive, well sprung, easy to start, and, of course, reliable.

With regard to the first point, it is very curious that manufacturers of cyclecars have, up to the present, not considered the claims of the kick-starter more than actually is the case. A twin-cylinder four-stroke engine is infinitely harder to swing over compression than is a four-cylinder unit of the same power, yet on 7-9 h.p. motorcycles we find kick-starters which give every satisfaction and entail the expenditure of far less energy than do the ordinary starting handles fitted on some cyclecars. The ideal arrangement, of course, would be to have the kick-starter so arranged that it could be operated from the driving seat.

**Wanted - Bigger Tyres.**

Suspension is all important, and here again there is a simple and cheap method of overcoming the difficulty—by fitting large wheels and tyres. It has taken the motorcycle industry nearly 20 years to realize that large tyres mean greatly increased comfort, as is very plainly shown by the diagram on these pages. There are, of course, arguments to be raised against the fitting of large tyres in that they increase weight and reduce acceleration, but this is more than counterbalanced by the increased comfort that is obtained.

A car which is not easy to drive will never make a real appeal to the greater masses of the public. We venture to suggest that the popularity of one of the best-known modern cyclecars would be considerably increased if its engine were automatically lubricated instead of oiled by hand, and fool-proofness that has been attained on the average American cars

should certainly be incorporated in the cyclecar so far as its electrical equipment goes.

Electric lighting of one form or another is, in these days, perhaps, a *sine qua non*, but by far the most important objective to be achieved in the production of a true cyclecar is to keep the ratio of passenger weight to chassis weight as high as possible.

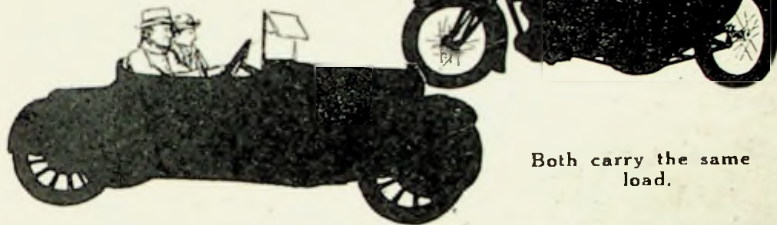
The average 6 h.p. motorcycle and sidecar weighs but 3½ cwt. to 4 cwt., and it carries two full-grown adults. The two-seater sports model light car weighs probably 12 cwt., and only carries the same useful load at approximately the same speed. Obviously, there is wastage, and no one wishes to buy fuel for a petrol engine in order that it may drive itself over the road, which is actually what is happening when the ratio of passenger weight to useful weight ratio is low.

One method of getting over this difficulty, which so far has not been tried, is to copy the motorcycle and spring the front of the chassis, leaving the rear

unsprung, and then to suspend the seating accommodation on to the chassis. Until someone definitely proves that such a system is not practicable, there is certainly no reason to believe that it is impossible.

One argument that has been put forward against the cyclecar is that there are several owners who would rather spend, say, £150 on a first-class motorcycle and sidecar than buy a lower-grade car

The sidecar weighs 4 cwt., the car 12 cwt



Both carry the same load.

**USEFUL AND USELESS WEIGHT**

A comparison between the weight of a large car and its passengers and the motorcycle and sidecar and its load quickly proves why large car motoring is unnecessarily expensive.



The true cyclecar must have a small turning radius. Many light cars are deficient in this respect.

priced at the same figure. An analogy is that several prefer to have a house and grounds in the country than a small unpretentious flat in town, costing the same.

It is surprising how many people live in flats. The question is one of utility. Motoring to-day is not a sport; it is an extremely necessary adjunct in the lives of all of us, whether we view it from the aspects of business or pleasure.

M.T.  
B21



# RICH MIXTURE

Being News and Views  
From All Quarters.

## Hard Driving.

**T**HERE is one characteristic of the car I am at present driving that is very interesting. If I take it out into the open country after having used it in town for five or six days it goes very sluggishly for the first 20 miles or so, and then suddenly seems to find a few spare horse-power from somewhere and behaves as it should.

Time and time again I have noticed this trait, and I wonder if the explanation is that when running on never more than quarter throttle, the oil that gets into the combustion head remains oozy, as it were, and has some bad effect on the flame propagation, or power of the explosion in the cylinder, and only dries up into a hard and respectable carbon deposit after a considerable amount of real work on full throttle. Certainly, the harder I drive it the better it pulls at all speeds. Have others noticed similar phenomena?

## 1,200 m.p.h.

**O**F course, my readers will peruse this paragraph if they overlook the others, for the heading suggests something exciting. Twelve hundred miles an hour is moving, and I did this the other night, but not on the road or in the air, but seated in my armchair.

In point of fact I undertook to "unwind" a speedometer which had reached its maximum figures. As a matter of interest I found that it took five minutes to turn it back 100 miles, this process being very much more arduous than the compilation. I anticipate that the instrument will be reduced to zero some time next winter!

## Selling at a Loss.

**T**HAT manufacturers cannot possibly cater for the overseas market, with things as they are at present, is quite common knowledge, but at least one manufacturer has been doing quite a brisk business during what is usually reckoned the slack period—the winter months. To sell cars at a certain price a steady output must be maintained, for there is very little difference in many overhead charges whether five or fifty cars are being turned out. In other words, it pays better to produce fifty cars a week than it does to produce five.

In this particular case it was known that those cars

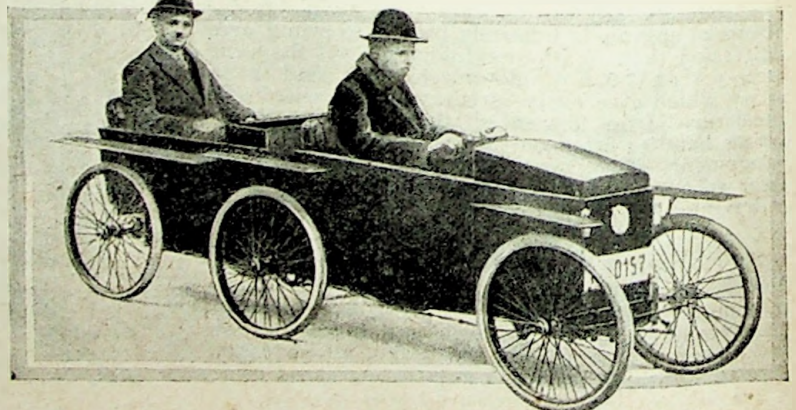
which were going overseas would actually be sold at a loss, but as these machines enabled the output to remain steady and normal, and, incidentally, prevented the swelling of the unemployed ranks, the home market was still supplied and deliveries given as usual.

In a way this is an excellent policy from the business point of view, for when conditions again tend towards the normal and the overseas markets are open to the British manufacturer the production of the concern referred to will not need any introduction, for they will have already secured a firm footing.

## The Wonders of Wireless.

**O**NE gets out of the habit of being surprised nowadays, but I must confess to being a little taken aback when I was asked if I would like to hear Germany when putting my car into a garage the other evening. It was at the Park Motor Car establishment, just off Jermyn Street, and, having acquiesced a little wonderingly, I was taken into a room where I found a fully equipped wireless installation.

There was a large cabinet with a swan-neck horn



A SIX-WHEELED  
CYCLECAR.

The latest from Germany is a six-wheeled electrically driven cyclecar. The rear wheels trail. It is capable of about 15 m.p.h. and runs 50 miles on one charge.

on the top of it and containing a multitude of ebonite knobs and insulated coils. After waiting a few minutes we heard the time signals sent out from Germany as plainly as though they had been made just outside the door. A little while later the instrument was tuned in to receive Chelmsford, and we were

*RICH MIXTURE (contd.).*

entertained to some of Amy Woodforde Finden's "Indian Love Lyrics" by Clara Butt, and that was not all.

**Clara Butt and Sparking Plugs.**

**W**HILE we were "listening in" a car drew up and stopped with its engine running. My newly-found friend went outside and asked the driver to switch off, and, when he came back, explained that some curious noises that we heard from the wireless set were caused by the sparking plugs. He assured me that on a slow-running engine a missing plug could very easily be detected.

This seems to me to be still another use for this latest development of science. I see that a well-known scientist has fitted up a Lagonda coupé with a wireless receiving station, and so apparently the day is not far distant when we can picnic on the South Downs and still keep in constant communication with the office. The A.A. will have to look to their laurels, too, and provide their itinerant scouts with wireless telephone sets.

**The Call of the New Car.**

**M**ORE than half the joy of motoring lies in the sense of owning something just a little better than the next man. Hence the turnover in second-hand cars.

I'll have you know that a week ago I was the owner proud  
Of a splendid car, the best, by far, of all in our local crowd.  
For looks and speed they all agreed that I was a mile ahead;  
When I showed my skill on our local hill the rest of 'em all  
seemed dead!  
For miles around there couldn't be found another of equal  
class.  
That they envied me it was plain to see. But never again,  
alas!  
With conscious pride will I swiftly glide to the meet of our  
local club.  
For my car of late I've begun to hate—my butterfly seems a  
grub!  
I note the loss of the splendid gloss that adorned the paint  
erstwhile;  
Her maximum speed seems slow indeed, and her climbing  
simply vile!  
With plenty of lies I'll advertise the thing, and if I can land  
Some man with the cash and a nature rash, I'll sell it him  
second-hand.  
The car, I may say, is as good to-day as it was when I thought  
it fine;  
But the man, you see, who lives next to me has a later model  
than mine!

**Compression Ratio and How to Find It.**

**T**HE compression of an engine can be defined as so many pounds to the square inch or given in the form of a ratio, such as 4½ or 5 to 1. The cubic capacity of the cylinder and the size of the combustion chamber provide the determining factors. The latter, to some extent, can be varied by using deep or shallow valve cups, a concave, flat, or convex top piston, or by inserting a washer between the base of the cylinder and the crankcase.

The cubic capacity of the combustion chamber can be measured by bringing the piston to the top of the stroke, sealing the sparking plug orifice, closing both valves, and filling the chamber with oil measured out from a glass graduated in c.c.s, through the compression tap orifice. Once the cubic capacity of the combustion chamber is known, comparison with the a.c. of the cylinder gives the compression ratio.

**Audible Warning.**

**N**ORMALLY, everyone regards the electric horn as being an accessory that requires about as much attention as the steering wheel rim, but the fact remains that there are horns on the market which do grow tired and work erratically.  
No matter how well one may drive, it is practically



IN THE COLMORE CUP.

Bushcombe Hill proved to be the undoing of several competitors in the Colmore Cup Trial. Cyclecars performed far better than sidecars. Above is Mr. J. W. Meredith on his T.B. Note the surface.

certain that one has to "drive on the horn," and rely on its sound alone to avert trouble at some time or other, and a horn that goes on strike usually manages to do so at the most inconvenient time.

These remarks are prompted by the performance of a Graham electric horn I have had in use for over a year on different cars. The other day it ceased to respond to the switch owing to a chafed lead wire from the battery, and it then struck me that it has always given unfailing service without any attention at all, and I regard it as being a wholly reliable instrument, and not a dear one at that.

**Have You Heard This?**

**B**REVITY, they say, is the soul of wit. Herewith is an extract from an American paper:—  
"J. Smith (Alberta) yesterday struck match to see if petrol tank was empty. It was not. Age 37. No flowers."

SIMON SIMPLICITAS.

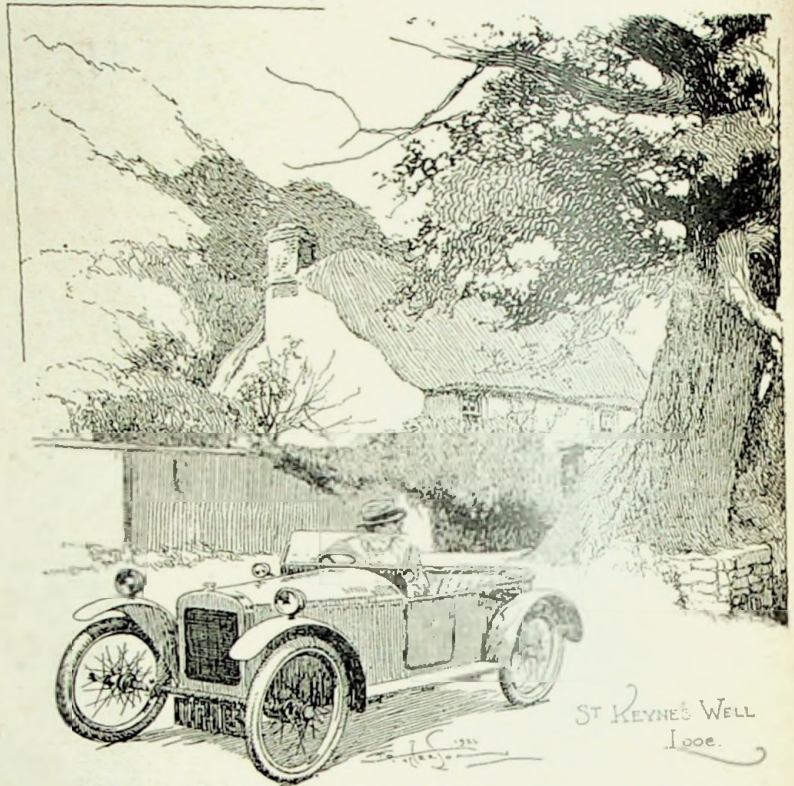
*A Venue Worth Visiting.*

## LOOE—ON THE CORNISH COAST.

**T**HERE could hardly be a happier hunting ground for the touring motorist than the southern coast of Cornwall, and one of its outstandingly interesting localities is formed by the twin villages of West and East Looe. Both are in reality collections of old-world fishing cottages facing each other across the Looe River, a salt-water creek with its banks connected by an ancient bridge.

In West Looe there is a famous and comfortable old inn called "The Jolly Sailor," while the district abounds in wonderful coastal scenery, wooded forest vieing for beauty with densely wooded creek-banks. East Looe is the larger village, and is nearer London, the best method of approach being through Exeter, Tavistock, and Liskeard.

Famous Polperro Harbour is four miles to the west of Looe, and is usually recognized as being one of the most interesting and picturesque villages on the Cornish coast. It has still an active fishing industry, pilchard being the main catch, and the harbour is infested by a tremendous number of seagulls; their activities are ceaseless. Now that spring is at hand, and plans are being made for Easter tours, motorists might well consider the claims of the Cornish coast. The roads in this district are, on the whole, fairly good, and a very interesting itinerary would be through Exeter and



One of the many items of interest in the charming little village of Looe, in Cornwall.

Plymouth to Looe and Fowey to Bodmin, across to Wadebridge, turning northwards to Bude, Holdsworth, and Bideford, and back through Barnstaple via either Bampton or the coast road through Plymouth and Porlock.

*A Hint Worth Knowing.*

## ON TOWING AND BEING TOWED.

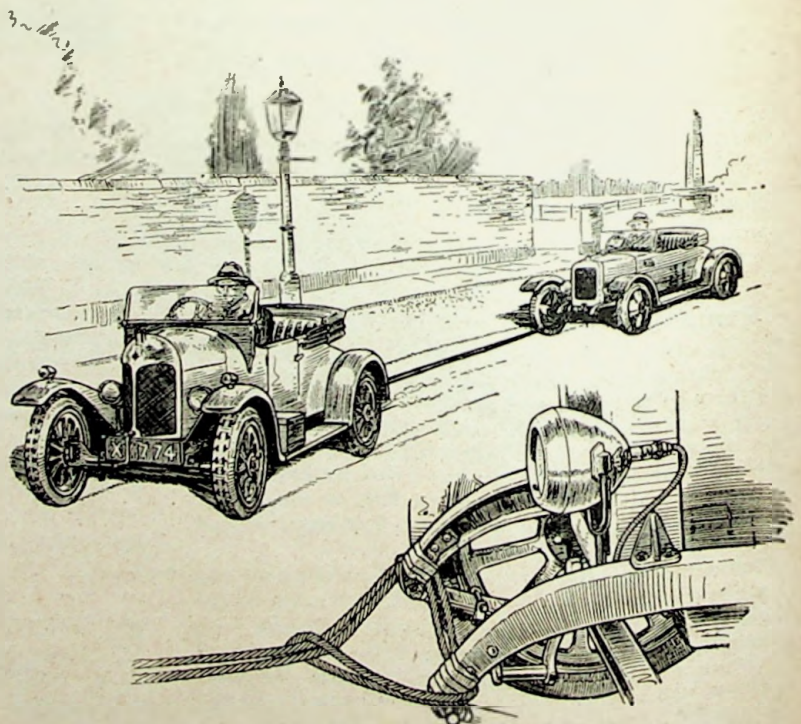
**S**OONER or later it falls to the lot of every driver to be towed home, and possibly also to tow in another car.

For this purpose a rope, some seven or eight yards long, should be obtained. A weak or worn rope is useless, and will be snapped by the first jerk. A good central pull can be obtained by doubling a long rope and running it through the space between the front dumb-irons and half-elliptic springs; of the towed car in the easy manner outlined in the sketch. If this method is impossible, the rope must be run round the front axle, but in either case, in order to avoid fraying, it is advisable to pad the axle or springs and dumb-irons with rags, which should be fastened in position with string.

The front end of the rope must be attached to the frame of the towing car, again using rags to prevent fraying at the point where it is bent round the frame member.

Before starting, the towing and towed driver should arrange a code of signals so that the towed driver can warn his friend when he wishes to stop.

B24



About eight yards is the proper distance to maintain between towing and towed. The lower illustration shows how to fix the rope.

# The Light Car and Cyclecar

Conducted by EDMUND DANGERFIELD.  
 TEMPLE PRESS LIMITED  
 (Proprietors of "THE MOTOR," "MOTOR CYCLING.")  
 7-15, Rosebery Avenue, London, E.C.1.

Telephone—5292 Holborn (five lines).  
 Telegrams—"Pressimus Holb., London."

**MIDLAND OFFICES:**

Birmingham:—16, Bennett's Hill, corner New Street.

\*Phone-6014 Central. \*Grams—"Presswork, Birmingham."

Coventry:—6, Warwick Row.

\*Phone-1775 Coventry. \*Grams—"Presswork, Coventry."

**NORTHERN OFFICES:**

196, Deansgate, Manchester.

Telephone—Central 2467. Telegrams—"Presswork, Manchester."

**Letters.**

EDITORIAL Communications should be addressed to The Editor, "The Light Car and Cyclecar," 7, 9, 11, 13 and 15, Rosebery Avenue, London, E.C.1. Letters relating to ADVERTISEMENT and PUBLISHING Departments should be addressed to The Manager.

ADVERTISEMENT COPY, Blocks, &c., should come to hand by Tuesday morning to ensure careful attention and allow time to submit proofs, except when an earlier time is specified.

**Subscriptions.**

"The Light Car and Cyclecar" will be mailed regularly at the following rates:—

	12 ms.	6 ms.	3 ms.
United Kingdom	21s. 6d.	10s. 9d.	5s. 6d.
Canada	21s. 6d.	10s. 9d.	5s. 6d.
Elsewhere	24s. 0d.	12s. 0d.	6s. 0d.

Single copies 4d., post free 5d.

Subscriptions should be addressed to the Manager.

*The*

## LIGHT CAR & CYCLECAR

was founded in 1912 to cater for the needs of users and potential purchasers of various new types of cyclecars and light cars, and it has consistently encouraged the development of this new motoring movement for more than nine years.

The journal is published every Friday, dated Saturday. There should be no difficulty in obtaining a copy at any bookstall or newsagent, as arrangements have been made to ensure a regular supply. Should any difficulty be experienced, we should be greatly obliged to receive the name and address of the reader's newsagent.

### CONTENTS OF THIS ISSUE.

	PAGE
News	367-368
Colmore Cup Trial	369
Essentials of the Cyclecar	370-371
Rich Mixture	372-373
Topics of the Day	375
Confusing Competition Issues	376-377
Oil-cooled 4-cylinder	378
New Roger Cyclecar	379
The Solid Back Axle	380
Run on Atomette	381
Niceties in Overhauling	382-383
The Steam Cyclecar	384-385
10 h.p. Calcott on Road	386-387
Spice of Novelty	388
Our Readers' Opinions	389-392

## Topics of the Day

### Essentials of the True Cyclecar.

IN this issue we publish an important article wherein are laid out the desiderata which, in our opinion, are necessary in the specification of the successful cyclecar. There is no benefit to be derived in hesitating to face the fact that the true cyclecar has not developed as quickly as it might have done, but there are now definite signs to show that its advent in large numbers is close at hand. Several of the most important manufacturers in Coventry are devoting their attention to evolving and developing the most simple types of passenger-carrying machines for two, and in spite of the efforts of those who have in the past scoffed at the cyclecar, their designs follow to a great extent the lines which we have always consistently upheld in this journal.

There is, we admit, a large amount of propoganda work to be done before the present generation of motorists look with favour on the ultra simple type of car, but it is not to them that the manufacturer should make his appeal. Rather should it be to that larger class of would-be motorists who have heretofore been prevented from buying cars on account of their costs, and who refuse to take to the road on motorcycles on account of the exposure entailed in bad weather.

### Capturing Overseas Trade.

FROM day to day our postbag contains letters from British motorists resident abroad who urge that we should give greater prominence to the necessity for supplying foreign markets. We do not think for a moment that British manufacturers overlook the possibilities, but at the present time they are faced with a dual problem. In the first place, the rate of exchange between this country and several potential markets is dead against exportation; and, in the second place, the existing system of taxation in Great Britain is crystallizing designs which are considered unsuitable for overseas work.

#### The Value of Competition Work.

This admittedly is discouraging, but there may, and probably will, come a time when the path will be smoothed out, and, bearing this in mind, an endeavour must be made to advertise our small car productions now. The best possible method is to meet the foreigner on his own ground, and we therefore urge British manufacturers to see that they are well represented abroad in all the principal forthcoming sporting events. Only by this system will international attention be focused upon their productions.

### Wanted—Systematized Traffic Signals.

ON the front cover of this issue is strikingly depicted an occurrence that is unfortunately only too commonly encountered—a case in which a policeman who is directing traffic makes unintelligible signals. London cyclecarists are probably less troubled in this respect than are those who live in the provinces, for the Metropolitan policeman is very efficient. Unfortunately the same cannot be said for all his confreres in England, and, in view of the greatly increased amount of fast traffic on our roads it is high time that a systematized set of signals should be arranged and utilized throughout Great Britain.

The utility cyclecar is used largely in traffic, and so this shortcoming on the part of those responsible for the public welfare perhaps concerns our readers more directly than it does other classes of road users.

Safe and rapid personal transport is to-day essential for our national progress, and no stone should be left unturned to make our roads as safe as is humanly possible.

## CONFUSING COMPETITION ISSUES

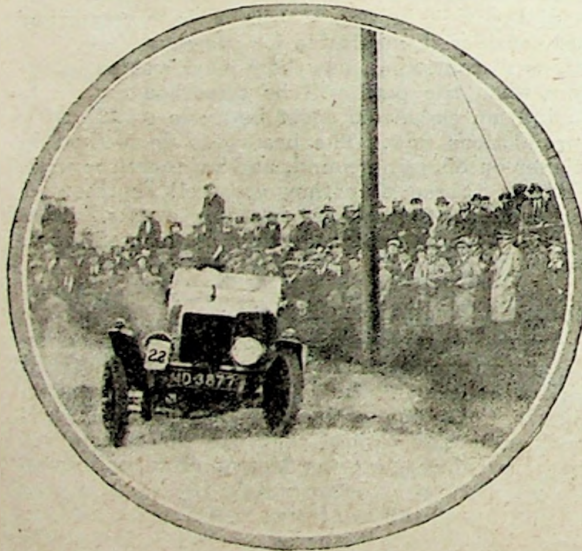
The Value of Utility and Surprise Trials Discussed from the Standpoint of the Man in the Street.

**T**HERE will probably be a great many competitions for light cars and cyclecars during the coming season. Their value to the trade, to the private owner, and to those responsible for their conduct will depend almost entirely on the rules and organization governing them.

Promoters should fix in their minds the objects for which they are running their trials. Their aim may be to encourage the sporting or technical aspects of motoring; they may even run an event as a form of propaganda, with the object of demonstrating the capabilities of the modern light car, in the hope that local motor business will benefit. Lastly, a club may organize a trial purely for the sake of making money.

### The Usual Programme.

These varying objects and interests cannot all be served simultaneously. A sporting trial, in which the driver's skill plays a prominent part, might form the worst kind of propaganda, as would be the case if many failures occurred on freak hills and break-



Appealing largely to the type of spectator eager for excitement only, the speed hill-climb is another branch of competition work; but, unfortunately, it is becoming all too familiar to keen and intelligent motorists.

downs were frequent owing to bad road surfaces. Conversely, a trial run for purposes of propaganda might be uninteresting from either the technical or sporting standpoints.

Last year the ordinary form of competition in-

B26



Track racing, with its high speeds and frequent thrills, certainly ranks as one of the most popular and important branches of competition work. The photograph is typical of the sporting struggles for supremacy, which are a feature of Brooklands.

cluded such items as speed hill-climbs, non-stop reliability runs with a few bad hills thrown in, petrol-consumption tests, and races at Brooklands.

In many cases promoters depend largely on the trade or semi-trade support, which is forthcoming or not according as to whether the manufacturer considers it good or bad policy.

At some time or other in their careers most of the large manufacturers of motorcars have supported trials. Many still do so, but others aver that they now have no need to compete.

In certain kinds of events specialization has reached such an intense pitch that it would be folly to enter a standard car. In other events the standard model may stand a fair chance of success, and for this reason makers who have confidence in their productions, especially if they are new models, would gain prestige by taking part.

It is easy to name concerns which have won fame and fortune by establishing the excellence of their products by an active road campaign. In the coming keen competition some of those who have abstained from this form of advertisement for many years will certainly return.

### Played Out?

Such, then, is the situation at the commencement of another season. Already the possibilities of speed trials, hill-climbs, petrol consumption and reliability trials have been fully explored, and the time has arrived when new and more useful qualities must be developed.

The ordinary motorist is not encouraged to buy such and such a car because it climbed Kop Hill at 60 m.p.h. He takes reliability more or less for granted in the year 1922, so that a gold medal in a London-Exeter run hardly thrills him. The results obtained in petrol-consumption tests are often too marvellous for him to believe, and if he did he would know that the car had been specially prepared in some way: otherwise how could it put up a performance two or three times as good as that of his own standard vehicle?

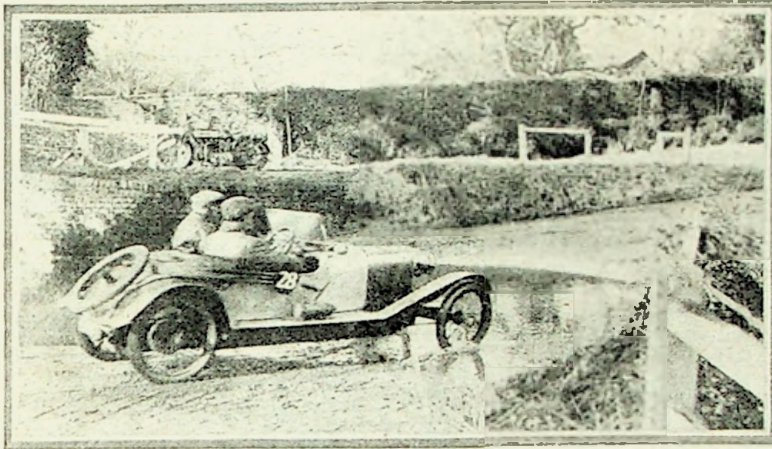
No, the interest of the ordinary motorist is directed in quite a different direction. First, he wants comparative tests of standard cars under ordinary touring conditions. Reliability cannot be tested in a day or even in a six-day trial. Nothing

*CONFUSING COMPETITION ISSUES (contd.).*

under 5,000 miles is of much use when reputable makes are on test.

After reliability, running costs are the next most important item from the ordinary motorist's standpoint. Here, again, it is impossible to arrive at correct and useful figures for care and maintenance and fuel and oil consumption under a distance of several thousand miles. Tyre wear is a subject which has seldom been discussed by promoters, but which is of vital importance to the owner.

Under the heading of care and maintenance, the time spent in periodic adjustments might be considered. Tests of time taken in refilling the engine with oil, draining the crankcase, cleaning the jet, adjusting the brakes, filling the axle casing or gearbox with oil or grease may not appear thrilling,



A water-splash has more of a spectacular than an educational value. Such conditions are seldom, if ever, met with by the private owner.

but they are just the points on which the average motorist requires enlightenment. Every owner-driver comes across "snags" in the design of his car in the course of time. The car with no "snags" still awaits discovery.

**An Important Point.**

Car comfort is an illusive phrase. Some cars are much more pleasant to drive or be driven in than others. The efficiency of the springing, the adaptability of the all-weather body, the ease of fitting the side curtains and hood and the efficiency of the mud-guarding system, all naturally group themselves under this heading; even the time taken to clean the car is an important factor to many owner-drivers.

It is not uncommon to hear of detachable wheels that fail to detach, of jacks that are too tall or too short for their job, of inaccessible filler caps, of toolkits that take longer to reach and unravel than the adjustment itself, of cylinder heads the removal of which spoils the washer, of one-man hoods requiring two people to raise them, and so on and so forth. These are the features that interest the buying public more than speed hill-climbs and freak reliability trials.

Some of the suggestions made above might be incorporated in a "surprise" trial, in which no competitor would know with what he had to contend until the trial had actually started. Such a test

would favour the skilful driver to some extent, but would also show up the good and bad features.

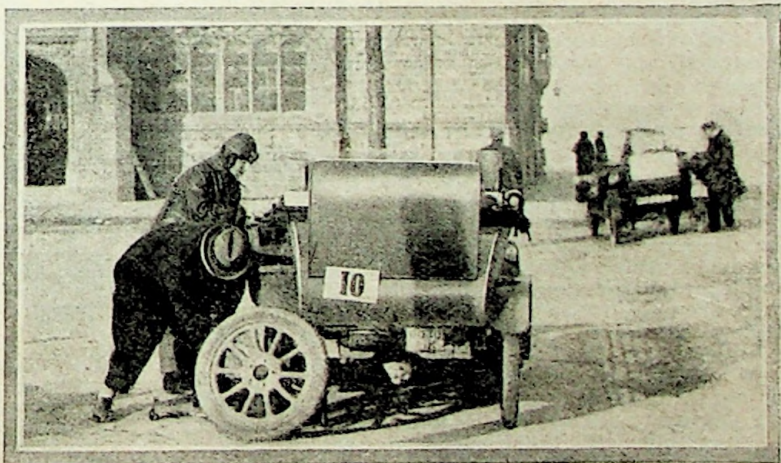
For instance, at some point on the route a competitor might be required to remove the contact breaker of his magneto or to erect his hood and side curtains, both operations being timed. As a test of the ease of handling of a car nothing is better than an "about turn" in a narrow lane. To do this smartly the brakes must be effective, the clutch must stop quickly, the gears engage immediately, and the steering gear be free.

**Useful, if Unconventional, Tests.**

There would be less chance of a car being specially faked in a surprise trial in which the tests remained a mystery up to the last moment than in an event in which special characteristics could be worked up beforehand with a view to scoring in particular features. Consequently, the results obtained in a surprise trial might be expected to approximate more closely to those obtained by the private user.

As an alternative suggestion there is an excellent model in the Junior Car Club's General Efficiency Trial, in which a number of features are tested in the same event. In this case all-round excellence is the chief aim as apart from excellence in one particular feature.

In conclusion, one would emphasize the importance of keeping in view the objects with which any particular trial is being planned. A sporting event should appeal to the sporting class of owner, a technical test to those more interested in mechanical developments, an event run as a means of securing good propaganda for the motoring movement to the agents and manufacturers, as well as to the imagination of the non-motoring public, and a social run to paterfamilias and his wife.

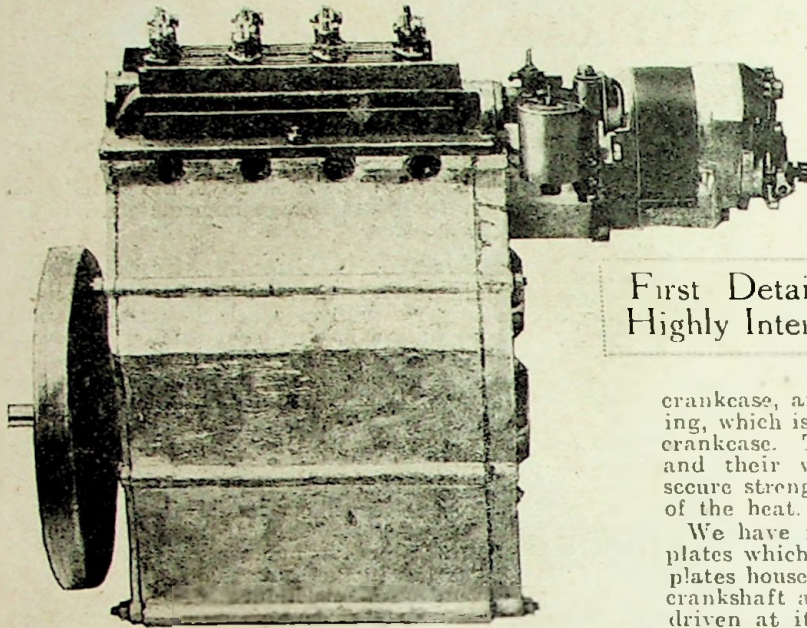


Our contributor pleads for tests of more practical value to the private owner-driver. The above, an incident depicting wheel changing in the Economy Car Trial, represents the kind of tests to which he refers.

If the objects of these varying events are not founded the events themselves will benefit.

A certain amount of apathy is shown by some sections of the motoring public with regard to competitions, but they would do well to realize that these tests affect them very closely, and that they should, therefore, watch results with the idea of discovering both good and bad points in the design of modern productions and forthcoming models.

M



An external view of the new Marschal oil-cooled engine. Observe its clean exterior, and the novel magneto mounting.

WE have stated from time to time that if the present designs of air-cooled twins behaved satisfactorily in the hands of the public it seemed quite possible that the next step in the evolution of this type of power unit would be the production of four-cylinder air or oil-cooled engines.

The following description of one of the attempts along these lines shows that the anticipated development is materializing more quickly than several people might imagine. At the present moment it is not desirable to discuss certain details of the internal arrangement of this engine, but any details that are omitted at the present juncture will be fully described and illustrated when the makers are ready.

#### Tested and Proved Successful.

Plans for the production of this power unit were put in hand twelve months ago, and the first experimental engine, which has already covered 6,000 miles in a car, is still running well. The aim of the designer has been to produce an engine that can be manufactured cheaply, is smooth to drive, and simple and economical to run. The fact that there are only five castings in the engine—to wit, the three pieces forming the crankcase, the monobloc cylinder barrel, and the cylinder head—indicates to some extent the simplicity of the design. Indeed, it is anticipated that the cost of manufacturing this engine would approximate to that of producing a two-cylinder in either air or water-cooled form.

The sides and bottom of the crankcase are formed in a single aluminium casting, narrowing to the top, to which is bolted the vertically ribbed cast-iron cylinder head. This head contains the inlet and exhaust manifolds, the former leading forward, on the right-hand side of the casting, to the carburettor, and the latter leading backwards, on the left-hand side of the casting, to the exhaust pipe. Midway between the manifolds are the four vertical rocker posts, the rockers being double ended, and operating the overhead exhaust valves by a pushing motion and the inlets by a pulling motion.

The underside of the head is machined flat and suitably bored to accommodate eight overhead valves. It fits flush on the top of the sides of the

## A FOUR-CYLINDER OIL-COOLED ENGINE.

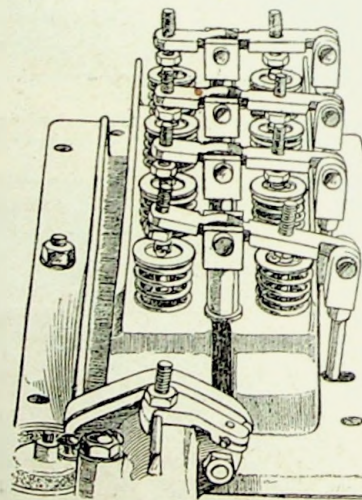
### First Details of a Revolutionary and Highly Interesting Cyclecar Power Unit.

crankcase, and is bolted to the cylinder barrel casting, which is, of course, completely submerged in the crankcase. The cylinders are cast in a single piece, and their walls are deep and strong, partly to secure strength, and partly for the better radiation of the heat.

We have not yet referred to the aluminium end plates which seal the crankcase fore and aft. Both plates house substantial ball bearings, on which the crankshaft and camshaft run, the latter being gear-driven at its forward end, with the gears located inside the main crankcase. The magneto is spigoted into position high up on the left side of the front plate to which it is bolted. The dynamo, which is not shown in the illustrations, is positively driven from the forward end of the crankshaft, and the oil pump is similarly situated. An orifice is provided in the extension of the front plate which

carries the magneto to serve as an oil filler, and is, in consequence, easily accessible.

The lubrication arrangements are extremely interesting. The case contains about one-gallon of oil; Vacuum A being the type used on the experimental model. The pump forces the oil through a small radiator carried in the conventional position, and the oil returns to the crankshaft, from which it is whirled out to the pistons and inside and outside of the submerged cylinder barrels. Hitherto



The overhead inlet and exhaust valves are operated by a push-and-pull motion of a single rod running from the internal camshaft. This arrangement reduces the number of working parts to a minimum.

the oil consumption has worked out at from between 1,200 and 1,400 miles to the gallon.

On the first experimental car provision was made for assisting the cooling of the engine with a fan, but tests conducted in the Welsh mountains in winter time have proved that a fan would be superfluous.

The engine is rated at 7-11 h.p., the bore and stroke being 60 mm. and 90 mm. (1.018 c.c.).

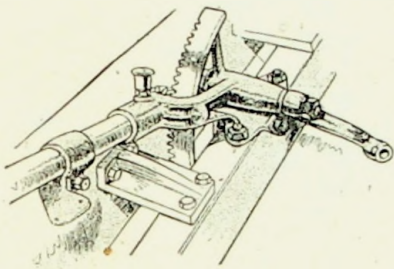
The sole manufacturing and selling rights of this interesting unit have been secured by Marschal Motors, Ltd., Atlantic Works, Victoria Park, Coventry.

## NEW 10.8 H.P. ROGER CYCLECAR.

Friction and Chain-driven  
Four-cylinder at £245.

**T**HE specification of the Roger, a new small car produced in Wolverhampton and handled by Turner's Motor Manufacturing Co., Ltd., includes a roomy two-seater body, four-cylinder Coventry-Climax engine, friction gear providing a speed range from 4.45 to 1 down to 15 to 1, and a differential-less axle. Suspension is by means of a transverse spring in front and quarter-elliptics at the rear.

The engine is a neat monobloc casting, and can be obtained with the cylinders bored to 63 mm.



Simple and effective. How the steering reduction is arranged on the Roger. Note the rigid fixing of this unit.

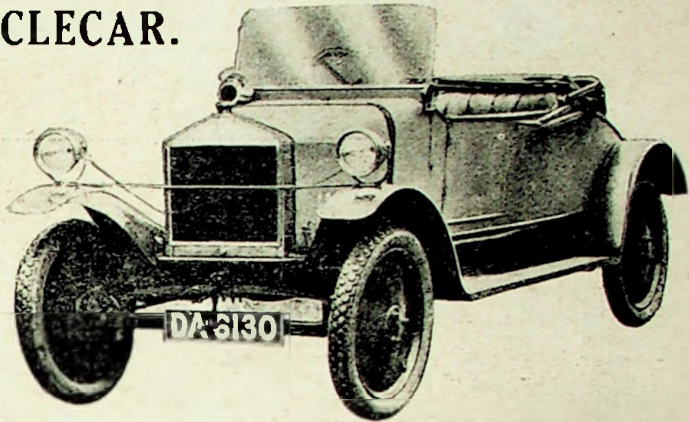
or 66 mm., the stroke remaining 100 mm. in each case. It is held to the frame by means of four arms extending outwards from the crankcase, and transmits the power to the friction gear through a shaft fitted with a flexible coupling at each end. The driving shaft is carried in a long gunmetal housing, which is supplied with oil direct from the engine. A suitable thrust race is situated at the forward end of the shaft, over which the operating lever and the collar which it controls are located. The small amount of end movement necessary to disengage or engage the driving with the driven wheel is taken up by the flexible couplings already mentioned.

The driven disc is an aluminium casting on to the periphery of which a ring of compressed millboard is bolted. The rings are split to facilitate their removal, and can be fitted in three-quarters of an hour. The driven member slides on a splined shaft disposed at right-angles to the driving shaft, and when in the central position just clears the centre of the driving wheel, which is recessed for the purpose. The final drive from the splined cross-shaft to the rear axle is by means of a Coventry-Duplex chain.

The back axle is supported on four Skefco ball bearings, its correct radius being maintained by two rods, both ends of which are also housed in substantial Skefco bearings. On each side of the right-hand radius rod there is a contracting band brake, which is applied to a drum on the axle, the adjustment for each band being accessible from the rear of the car.

The friction gear is isolated from mud, dust, and grit by means of an under pan, whilst access to the spring can be obtained through the footboards of the front compartment.

The frame consists of two channel-steel members tapering slightly in front, where they are cross-



Three-quarter front view, showing the transverse springing. The car has a conventional and very pleasing appearance.

braced by a member carrying the radiator and also the central portion of the front transverse spring. The latter is provided with plate-type shackles at each end, and makes up into quite a neat unit. The front axle is a U-section steel pressing, with the top and bottom swivel pin bearings and the back part of each end welded into position.

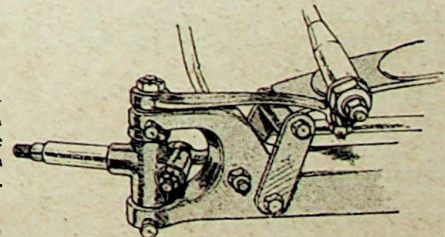
The steering consists of a pinion located at the lower end of the control column and gearing with a quadrant. It is said to be smooth in action and to provide plenty of control.

The petrol and oil tanks, which hold three gallons and half a gallon respectively, are situated under the dash. The tyres are 700 mm. by 80 mm., and are fitted on Linton detachable disc wheels. A Rotax dynamo lighting set, with headlamps mounted on the front wings, hood, screen, spare wheel, and tools complete the equipment of the car, which sells at the remarkably low figure of £245. The address of the concessionnaires is Turner's Motor Manufacturing Co., Lever Street, Wolverhampton.

It is not surprising that friction-driven vehicles are claiming a great measure of attention nowadays, for from many points of view they impress the new owner-driver very favourably. The outstanding feature, of course, is the ease with which changes of gear can be made, and in this connection the Roger, is, naturally, on a parallel with other cars of the same type.

Transmission losses, which, by use of a conventional gearbox, must necessarily be increased, are

The steering head and spring anchorage provide a good example of neat design and assembly.



cut down to a minimum, and, incidentally, the amount of time required for maintenance purposes is also reduced.

A point worthy of mention is that although a friction disc is a delicate piece of mechanism until one has become accustomed to handling it, the substitution of a new ring for one which has been damaged is by no means a difficult operation.

## THE SOLID BACK AXLE.

## Hitherto Undiscussed Points on the Behaviour of the Tyres.

A GOOD deal has been written one way and another about the necessity, or otherwise, of a differential gear on the back axle. It seems to be generally accepted by both "pro-diffs." and "anti-diffs." (if one may be permitted to use the expressions) that there must necessarily be slip between the tyres and the road when the car deviates from the straight path, both wheels being of equal diameter.

It is the purpose of the present article to show that actual rubbing between the tyre and the road need not necessarily occur on a turn of moderate radius. It appears that an important phase of the question is the diagonal stress to which the frame is subjected, and the necessity for substantial cross bracing is pointed out.

Let us consider the case of a light car or cyclecar having a wheel track of 48 ins., and travelling round a curve of, say, 40 ft. radius. The inner wheel would be travelling along a curve of 38 ft. radius and the outer wheel 42 ft. radius. Considering these in relation to an imaginary single central wheel travelling the 40 ft. radius, the inner wheel wants to go  $40/38 = 1.05$ , i.e., 5 per cent. too fast, and the outer wheel 5 per cent. too slow, compared with our imaginary central wheel.

Now, suppose the car weighs 1,200 lb., including passengers, that under these conditions the weight is equally distributed over all four wheels, i.e., 300 lb. per wheel, and that the tyre is inflated to 50 lb. per sq. in. pressure, then the area of contact between the tyre and the road would be about 6 sq. ins.

The shape of this area of contact would probably approxi-

matic and withstand a reasonable amount of deformation. Fig. 2 illustrates what happens on the inner wheel when making a turn of 40 ft. radius. The stud, when it first takes the road, projects straight out from the tyre, but while the car has travelled 4 ins., the inner wheel should have travelled 5 per cent. less than this, or, in other words, it has travelled 4 ins. instead of 3.8 ins., so that if the stud stretches for .2 in., as shown in Fig. 2, there will be no slip between the tyre and the road.

### Effect on the Outer Tyre.

In Fig. 2 the stud only is shown as distorted, but in practice the whole tyre would compress, and so help to make up the required .2 in. The same thing would happen to the outer wheel, except that the part of the tyre in contact with the road would be under tension and stretched .2 in. (see Fig. 3), instead of closed up that amount, as shown in Fig. 2. It is, of course, not necessary that the tyre should be a studded one; on a smooth-tread tyre the rubber would squash up or stretch, as the case might be, depending on whether the wheel was on the outside or inside of the curve.

This action occurs simultaneously while the car is turning, but the effect is not cumulative, for it is only the part in contact with the road that experiences the local compression or stretching, as the case may be; so soon as that part of the tyre clears the road it immediately returns to its normal condition.

Of course, very considerably more power would be required to drive the car round a curve than on the straight, for it requires a big force to

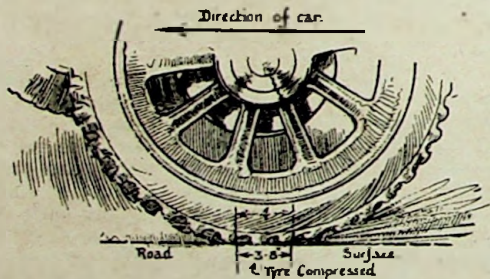
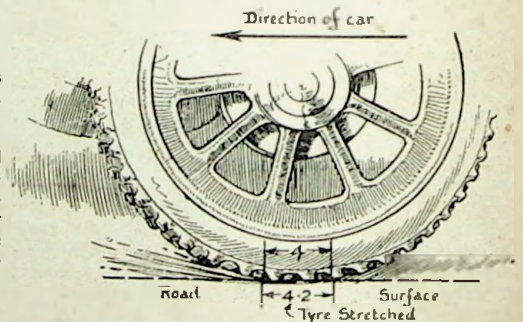


Fig. 1 (Above) shows the tyre under normal conditions when the car is travelling straight. Figs. 2 and 3 (left and right respectively) demonstrate the distortion of the rubber studs on each tyre when a bend is negotiated.



mate to an ellipse, so that if we take this area of contact as an ellipse 4 ins. by 2 ins., we shall not be far wrong.

### Elasticity Versus Slip.

Suppose, for the sake of argument and ease of explanation, that the tyre is a rubber-studded one, and let us consider the action of a single stud. When the car is travelling along a straight path and coasting down a gentle slope, the conditions will be as in Fig. 1. A certain load will be carried by each stud while it is in contact with the road, and the stud will probably flatten somewhat momentarily, but will remain straight, i.e., will project radially.

Now, when the car turns, if the tyre were quite rigid, there would obviously have to be slip between the tyre and the road; but—and this is the crux of the argument—the tyre is not rigid, and, on the contrary, is, of course, specially intended to be elas-

tic and withstand a reasonable amount of deformation. This work is used up as internal friction (though not necessarily actual rubbing) in the material of the tyre. If a car with a solid back axle were driven round and round at full lock, one would expect the tyres to get much hotter than on a similar test with a car having a differential.

As regards the frame, very little consideration will show that the inner wheel pushes the car along, while the outer wheel lags behind, or, at least, tries to, so that there is a diagonal force on the frame, which should be resisted by suitable cross bracing, otherwise the constant reversals of this force, first along one diagonal, then the other (according to whether the car turns to right or left), might loosen the rivets, and eventually make the whole thing rickety. These, and many other points, must be considered in designing a "diff-less" car. H. K.

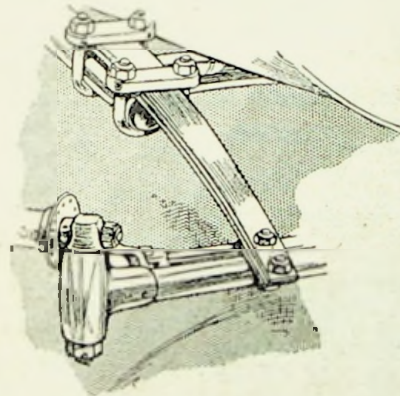
## A RUN ON A TWO-SEATER ATOMETTE CYCLECAR.

A Simple and Economical Runabout Priced at 90 Guineas.

THE Atomette cyclecar, made by Mr. Allan Thomas, of Cleveland Street, Wolverhampton, has undergone several changes since it was first described in these pages, and it was on the new two-seater that we recently had the pleasure of a trial run. The specification is generally the same as that of the single-seater, with an air-cooled 2½ h.p. Villiers engine, three-speed Burman gearbox, and chain-cum-belt transmission to the rear wheel. The rear wheel is rigid, but the body itself is mounted on transverse leaf springs, quarter-elliptic springs being supplied in front. The engine is situated behind the seat, and is cooled by an aluminium fan.

Handle starting has been replaced by a kick-starter on the Burman gearbox.

Owing to the cold weather, both driver and passenger were heavily clothed, and the seating accommodation was, therefore, somewhat cramped. We understand, however, that the body is an experimental one and that those supplied to the public will be two or three inches wider and longer. This, in conjunction with the movable

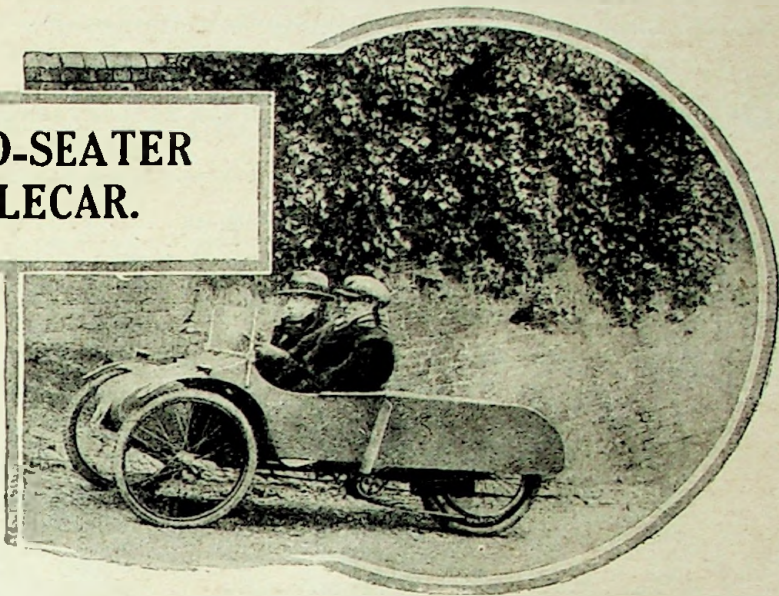


Exemplifying the simplicity of the whole design. The front quarter-elliptic springs are anchored direct to the tubular chassis member. The sketch also shows the simple-type steering pivot.

steering column, should provide ample room for average-sized persons.

### Capable of 30 m.p.h.

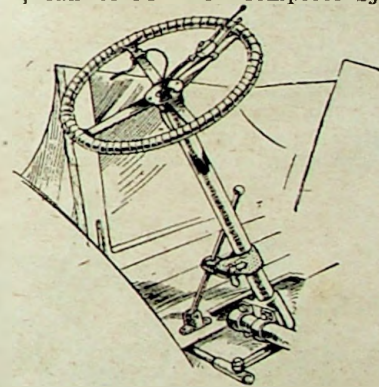
The Atomette is not claimed to be a "go-anywhere" cyclecar. It is a simple and economical runabout, which, at 90 guineas, will take two persons in warmth and comfort over any ordinary roads. We were surprised, however, to find that a speed of 25-30 m.p.h. could be reached. The springing was not by any means perfect, but it was reasonably good, and the rough roads of Wolverhampton were traversed with very little discomfort. Tettenhall Rock Hill, an ascent which necessitates a change down on many cars, was climbed by the Atomette, two up, on top gear, and Old Hill, in the same district, which has a gradient of about 1 in 6, was negotiated on bottom gear without difficulty. The Atomette weighs, approximately, 2½ cwt., which is about the weight of a medium-powered solo



motorcycle. A reverse gear is, therefore, altogether unnecessary, for the machine can easily be pushed with a hand on the steering wheel. Another advantage of its lightness is that it can be tipped up either way, thus making it simple for the transmission, etc., to be attended to should this become advisable. When it is wished to get at the carburetter or sparking plug, the expanded metal door above the engine can be raised. Should this not give sufficient room for the job, the back portion of the body, which contains the petrol tank, can be removed complete by undoing the petrol pipe union and taking off four winged nuts.

### A Sturdy Two-stroke Engine.

After a run of several miles, we found the engine quite cool and developing its full power. Also, as it was always running under load, there was a total absence of four-stroking. There is a pleasure in driving this sturdy, but featherweight, cyclecar, which



The ingenious method of altering the rake of the steering wheel. It is fixed in the desired position by means of the wing nut.

has to be experienced to be appreciated. Even at full speeds, it is remarkably steady on the road—due, no doubt, to the rigidity of the back wheel—and its narrow track and good accelerating powers proved great assets in traffic. It can be stored in any shed which has a door of sufficient width, and can easily be lifted up a step should this shed be on higher ground than the road. Over ordinary roads an average speed of about 17 or 18 m.p.h. can be maintained without difficulty.

An ingenious feature is the manner in which the rake of the steering column can be altered. This column, as can be seen, is anchored at its base to a cross tube, the angle of the column being governed by a diminutive radius rod secured to the floor of the car. By slacking off a single wing nut the steering wheel can be pushed away from or pulled towards the driver until the most comfortable angle is found, and the steering column can then be locked.

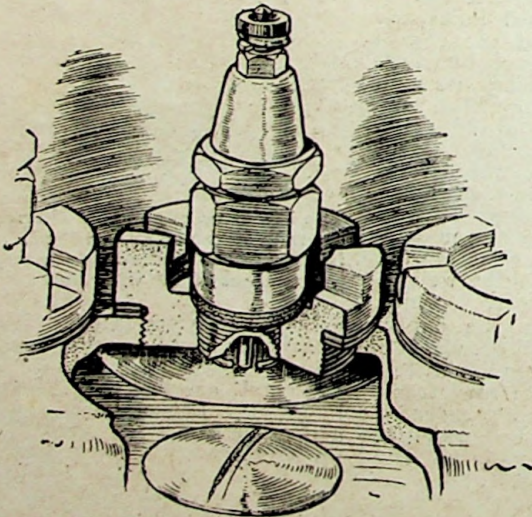
## Some Niceties in Overhauling.

**T**HERE is, perhaps, no better way in which to spend a spare evening or two than to overhaul the engine in preparation for the coming season. Such an overhaul usually resolves itself into the decarbonizing of the cylinders and pistons, the



Reducing friction. If the pistons are given a high polish more efficient lubrication is secured.

adjusting of the tappets, the replacing of C. and A. washers, and so on. This, of course, is routine work, requiring no great skill on the part of the operator, and although the hints here given are in no way difficult to put into practice, the amateur who introduces them into his overhaul will find that they are



To prevent pocketing. A long-reach plug with washers as packing pieces may be used to prevent burnt gases becoming pocketed.

just such niceties which form the dividing line between the routine man and the specialist.

Before the dismantling work is commenced, boxes or other suitable receptacles of various sizes should be placed at hand to take the various "bits" as

they are disconnected, and if one does not introduce method into the overhaul, it is possible, when the time comes for re-assembly, that things will be in a hopeless mess, wrong bolts being introduced here and flanges inverted there, and so on. Each nut should be screwed on to its bolt immediately after removal, packing pieces, washers, or other fittings being threaded on the bolt in their correct relative positions.

It may not be generally known that a considerable improvement in the liveliness of an engine can be gained, in the case of a unit fitted with aluminium pistons, if the outside wall of each piston be highly polished. They should first be cleaned in the usual way, and there is, of course, no need to remove them if the carbon on the inside can be easily removed. Do not forget to "plug" the top of the crank chamber with a cleaning rag or a piece of cotton waste immediately the cylinder block has been removed.

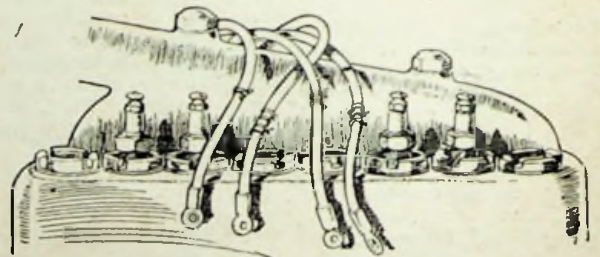


Setting out the rings. The piston rings should be set in the pistons with the slots diametrically opposed to each other and in a line with the gudgeon pin.

### The Position of Piston Rings

When replacing piston rings, not only should the slots be arranged diametrically opposite, but also level with the gudgeon pin ends. This arrangement relieves the weakest points of the rings of the thrust on the piston wall, occasioned by the conversion of the rotary motion of the crankshaft into reciprocating action of the piston.

Without the right tool it is not always easy to clean out the valve guides, but with the aid of a "gun" brush, such as is used for cleaning the barrel of a revolver, the difficulty is at once overcome. If the brush is first soaked in paraffin, any deposit of



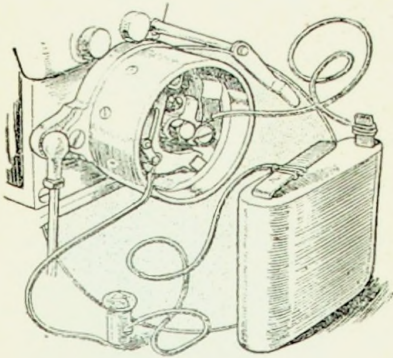
Identifying the leads. How the high-tension leads from the magneto may be identified when they are not coloured. A piece of string is used.

gummy oil carbon or other foreign matter will readily be removed.

Stubborn valve caps and sparking plugs cause considerable annoyance, and frequently bad language, particularly when drastic methods for their removal have to be resorted to. A perfectly simple and effective cure for this is to coat the screw threads with graphite. This positively prevents any such fittings becoming "seized" in position through the heat to which they are subjected.

A badly pocketed sparking plug serves to retard

## Hints—Old and New—which Save Time and Trouble.



Timing to fine limits. A two-volt bulb wired up as shown provides a sure method of magneto timing. The light goes out when the points break contact.

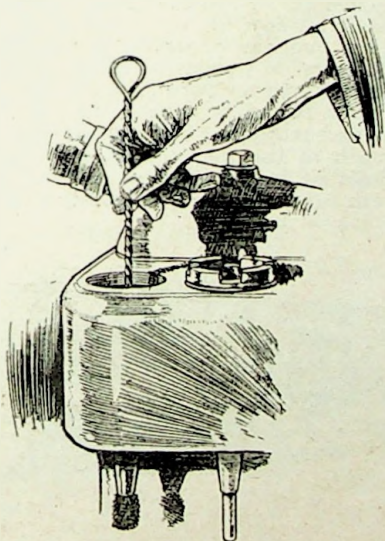
flame propagation, and considerable improvement in the performance of an engine may often be effected by the use of a long-reach plug. If the points project into the combustion space, washers should be introduced

between the cylinder and the plug body until the business end of the plug is brought flush with the inside of the cylinder head.

It may be found that such an alteration will result in rapid oiling up of the plug points, but this tendency may be overcome by converting the second ring of the piston into a scraper ring. The lower edge of the second piston ring groove should be bevelled off in the lathe, after which a number of tiny holes should be drilled in the bevelled face. The oil which is arrested by the ring will thus be enabled to return to the crank chamber via the inside of the piston instead of being forced into the cylinder head.

### Identifying the Leads.

The respective lengths of the high-tension cables usually serve to indicate the cylinders to which they are connected, but if the magneto be removed it will save time and trouble if the leads are clearly marked before removal. This can be done with the aid of a short length of string, one turn being given to No. 1 lead, two turns to No. 2, and so on.



When retiming the magneto the usual method of determining when the platinum points break contact is by means of a piece of tissue paper. A much better method, and one which gives the utmost degree of accuracy, is that in which an electric bulb is connected up with the magneto in the circuit. One wire of the battery is earthed and the other taken to the bulb, the circuit wiring being completed by connecting up the earth wire from the magneto to the second pole on the bulb. With the platinum points in contact, the bulb will light up, but imme-

diately the points break contact the light goes out, which thus allows of the finest possible limits of ignition timing to be secured.

Whenever a joint is broken, it is rarely that the brown paper washer can be removed intact, and



Prevention better than cure. A little graphite applied to the threads of sparking plugs and valve caps prevents them becoming immovable in the cylinder head.

unless one knows the method, the cutting of a new one may take hours, and then the finished washer will be far from satisfactory. If, however, the sheet of brown paper, which should *not* be of the glossy finish description, is laid over the casting, and a



Simple, but efficacious. The only certain method of cutting a perfect washer. The brown paper should be kept well down on the casting.

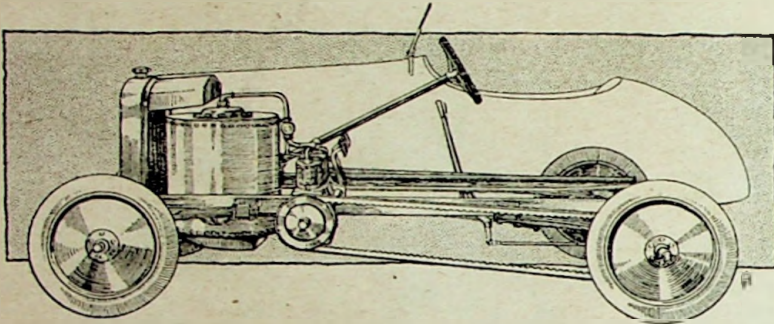
light riveting hammer tapped over the paper along the sharp edges of the casting, a perfect washer will result. All bolt holes should be cleanly cut, as, if the edges are allowed to remain jagged, the washer will probably tear or become distorted when the bolt is passed through.

P.G.T.  
B33

## WILL THE STEAM CYCLECAR EVER MATERIALIZE?—

An Old Controversy Re-opened—  
Is the Steam Car Doomed in  
Every Form?—

**N**O small amount of courage is necessary to enter the lists once again and challenge the critics of the steam-engine as a means of propelling the small car, but the history of scientific progress shows that many a scheme, for years con-



Simple in conception, if not accomplishment, the specification of the steam cyclecar, embodying final belt drive from pulleys mounted on extensions of the engine crankshaft, is undeniably attractive.

sidered impracticable, if not impossible has eventually been brought to successful fruition.

The farther one goes into the question of the steam cyclecar, the more attractive does it become, but although it is so simple in conception, there are, undeniably, difficulties to overcome.

From the foregoing it might be supposed that steam never has been and never will be destined to be the propelling medium for a road vehicle, but practically every reader of this journal must have heard of such well-known "steamers" as the Stanley, Coats, etc., even if he is not acquainted with their internal construction. They look like conventional cars: the controls are modelled on what has come to be regarded as conventional practice, and it is only when one enjoys a run in such cars that one appreciates the limitations of the internal-combustion engine and the advantages of steam. Wonderfully rapid yet smooth and progressive acceleration, silence, flexibility, and no gear lever, with its attendant worries of changing up and down, are but a few of the advantages which strike one even on the shortest run.

### Wanted—a Leader.

One is tempted to ask why the salient features of the Stanley design are not studied and copied by the designers of small steam cars. This sounds suspiciously like plagiarism, in which case the writer might go one better by suggesting that the manufacturers themselves produce a small "10 h.p." model with the idea of seeing how it would appeal to the economical motoring public.

If a concern like Stanley's set the ball rolling, it would be fairly safe to assume that the whole automobile world would be thinking of bringing out a steam car soon after.

Tackling the subject in its simplest possible form, the specification of the steam cyclecar would, in the writer's opinion, be somewhat as follows: The power

unit would be a two-cylinder double-acting piston-valved engine. It would condense into a radiator placed in the orthodox position at the front of the car, but of a greater capacity and designed to provide plenty of water surface to assist condensation. In addition, it would carry enough water to supply the needs of the boiler.

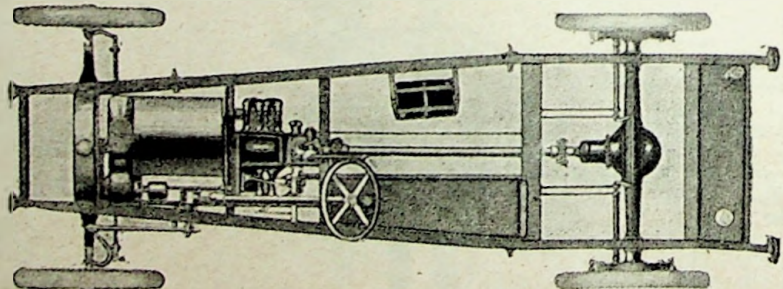
Of course, a perfected flash-tube boiler would be the ideal type of steam generator, but if a small water-tube boiler, more of the semi-flash type, could be introduced, it would not only simplify construction but provide the chance for a really revolutionary break-away by employing ordinary coal fuel.

### Is it Possible?

There are obvious disadvantages to this. For instance, starting-up would present difficulties; in fact, it would mean "firing-up" first, but in certain circumstances the idea would not be so ridiculous as may appear at the outset.

Even if it took half an hour to raise steam, it would not be a very serious handicap, and against this we have the extraordinary low cost of running the vehicle. Stoking would be semi-automatic, and it is not beyond the realms of possibility to assume that a quarter of a hundredweight of the best fuel would run the car pretty nearly all day.

The bugbear of smoke is capable of solution. An authority on smokeless fuels has stated that bituminous coal can be burnt smokelessly under certain conditions, which are that the whole of the products of combustion must be allowed to travel over the full length of the fire and that additional air must be admitted in fine streams above the fire after each fresh charge of fuel. This air mingles with the gases



The steamer in large car form as seen in the Coats. A two-speed gearbox and final shaft drive are adopted. The gearbox would be unnecessary on the cyclecar.

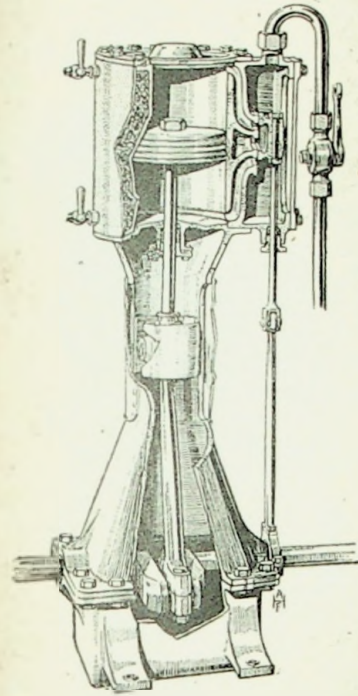
from the fuel, and the mixture must be hot enough to burn at the bridge. Where gases rise directly upwards from a grate amongst water tubes without the admixture by travel just mentioned, smoke is inevitable.

Of course the whole idea is crude, and may be dismissed with a shrug of the shoulders, but to those who have in mind the ultimate conditions of real economical motoring, it is a possible solution which should make a very direct appeal to a large section

THE STEAM CYCLECAR (contd.)

of the community that would be in a position to run and look after such a vehicle.

The steam lorry is, a familiar sight on our streets, and the steam cyclecar, modelled on somewhat similar lines could be refined so that it was a practicable and reliable vehicle.



A single-cylinder double-acting steam-engine in section. The illustration shows the essential differences in design between this and an internal-combustion engine.

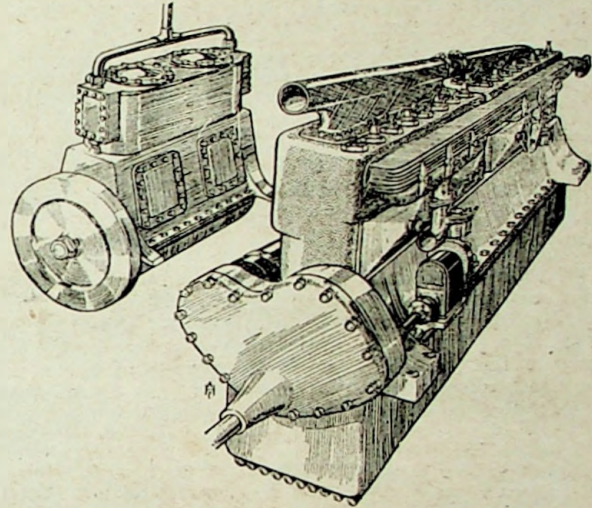
For the more fastidious, a flash-tube boiler would, apparently, be a sine qua non, and the most serious criticism levelled at this type of generator is in relation to the arrangement of burners, the system of supplying fuel, delivering it to the best possible advantage and controlling it automatically so that a constant pressure is obtained.

Surely advances have been made during the last few years whereby a compact, non-elaborate light and thoroughly reliable flash-tube boiler could be produced in order to provide one of the most important parts of the small steam car.

Examining the manifold attractions of the steam cyclecar, and disregarding

sketch shows what the writer considers to be the ideal specification and reveals how very simple the whole construction would be.

Housed under the engine bonnet we have the flash-tube boiler, and immediately behind it the two-cylinder double-acting engine, which, by the way, would give the torque of an eight-cylindered petrol engine. An extension of the crankshaft carries two belt pulleys, and the final drive gives a reduction to the rear axle of, say, three to one. Can anybody searching the archives of automobile history, produce anything more simple, cheaper to produce, more



A graphic argument. The two-cylinder steam-engine gives the torque of an eight-cylinder petrol engine. Note the differences in size and weight.

attractive in its power-weight ratio, or more easy to look after? It is this very simplicity, coupled with its remarkable efficiency, that must bring inventors back again and again to the consideration of a design which, despite all the advances made in the internal-combustion engine, will always have a peculiar and magnetic attraction of its own. F.

for the moment the innumerable advantages of steam over petrol as a propelling medium, a glance at the

A CONE SYSTEM OF FRICTION DRIVE.

The Domecq-Cazeaux Patent Gives a Direct Drive on Top.

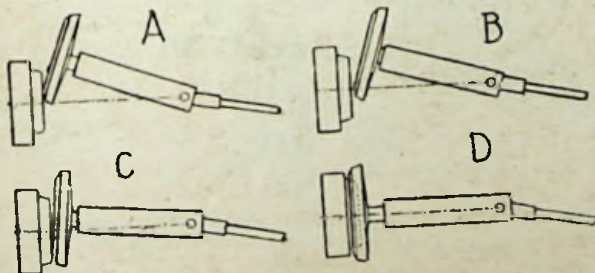
TWO of the outstanding objections to most friction systems for varying speed are that there is always a certain amount of tearing action between the driving disc and the periphery of the driven disc, and that there is no direct drive. Several inventors have

opposite because it couples up direct on the top speed only. All tearing or shearing whilst the intermediate speeds are in use are eliminated, at any rate theoretically, as will be gathered by the description.

The flywheel carries a male cone, and its face is hollowed to a radius corresponding with the distance at which the driven cone is anchored by the forked bridge. The driven cone also forms the clutch, as it is recessed to fit the cone of the flywheel in a direct line, and it also carries a ring of friction material turned to suit the radius above mentioned. Instead of providing an infinite variation of speeds, it is better to give a large range of definite speeds. Thus in the Octo system eight definite forward speeds are provided for, and the driven member is withdrawn during the change.

The fact of the opposing surfaces being radial to a common centre prevents there being other than a rolling contact throughout the whole range of speeds, and, as proof of the absence of tearing friction, the driven member always remains cool. So soon as the position of the seventh speed has been reached, and it is desired to go still faster, the cone ceases to work at a different speed to the flywheel, because after withdrawal from frictional contact it is allowed to slide forward in direct engagement as a clutch.

This gear is fitted to the Carteret cyclecar.



Gear positions in the Octo system: (A) Cone above centre gives reverse. (B) Out of contact—neutral. (C) Seventh speed. (D) In top a clutch action is obtained, the drive thus being direct.

solved at least one of these problems, and we recently described a friction transmission system which gives a direct drive on low gear.

The Octo gearing, however, does exactly the

## THE NEW 10 H.P. CALCOTT ON THE ROAD.

A Pioneer Design  
Brought Up-to-date.

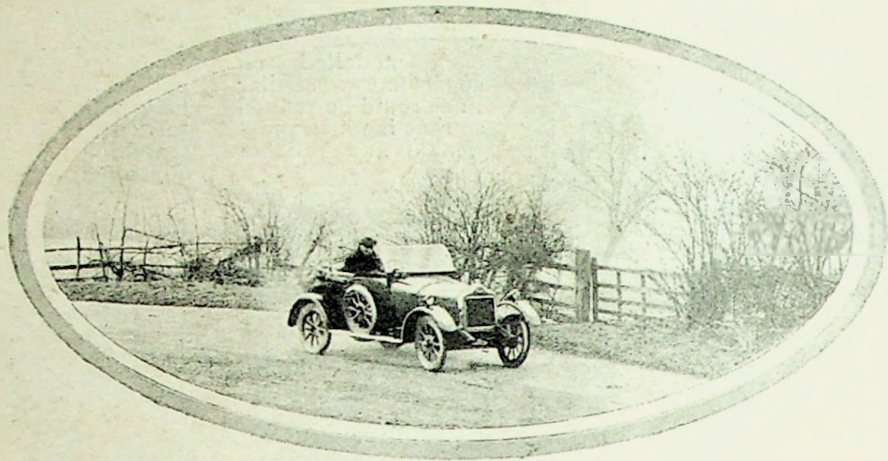
### IN BRIEF.

PRICE: £350. TAX: £11.

ENGINE: Four-cylinder, 65 mm. by 110 mm. (1,460 c.c.).

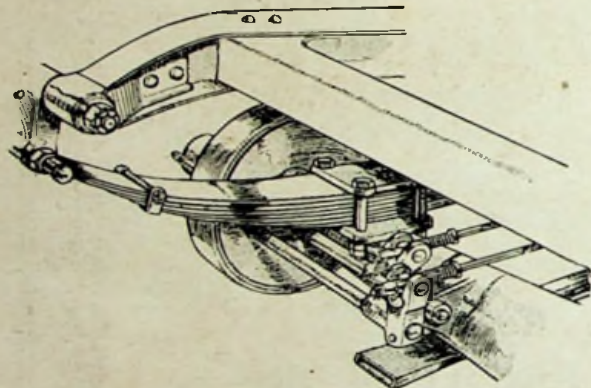
TRANSMISSION: Three speed and reverse gearbox, open propeller shaft, final spiral bevel drive.

Manufacturers:  
**CALCOTT BROS., LTD.,**  
Bridge Works, Gosford Street,  
Coventry.



At the summit of Sunrising Hill. A restart was made with ease on the steepest portion of the gradient.

**I**N the early days of the light car movement when 1,100 cubic centimetres represented the limit, the appearance of the light Calcott, with an engine of 1,456 c.c., created something of a sensation. In those days, the men responsible for the introduction of the



The rear springing is of the semi-elliptic type. The sketch also shows the accessibility of the brake adjusting wing nuts.

Calcott car considered that better results would be obtained by a rather larger but more lightly loaded type of engine. In this surmise they proved correct, for the light car limit was eventually raised to 1,500 c.c., and so the Calcott came to be within the fold instead of outside.

The 1922 model is generally similar to the pre-war type. In size and appearance it is essentially a light car. In ease of handling, lightness of steering and gear change, it compares favourably with other cars of the same type. Beside its 11.9 h.p. big brother it looks diminutive, but except in so far as its carrying capacity is concerned, its performance is not so far behind, whilst the difference in price is represented by £350 for the 10 h.p. as against £495 for the 11.9 h.p. two-seater.

### Features of the New Model.

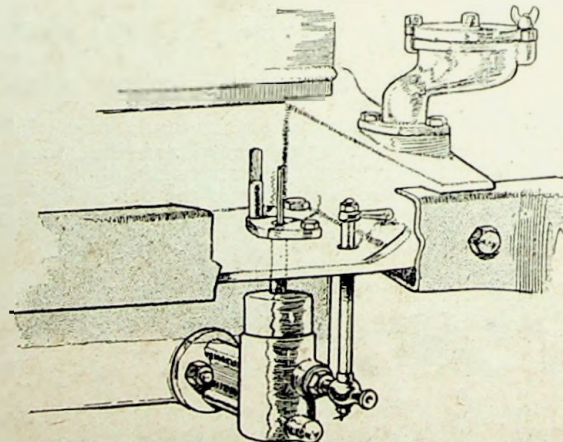
Alterations effected in the new model include a chain-driven timing gear, easily detachable oil pump, fabric universal joints, quickly adjustable brakes, more accessible oilers, improved bevel adjustment, larger flywheel and longer springs.

When starting away we took the usual precaution of seeing that the oil sump was full. The level is

indicated by a floating rod which registers with an upright fitted to the side of the crankcase. When the height of the rod and upright correspond, the sump is full, and should contain sufficient oil for 150-200 miles running at normal speeds. The oil is poured in through a vent in the rear near side engine bearer arm. The four gallon petrol tank, which is located in the dash with its filler cap protruding past the instrument board, was also inspected and found to be full.

### Silent and Smooth Running.

On the road one's first impression is the deceptive-ness of the speed of the car. At 30 miles an hour the engine runs silently and smoothly, and so gives one the effect of a much lower speed. The ignition advance lever is fitted on the steering wheel and the engine responds instantly to its manipulation. The maximum speed is about 40-44 m.p.h.. At this pace



The oil filter, level indicator, and quickly detachable oil pump are features of the power unit of the 1922 Calcott.

there is no fuss, and the balance of the engine is as good as when running slower.

The gear change is fool-proof, and although set well inside the shell of the body, does not seriously interfere with the driver's legs.

On known hills the car performed well up to the average on its top gear. The steepest gradient tackled was Sunrising Hill, which is situated between



*The Riviera*

SUNSHINE and gaiety, beautiful gardens 'midst terraces gleaming white, the fragrance of flowers and the shade of the sheltering palm, gaily dressed crowds, dreamy music, revel and laughter—a land of glamour and enchantment with nature at its best, an early herald of Spring in England, casting a spell over the wanderer, holding him captive to the call of nature. There, where the open air adds zest to life, the ROVER owner takes pride of place, confident in the knowledge that the ROVER adds comfort to pleasure, and reliability to leisure—care-free motoring under ideal conditions as at all times and seasons; quality, comfort, power and reliability, of these you are certain when you travel with the ROVER.

The 8 h.p.

**ROVER**

*"The Car that set the fashion to the World"*

**£220**

Fully equipped and ready for the road.

De Luxe Model, with choice of colour, Side Curtains, Speedometer, Clock, etc., £245.

Over 5,000 are on the road to-day, and a visit to any of our Agents, who will arrange a trial rug, will convince you that the 8 h.p. ROVER is worthily upholding the ROVER reputation.

*Full particulars may be obtained from our authorised dealers throughout the country and from*

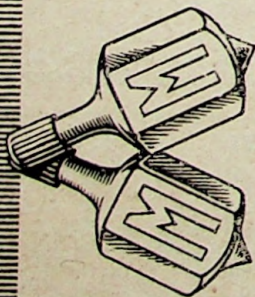
**THE ROVER COMPANY, LTD., METEOR WORKS, COVENTRY.**  
59a, New Oxford Street, London, and Lord Edward Street, Dublin.



**TO THE  
READER**

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.

# Put



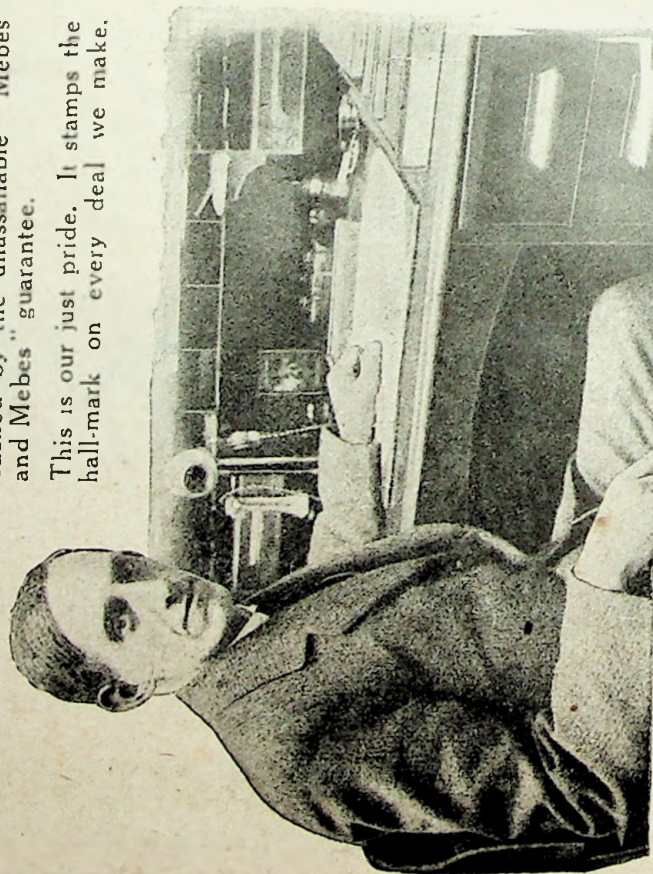
down the first instalment sum of any of the following well-known makes of Light Cars:—

- AUTOCRAT
- CROUCH
- CLULEY
- LAGONDA
- MARLBOROUGH
- RHODE
- T.B.
- WOLSELEY

### QUALITY IN STOCKS.

Every make of car supplied by us is backed by the unassailable "Mebes and Mebes" guarantee.

This is our just pride. It stamps the hall-mark on every deal we make.



# and Take

away a first grade light car equipped completely for immediate road service.

Use the car and the open road to enjoy the glories of the beautiful English countryside, awakening under the magic wand of Spring to all its inimitable beauties.

The invigorating health-restoring air, the bloom on greensward and tree, the joyous paeans of all nature—in all these may you revel and learn to love living, by making use of the Mebes & Mebes instalment system of Car purchase.

## Mebes & Mebes

*The Original Light Car Specialists,*

144, Great Portland St., W.1.

Established 1893.

Phone—Langham 2230.

*CALCOTT ON THE ROAD (contd.).*

Banbury and Stratford-on-Avon. A stop half way up the hill for a photograph was followed by a restart on the gradient. The get-away was smooth and certain, the car treating the final stretch of 1 in 6 in a manner that almost called for second gear.

As the chassis was brand new, it was found necessary to adjust the brakes during the run. This was a simple matter, as the rear ends of the operating rods are fitted with winged nuts which can easily be reached from the back of the car. Both foot and hand brake control rods were screwed up a few turns and the car was then rocked backwards and forwards by holding the rear ends of the side members of the frame to ensure that there was no binding.

The car is fitted with a magdyno outfit and no starter. When the carburetter was flooded the engine started easily, and could be throttled down by means of a lever on the steering wheel. The lighting was quite good and the dimming switch was found of value.

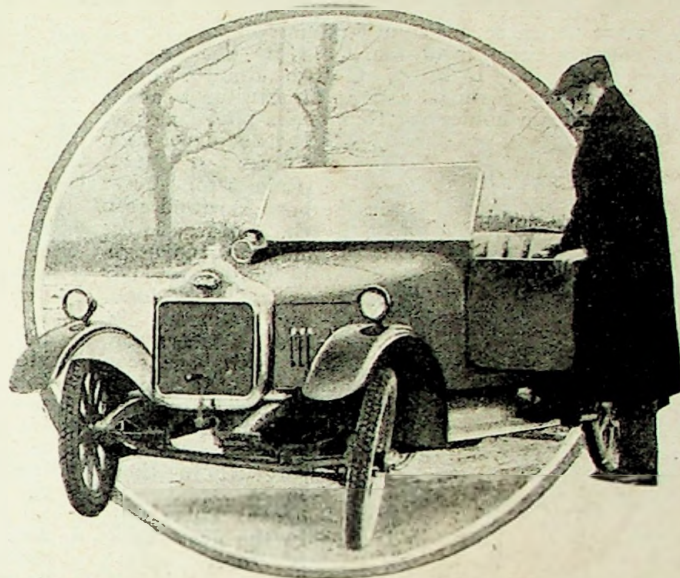
As regards the body there is rather more room than is found on many light cars, and a long-legged driver is not cramped. The rear compartment is capacious and could contain a large-sized suitcase.

**Ample Body Space.**

The car is capable of a comfortable 24 miles per hour average, its top gear being such as to allow it to climb hills of about 1 in 18 or 1 in 20. Second is low enough to climb 1 in 8, so that unless one is driving in really heavy country first speed is only required for starting purposes.

Altogether, the small Calcott is a comfortable and fairly roomy little vehicle for two, built more for hard wear than speed, and possessing all the qualities which made its predecessors of pre-war days so popular. Even a most cursory examination of the car shows that attention to detail must have been constantly in the minds of the designers, and a reference to the two line drawings which accompany this article demonstrates the point.

Mention has already been made of the ease with which access can be gained to the rear brake adjustments, whilst the sketch shows in a very plain manner that it is possible to combine accessibility with simplicity. In the drawing of the oil filter, level indicator, and quickly detachable oil pump, it will be observed that a plate cast integral with the bearer arms of the engine forms a neat tray through which the



Ample leg-room is provided for a tall driver. The photograph shows that, outwardly, the Calcott is little changed.

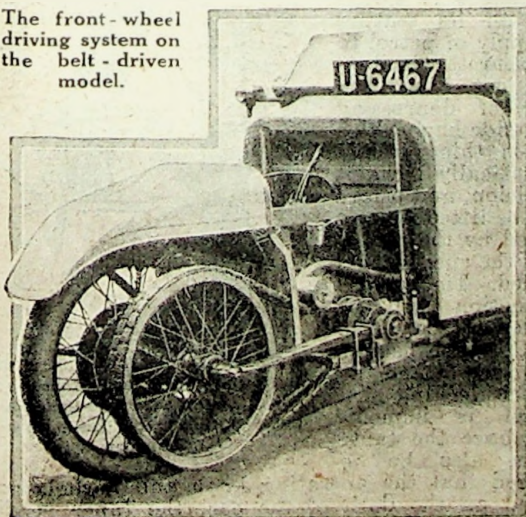
essential parts of the oiling system protrude, all of which tend to give the engine an exceedingly clean appearance and render the checking of the oil level easy.

The tyres are of ample section, and the body well protected by domed wings of adequate proportions.

**NEW FRONT-WHEEL-DRIVEN CYCLECAR.**

THE three-wheeled front-driven Stanhope cyclecar is familiar to our readers, and it is interesting to note that this now emerges in a new form and

The front-wheel driving system on the belt-driven model.



Lane Road, Lower Wortley, Leeds, having taken over all the assets and patent rights of the Stanhope Motor Co.

The essential difference between the two new models is that No. 1 is driven by means of belt, which incorporates a hand-operated variable gear, whilst No. 2 is driven by chain from a three-speed-and-reverse gearbox, and is slightly better finished. A third model, which will shortly be placed on the market, is of the sports type, whilst of interest to commercial users will be a light delivery van capable of carrying a load up to 5 cwt., which is also promised.

Dealing with the models in detail, the essential differences are, as outlined above—in the method of transmission, an 8 h.p. J.A.P. engine with side-by-side valves, a single-plate clutch, M.L. magneto, quarter-elliptic springing at the front, cantilever at the rear, wire wheels, and a kick-starter being common to both.

In the case of model No. 1, however, in which the drive is by belt, a B. and B. carburetter will be fitted, the price being £165, whilst in model No. 2 the drive will be by duplex chain, with patented design of front wheel, and the carburetter will be a Cox-Atmos or Solex. This model will sell for, approximately, £195. In both cases the price quoted includes a two-seater body, complete with wind-screen, hood, lamps, horn, and a very useful kit of tools, etc.

that the car will in future be known as the Bramham—Bramham Motors (Leeds), Greenside Works, Dixon

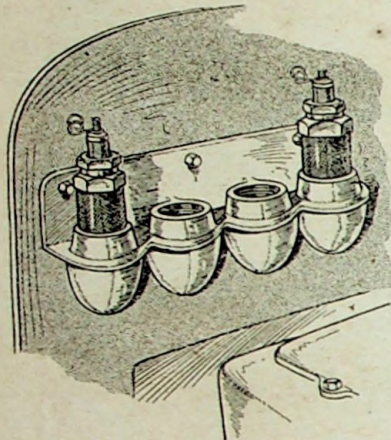
SPICE OF ::  
:: NOVELTY.



Some of the Latest . . . .  
Inventions and Accessories.

**A Handy Plug Holder.**

A device which serves two very useful purposes is being manufactured and marketed by the Gulson Engineering Co., Ltd., of Gulson Road Works, Coventry, in the form of a neat aluminium bracket which provides a holder for four spare plugs, and at the same time



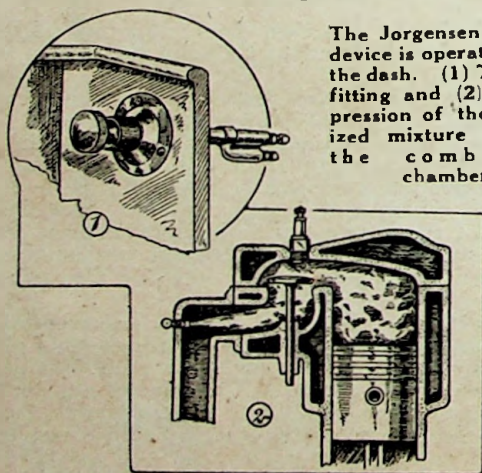
The plug holder shown in position on the dash beneath the bonnet. It also forms a plug cleaner.

enables used plugs which have been screwed into the holder to be cleaned thoroughly whilst the car is on the road. By referring to the illustration, it will be seen that the plugs have separate receptacles, so that when each one is screwed in there is a space beneath. This space, in the first place, is filled with petrol, which, when the car is in motion, constantly is swirled round

and thrown up into the inside of the plug, thus forming an admirable automatic cleaner. The manufacturers will supply agents or the public direct, the retail price of the holder being 3s. 6d.

**A Dash Primer.**

It is not a difficult matter to inject petrol through the compression taps when fitted, but it is much more convenient to be able to introduce a vaporized mixture into the induction pipe through the agency



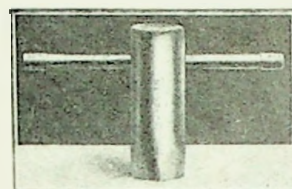
The Jorgensen priming device is operated from the dash. (1) The dash fitting and (2) an impression of the vaporized mixture entering the combustion chamber.

of a pump on the dash. The Jorgensen vapour primer is such a fitting, and one stroke of the pump will inject a sufficient volume of vaporized gas to enable the engine to be started up in the coldest weather. The supply of spirit is taken from the vacuum tank or the petrol tank, as the case may be. The device is easily fitted, it being necessary only to secure the pump to the dash in any position convenient to the driver, and to drill and tap a hole in the induction

pipe, as indicated in the accompanying sketch, to take a small elbow and T-piece. The connection to the petrol supply is made in any suitable manner. The distributing agent for this device is M. Houdiet, 4, Thurloe Place, London, S.W.

**A Well-finished Plug Spanner.**

There is, perhaps, no more useful tool than a really substantial box spanner for removing sparking plugs. The Runbaken Magneto Co., Ltd., Cheetwood Lane, Derby Street, Manchester, have just introduced such

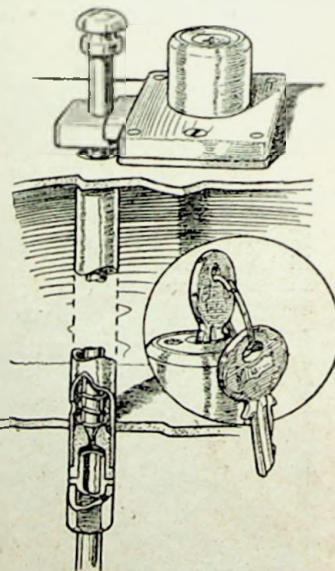


A most useful tool—the Runbaken sparking plug spanner.

a one, in which the tommy bar is a permanent fitting. This tool is exceptionally well finished, and should provide sufficient leverage to remove the most obstinate of plugs. As the tommy bar is always *in situ*, one does not have to make fruitless searches through the tool kit for an elusive length of steel rod. All inquiries respecting the Runbaken sparking plug spanner should be addressed as above. It is made in sizes to suit British, Continental, and American plugs.

**New Petrol Lock.**

As a method of preventing the theft of a car, the petrol lock still has many adherents, and in this connection an interesting device is being placed on the market by Brierley's (Premier Welding Co.), Ltd., 140, Manor Street, Clapham, S.W. 4. It is constructed in such a way that it can be fitted direct into the tank, and takes the form of a plunger rod the extremity of which is tapered, so that when the plunger is thrust down on its seating the supply of petrol to the carburetter is absolutely cut off. The action of depressing the outside knob which controls this plunger automatically locks it in position, and before it can be lifted it must be freed by the use of one of the special keys provided. The general construction will be gathered from the sketch, which shows the device fitted so that the locking mechanism is immediately above the tank.



The construction and fitting of the apparatus. The waterproof metal cover over the lock has been omitted for the sake of clearness.

It can also be so arranged that the operating knob and keyhole are situated on the dash of the car, the taper needle forming the valve being pushed up or down through a bell crank lever arranged in the tank. The price of this petrol lock is one guinea.



## The "WOLSELEY" TEN TWO-SEATER COUPE

THE Wolseley Ten Two-seater Coupé, illustrated above, has been specially designed to meet the need for a small car of the all-the-year-round type. The coachwork is graceful and distinctive, and is luxuriously upholstered and beautifully finished. The fixed head is light in construction and will retain its original smartness after long use.

For winter driving no more cosy and comfortable two-seater could be desired; whilst in summer the adjustable front glass and the sliding door lights give ample ventilation. The equipment includes electric starting and lighting, and every really necessary accessory is included in the specification.

**Price £595**

Write us for Catalogue No. 5, post free.  
Or ask us to arrange a trial run.  
Early delivery can be given. :: :: ::

**WOLSELEY MOTORS, LTD.**  
(Proprietors: Vickers Limited),  
Adderley Park, BIRMINGHAM.

London Showrooms:  
**WOLSELEY HOUSE,**  
157-160, Piccadilly, W.  
Indian Depot: Sst. dhurst Bridge Road,  
Chaupatty, Bombay.

**TO THE  
READER**

*By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.*

**B41**

When ordering tubes,  
specify

# DUNLOP

**M**OST tyre users give careful consideration to the choice of their outer covers, entirely overlooking the importance of the inner tubes.

To ensure maximum mileage with minimum trouble you should specify when ordering—

**“DUNLOP COVERS and DUNLOP TUBES”**

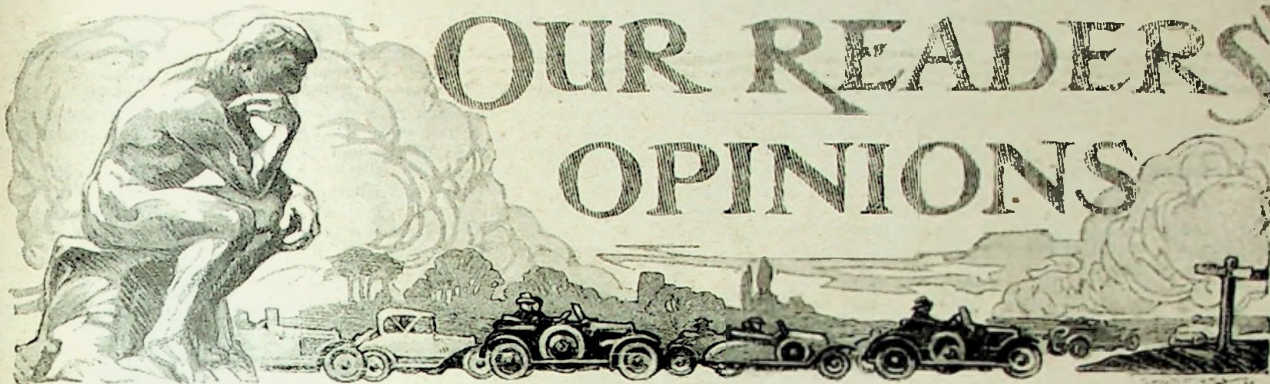
**DUNLOP MOTOR TYRES**  
obtainable from all motor dealers.



At any hotel appointed by the R.A.C., the A.A., the A.C.U., the Scottish or the Irish A.C., ask the manager to show you

**THE  
DUNLOP BOOK**

You can order it from any bookseller or from any motor or cycle dealer for a guinea. “The maps alone are worth double the price.”—*Vide Press.*



We welcome at all times letters sent us by readers for publication in these columns, and while taking no responsibility for the opinions expressed therein, give preference to those letters which deal with subjects of general interest. No anonymous communications will be accepted, but the writer may use a nom-de-plume if desired. Letters should be as brief as possible.

### IS "TURBULENCE" A MYTH ?

Your contributor, writing in your issue of January 28th, on turbulence, certainly puts forward some very pretty hypotheses, but, unfortunately for the poor engine designer, who is always struggling to get more

**An Interesting power with smaller cylinder capacity.**  
**Analysis.** things do not always pan out in practice as well as they do on paper.

To begin with, no designer to-day would increase the unswept volume of the cylinder, whether by so doing he could get "turbulence" or any other effect. He knows only too well that it would mean a far greater loss than gain, for obvious reasons.

A maximum charge of fresh gas would not be drawn in, nor could the maximum amount of burnt gases be expelled. Further than this, the rapidity of explosion of a correct petrol and air mixture is such that the piston has yet to be made which could travel away from the effects of such an explosion. The speed of the gases in and out of the valve ports on the fastest revving engine is dead slow compared with it.

It is further to be noted that the explosion is timed to occur only at or near the end of the compression stroke, during the greater part of which the valves are closed, and therefore no flow, as such, takes place whatever, because there is simply nowhere to which the gas can flow, until a valve is timed to open, some time after the explosion has taken place. It is during this period that the useful work is done.

It is obvious that whatever swirling there is must take

place either before or after the compression and firing stroke; hence it does not affect the rapidity of the explosion, except that it tends to improve the explosive mixture. This, combined with cylinder heads and valve ports, designed to give the best flow in and out, of the gases, seems to be a very feasible explanation of what at present is only guessed at, when all is said and done.

The speeds and effects we are studying are too rapid in their action to permit of observation by ordinary methods, so that a good deal has to be left to inference.

Now, with regard to "turbulent" cylinder heads, let us take, for instance, the flat type of cylinder head. One of the most efficient motorcycle engines ever made—the Norton—has a practically flat top and side-by-side valves, and yet probably this cylinder has developed more power for its size than any other single-cylinder yet made.

Even if by "turbulence" more rapid explosion takes place this does not necessarily mean a better engine. Nine cars out of ten pull better, and do more miles per gallon on benzole—a comparatively speaking slower burning mixture altogether, but a fuel which, in burning more slowly, also exerts a greater pressure during a longer period of piston movement. This gives greater flexibility, and a nearer approach to our ideal, the steam-engine, which is still far away in front of any petrol-engine yet designed in giving power output for bore and stroke, although sadly lacking in other respects when applied to motorcars.

Coventry.

WILLIAM A. WEAVER

### THE DIFFERENTIAL—IS IT NECESSARY ?

Replying to "Simplicitas's" query re experiences of punctures on a differentialless car, I have had some half-dozen or more, pin pricks and bursts, generally when travelling at well over 40. My first was a slow one; know-

**Interesting Experience.** ledge that something was wrong was a long time in coming. At first a fancy that the camber of the road was increasing, and I had to "hold her up."

Slowing up after several miles to look at the steering, I promptly discovered that my rear tyre was flat. Except for the puncture, the tyre and tube were perfect. The next was also a slow one, my speed near 50 m.p.h.

A slight tendency for the car to pull over to the right, and I promptly slowed up. Looking over the side of the car, my guess that the off rear tyre was going down proved correct. Doing about 40 on one occasion in the Welsh two days' trial, I had a burst, and can honestly say that there was absolutely no swerving or loss of control in the steering. At the present time, after a particularly vile road, I often take my hands off the wheel for a second. If the car runs straight, I know that the tyres are right; if she runs to one side, I know that one of the tyres is going down. The results are just the same on wet or dry roads, although I should imagine that on your greasy London cobbles, the pull would be more pronounced and require more skill to correct.

With regard to two jacks, I may say that, with a light car, the usual jack is hardly necessary. Two pieces of stout board cut in a triangle and put under the back axle will, with a push, lift both wheels clear of the ground. I admit pushing this car about a garage on full lock is very hard, but my car registers so few yards in this way that I do not worry much about it. As regards tyre wear, I certainly found that habitually taking corners under power at speed did increase wear. However, I now take the clutch out and "roll round," so that my present back tyres look almost new, with nearly 4,000 miles to their credit.

In conclusion, I may say that many racing and large car owner friends who have tried my "bus" all make the same remark. They never noticed the absence of a differential and felt a sense of security in taking corners, particularly if going fast. "She seems to hug the road," they say. My car is a touring model G.N. No complaints and usual disclaimer.

NOEL C. HARBUTT.

**Address Wanted.**

Will "F.P." (S. Norwood) kindly state where one can purchase the straight-rib pattern air cushions suitable for a G.N.? I can strongly recommend the M.P. shock absorbers for the front wheels.

E. F. BLOODWORTH.

Eltham.

## SHOULD CYCLECARS HAVE DIFFERENTIALS?

I have been much interested in the controversy now waging in *The Light Car and Cyclecar* with regard to cars with or without differentials. I have personally driven cars of various makes, chiefly very powerful ones, since

**Solid  
Axle  
Preferred.**

1902 until 12 months ago, and my first experience with a light car was on the one that I own now. It has no differential.

I may say that when I first took possession of this car I drove it with some misgiving on hearing, after I had purchased it, that it was not fitted with a differential; but as a result of my experience with this car (which is a Warren Lambert sports model), extending to some 12,000 miles of driving, I fail to see that there is any use whatsoever for a differential.

I find that the car holds the road well, whether dry or wet, at all speeds, and no difficulty is felt in turning corners; in fact, the only difficulty is—if it can so be called—the slight extra trouble to push the car in a garage. As, however, it only weighs about 10 cwt., and is invariably driven in and out and seldom pushed, this criticism does not cut much ice.

I notice that your contributor to "Rich Mixture" refers to costly punctures, suggesting that every time a puncture occurs in the rear tube it gets scrapped. My experience, however, is that the puncture of a tyre is precisely the same as on any other car I have owned, and my wheels are not even fitted with bolt valves. On one occasion that I remember I drove from Hammer-smith to Hyde Park Corner on a flat rear tyre at a speed varying from 25 to 30 miles per hour on a very greasy surface, and, after rectifying the faulty valve, proceeded on my way on the same tyre and tube. The only indication of a flat tyre, whether front or rear, is a slight pull on the steering.

As for the "prominent designer of cycle-cars" who is reputed to have stated that the differentialless car with a puncture makes a bee-line for the nearest hedge, the only comment I can make is that he should take a "little more water with it." If this were so, how is it that so many thousands of people risk their lives in driving such cars which are not fitted with differentials? The urged drawback of not being able to turn the rear wheel round when it is jacked up is more apparent than real, as this only becomes necessary in changing tyres or cleaning, and in both cases I find it more simple to detach the wheel.

In conclusion, I am a convert to the "No Diff." car, in spite of the fact that I am of the old school and was very prejudiced in favour of low-speed engines, heavy gearboxes and chain drive.

L. W. PULLMAN.

Golders Green.

### Lucid Arguments by a Manufacturer.

I have read with interest the letters appearing in your columns with reference to the above, and was particularly interested in those appearing in your issue of February 18th.

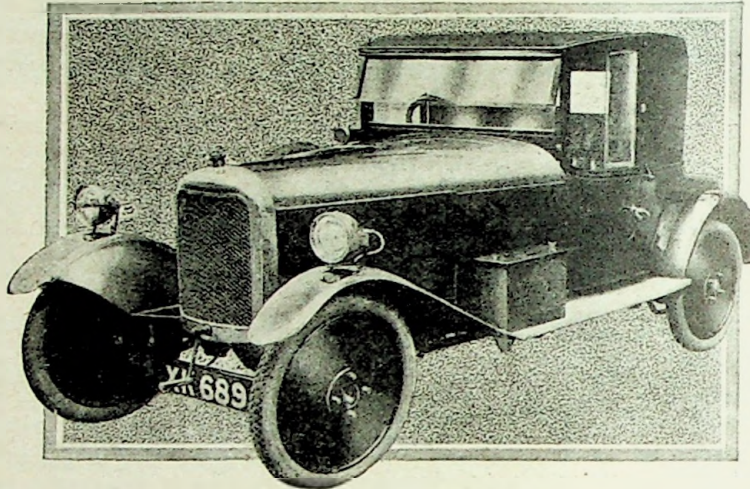
It is a remarkable fact that this discussion so far has brought forth all

**Factors Affecting Tyre Wear.** moderate and well-reasoned opinions, whereas most discussions in the Press produce rather wild statements which are not borne out by facts. One or two points, however, appear to have been overlooked, and I make this my excuse for entering the fray. The fact is that no hard-and-fast rule can be laid down. For example, on a heavy limousine type of car, which is to be driven slowly, there is no doubt that a differential is advisable, although it could be dispensed with, and I believe I am correct in stating that Mr. Morris, of the Palmer Tyre Co., had a six-cylinder Excelsior for some years which was not fitted with a differential. Tyre wear was quite light, and the car did not behave objectionably in a general way.

To get the best results, however, it is necessary that the car be correctly proportioned and designed for the work that it is intended to do. The weight should be between the wheels, and properly distributed: the proportion of wheel-base to track is, of course, also a very important factor. On the G.N. these points have been very carefully thought out, and it is gratifying to note that one of your correspondents,

who signs himself "Experientia Docet," has compared two cars, neither of which is fitted with a differential. One of these was a G.N., and on this car he found no defects at all attendant on the lack of a differential: he also obtained over 7,000 miles on a pair of back tyres, and they were then only just showing signs of the canvas.

On the other car, of a different make, he has found certain difficulties in control, which, he suggests, may be due to the grip of the tyres. I think it more probable, however, that the better behaviour of the other is due to the weight distribution and steering layout, as we have not found that



THE FIRST  
OIL-COOLED  
TWO-SEATER  
COUPE.

The fine performance of the Belsize Bradshaw chassis, which is equipped with a twin-cylinder oil-cooled engine, has prompted its sponsors to standardize a range of enclosed bodies. The first coupe model recently delivered to Gordon-Watney, Ltd., Brook St., London, W.

different types of tyre affected the control to any great extent.

Another of your correspondents states that the differential is omitted solely on account of expense: this is not so. A differential is not a very expensive item in itself, but it involves an added complication and increased unsprung weight, and is a distinct disadvantage on pot-holes or when ascending steep hills with loose surfaces. The saving in tyre wear obtained by better adhesion, lighter unsprung weight and lack of "single wheel spin" on potholes or loose surfaces more than compensates for the slight amount of tyre wear caused through drag when cornering.

If anyone has doubt on these points he has only to ask for opinions of G.N. users who have run their cars over long distances, and I think he will find that they are unanimous on this point.

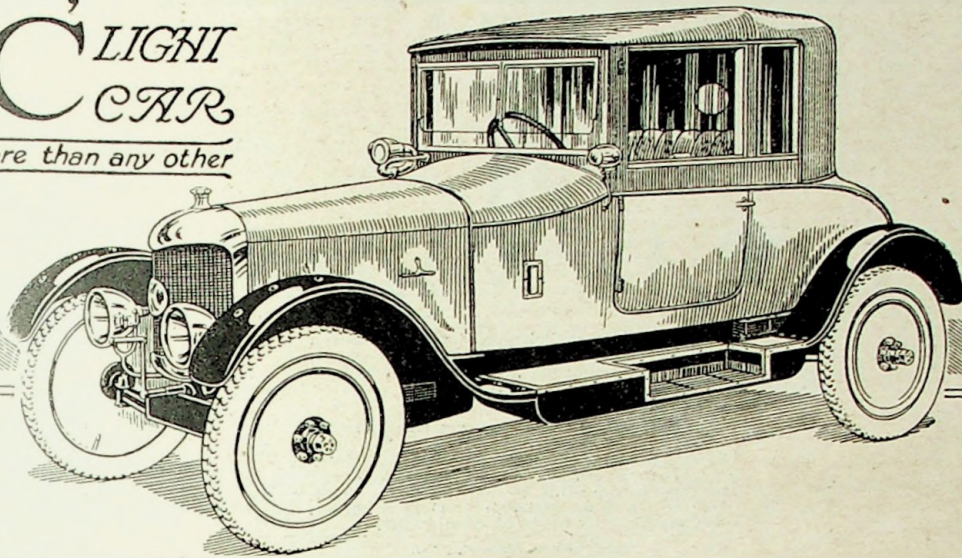
There is one other matter on which several of your correspondents appear to be in error, and this is the question of tyre creep when driving with a deflated tyre on one wheel only of a "diffless" back axle. As a matter of fact, there is less tendency for the deflated tyre to creep when there is no differential than when one is fitted, the reason being this: With a differential the drive tends to pull the rim round inside, so that there is a certain amount of creep or slip between the cover and the rim, and if there is nothing to prevent it, this will cause the cover to creep round and pull the valve out of the tube. Without a differential, however, unless the car is being driven sufficiently hard to obtain wheel spin with the sound tyre, there is much less tendency for this creep to take place, as, owing to the reduced diameter caused by the deflated tyre, the rim is constrained by the other wheel to move a fewer number of turns than it would do if left free, and very little, or none, of the drive is taken through the deflated tyre.

These two factors in practice balance out in a remarkable degree, so much so that when driving with a deflated tyre it is necessary to drive quite hard before any serious creep takes place, although there is, of course, a drag on the steering which in itself is a useful warning that the tyre is deflated.

East Hill, Wandsworth.

A. FRAZER NASH.

The **A-C** LIGHT  
**CAR**  
 Worth more than any other



**The Amazing 'A-C'**  
**"Speedy. Reliable and Good Looking."**

In the three essentials—Reliability, Speed and Appearance, the "Amazing 'A-C'" is unequalled in the light car world. Read this testimonial:—

Highworth,  
 Shelford Road,  
 Shelford, Cambs.  
 Jan. 23rd, 1922.  
 Messrs. Auto-Carriers, Ltd.

Dear Sirs,  
 Thank you for your letter. I congratulate you on the numerous successes of the 'A-C' Car, although it is quite easy to believe by one who owns one. A more speedy, reliable, good-looking light car would be hard to find.

Yours truly,  
 (Signed) Augustus Berry.

<sup>3</sup>/<sub>4</sub> Coupe  
**£675**

*Fully Equipped.*

All buyers of new 'A-C' cars should insist on receiving the Company's printed Guarantee which will only be supplied for cars purchased through us or our authorised agents.

Full range of models always on view, which the public and trade are invited to inspect.

**Prices from £495**

The Amazing 'A-C' holds more Official Records than all other light cars combined.

**AUTO-CARRIERS, LTD.,**

288, Regent Street, Oxford Circus, W.1.

'Phone: Langham 1403.

Works: Thames Ditton, England.

The address of the agent in your district sent on request.

**TO THE  
 READER**

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.



## GOLD MEDAL

IN the Essex Motor Club's one-day tester trial run on February 18th, over a 100 mile special course, the G.N. was first, and gained a gold medal, in

### CLASS 10

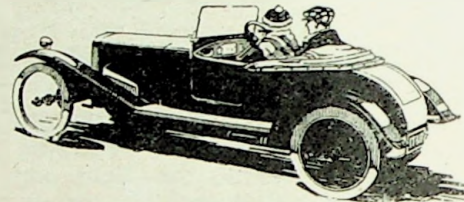
beating a number of well-known cars, many of bigger capacity.

The tests, in addition to reliability, included re-starting and accelerating on a hill, and easy starting from cold. There was only one G.N. entered, the Légère model, which sells with a luxurious equipment at £240. Other models, fully equipped, from £225.

*Send for new illustrated list.*

**G.N. MOTORS, LTD,**  
EAST HILL, WANDSWORTH, S.W.18

Showrooms at  
222, Great Portland St.,  
London, W.1.  
Telephone - - Museum 2271.



H. G. WOOD



*"Best Possible"*

MOTOR

**BP**

SPIRIT

**British Petroleum Co. Ltd.**

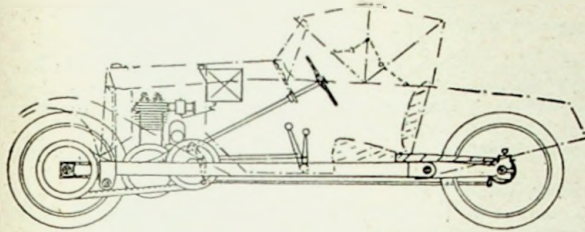
22, FENCHURCH ST, LONDON E.C.3

OUR READERS' OPINIONS (contd.).

Simplicity of Front-wheel Drive.

I was glad to see a revival of belt drive advocated in your journal. Belt drive is used successfully in engineering factories for driving machine tools, but the belts transmitting large powers are always run very slack over large pulleys, with the driving run on the bottom. This gives, roughly, 50 per cent. more surface in contact and prevents slipping. I have not heard of this principle being applied to cyclecars.

Admittedly, it would be difficult on a rear-wheel-driven machine, but on a front-wheel-driven three-wheeler, with rear



The layout of a simple car with front-wheel drive.

wheel steering, as suggested by you, it would be a very simple layout.

I enclose a rough sketch showing a simple cyclecar conforming with the following specification:—(1) Single belt drive near to centre of solid front axle. (2) Single-cylinder engine (all who are familiar with the Norton "Big Four" and similar engines realize their possibilities). (3) "Split quarter-elliptic" front springing—to take torque and drive. (4) Perambulator hood—neat and easy to manipulate for access. Criticisms would be welcomed.

NORMAN FORSTER.

Newcastle-upon-Tyne.

The Cause of Tail-wag.

With reference to "F.C.'s" letter in your issue of February 11th, the safe maximum load of a Stepney Road-grip 700 mm. by 80 mm., at 60 lb., would be about 4½ cwt., although, of course, a lighter load would be more advisable.

I think you will find that the Stepney Co. give the same details. I run them on my G.N. at 55 lb. on the rear and 40 lb. on the front, and they are comfortable at this pressure, holding the road excellently. The unladen weight would be about 2½ cwt. back wheel and 1½ cwt. front.

I should imagine that the tail-wag might be due to too great a flexibility or slight lateral play in the rear springing. I found that binding the front springs with fine cord greatly improved the springing and prevented rebound. This might be useful in "F.C.'s" case.

Referring to "R.A.H.'s" letter in the same issue: My 90 degree G.N. will start with the greatest ease, even during the recent frosty weather, sometimes after lying idle for a fortnight or more. As I have an artificial leg, this point is very important to me. It is a 1920 model and I have experimented a little, with good results.

Essex.

R.J.L.

The Light Car in the Tropics.

I have been very interested in references to the 7.9 h.p. Swift which have appeared in your journal from time to time, and would ask why, when home makers get a good model, do they not stick to it?

I bought my Swift in June, 1914, and it might interest you to know how it has stood up to real tropical work, especially as it has no fan fitted to the engine.

I live at an elevation of 6,200 ft., and, as my work constantly takes me to sea level, the little car has had to climb every pass in Ceylon scores of times.

It has now run about 45,000 miles, and I have not had to make one single renewal in the engine. The original piston rings, valves, etc., are all still absolutely perfect, and compression and pulling power are better now than when it left the Coventry works.

I have had to renew the radiator (damaged by charging a cow), the second gear cog, and the cones of the front wheels. Apart from punctures, I can only remember two road stops—due in both cases to the cones of the front wheels.

Ceylon.

PHILIP FOWLE.

The "Oversize Tyres" Controversy.

As one who has run a G.N. fully 12,000 miles during the last 13 months, I am interested in the recent correspondence concerning oversize tyres. I have driven my car in all weathers, over roads good, bad and in-

different, for business purposes, and my experience is as follows:—

Essential for Scottish Roads. With 650 mm. by 65 mm. size tyres I have had no luck at all, those on the car when new all showing the canvas before 4,000 miles' running. I tried two of another make on the back wheels, and they turned out much worse than the originals, one of them bursting at 1,300 miles. In desperation, I fitted two Dunlop Magnums, 700 mm. by 80 mm., to the back wheels, usually pumped up to 60 lb. pressure. One of these has done 6,000 and the other 5,400 miles, and both are still going strong. I find that the car rides better on the road with the larger tyres, and I intend to have all four wheels fitted with same make. My opinion is that for Scottish roads, if not for English, the G.N. is undertyred when fitted with 650 mm. by 65 mm. covers.

Glasgow.

C. N. T. PHILIPS.

Courtesy on the Road.

It is with great pleasure that I read your journal week by week, and appreciate your efforts to do all you can to make motoring possible to the many. I feel you would greatly

promote this object if you did all in your power to impress on those using a car that they are not the only motorists on the road.

So many seem to lack the gift of imagination. My chief object in writing this letter is to try to make motorists more careful at cross-roads.

There are many cross-roads in Windsor, and one has only to stand at one of them for a short time to see the reckless way cars rush across these roads. Often such cars make a great noise, as much as to say, "Clear the way; I am coming." Unfortunately (as frequently happens in Windsor), another such character does the same coming from the cross direction, and they meet.

Much of the joy of motoring is being spoilt, and many abstain because some (call them hogs) will be selfish and thoughtless.

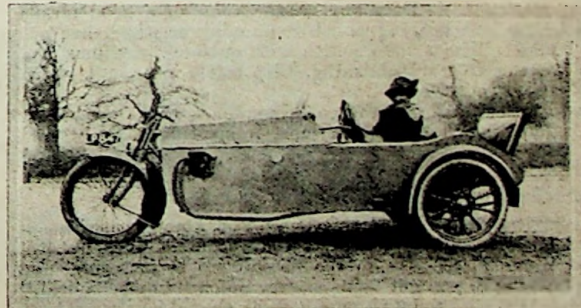
Windsor.

HORACE F. HOARE.

An Unconventional Three-wheeler.

Being a regular reader of your paper, I often read articles about the cheap, economical and reliable cyclecar. For two years I have been experimenting with a three-wheeler cyclecar, which is now ready for production.

65 m.p.g. and It consists of T-section chassis and body 45 m.p.h. combined, Chater Lea heavy spring fork, 5.7 h.p. Coventry-Victor engine, two or three speeds, and Chater Lea worm-driven back axle, with interchangeable Sankey wheels. The steering is direct, seat



An unconventional three-wheeler. This car has been built and run with success by one of our readers, Mr. G. Baets.

starting, hood and screen, seating for two, and dickey seat for two children (about 10 years), electric light and spare wheel. Price, £150.

The accompanying photograph is of my experimental model, with which I have covered about 2,000 miles, the petrol consumption being 65 m.p.g., and the maximum speed 45 m.p.h. It is very easy and pleasant to drive, well sprung, and steady on greasy roads. It is known as the G.B. three-wheeler. I am willing to give any of your readers a trial run.

6, Wilton Mews,

South Belgravia, S.W.1.

G. BAETS.

## THE REVOLUTIONARY SUPER-FEEDING ENGINE.

Having read the article titled as above in your issue of February 18th, giving the first details of the Roberts five-stroke system, we should like to submit some comments on the subject, as follow:—

### Interesting Technical Criticisms.

When discussing the question of "higher effective compressions," your contributor agrees that the compression (pressure) is "already quite as high as desirable in modern engines," but in the next paragraph he proposes to "secure the admission of, say, double the charge." Although it is not clearly stated, this would seem to imply that the increase in weight of charge is to be effected by increasing the clearance-volume in a given size of engine, so that the final compression pressure is unaltered.

Assuming that this is so, and allowing that the power output for a given weight of engine would be increased, we are forced at the same time also to conclude that the heat-efficiency of the engine would be seriously decreased.

We arrive at this conclusion by the following means:—If  $v$  is the clearance-volume, and  $V$  the piston displacement-volume, then the volumetric compression-ratio is  $\frac{v+V}{v}$  or

$1 + \frac{V}{v}$ . But if the clearance-volume  $v$  be increased so as to accommodate a heavier charge with the same final compression-pressure, then clearly the ratio  $1 + \frac{V}{v}$  decreases.

In other words, the ratio of volumetric compression decreases.

Now, the volumetric ratio is— for gases—always less than the pressure ratio, so that if the former is 4 the latter will be about 6.5. For example, supposing that with a normal

engine design the compression pressure-ratio is  $97.5/15 = 6.5$  times, then if the charge is forced into the cylinder at twice the pressure (i.e., 30 lb. abs.), the pressure ratio will be halved (3.25), and the clearance volume  $v$  will have to be increased to about 2.27 times to give the same final compression pressure (97.5 lb. abs.) as before. The weight of charge will therefore be increased 2.27 times.

We have to bear in mind that if the compression pressure-ratio be halved, so also will be the expansion pressure-ratio. As a matter of fact, the work done per lb. of charge is approximately proportional to the logarithm of the expansion ratio, so that the ratio of power output in the two cases under consideration—without and with super-feeding—will

$$\text{be approximately } \frac{1 \times \log. 6.5}{2.27 \times \log. 3.25} = \frac{1}{1.43}$$

Consequently, we have increased the power output 1.43 times, at the expense of 2.27 times the fuel. The ultimate result we arrive at is that the decrease in efficiency will therefore

$$\text{be approximately } \frac{1-1.43}{2.27}, \text{ or } 37 \text{ per cent. of the former efficiency value.}$$

In conclusion, it might be as well to draw attention to the fact that in certain aeroplanes (such as fast-climbing scouts) and in certain racing motorcars (where maximum speed only is aimed at), fuel consumption is of secondary importance compared with the power-weight ratio. Also, in the case of aircraft, there is the additional circumstance of greatly varying atmospheric pressure at different altitudes, upon which the weight of charge that can be drawn in (with the ordinary design) depends. Obviously, however, these circumstances do not require to be taken into consideration when dealing, as in the present instance, with ordinary motorcar practice. J. MORSE SCOTT, Autocraft Board.

### Regarding Cyclists' Rear Lights.

We have been requested by a reader to publish the following request:—"Will the driver of the 8 h.p. air-cooled Rover car who ran down a cyclist in Foxley Lane, Purley, at or about 6 p.m. on Friday evening, January 27th, kindly communicate with T., 118, Foxley Lane, Purley?"

### Lubricating the A.B.C.

I wonder if any reader could suggest a really simple method of ensuring a constant supply of heavy oil or graphite grease to the rocker arms of my A.B.C.? The arms have four screw-down greasers, and the constant refilling,

although very simple in itself, is a messy and time-wasting operation.

Does any reader know of a good means of polishing and keeping polished aluminium which has not been buffed? The more I polish with ordinary mediums, the more it seems to want polishing. Up to the present I find a petrol-soaked rag the best.

May I add that I find the correspondence pages one of the most interesting features in a most interesting paper?  
X.C. 9176.

### "For Getting You Home."

The article entitled "For Getting You Home," which appeared in *The Light Car and Cyclecar*, dated February 4th, should prove instructive to the newcomers to motoring, and pair to enable to you get home is very much "unmechanical,"

### Brains and Not Mechanical Knowledge the Asset.

points a moral which should be always kept in mind, viz., put your brains to work; do not worry about your "mechanical" knowledge. It is an asset, of course, but in nine cases out of ten the remedy or repair to enable you to get home is very much "unmechanical," and the pleasure one feels at "getting over" a mishap is one of the real joys of motoring.

Let the tow-rope be absolutely the last hope. The only part of the article with which I cannot agree is the illustration of a broken front spring in the right-hand skotch at the heading of the article. No doubt the method illustrated would enable one to get home, but as the spring is broken between the dumb-iron and the axle there is nothing to hold the axle in alignment.

Leeds.

ROBERT WALKER.

B48

### Unsportsmanlike?

As a follower of hounds, may I protest against your admitting in your columns such an unsportsmanlike letter as that of the man who, according to a recent advertisement, follows the hunt in a motorcar?

Surrey

C. L. FIELDER.

### An Explanation.

Having read with interest your notes regarding the result of the Midland Light Car Club Trial, I was rather disappointed to notice that you had stated in your schedule that No. 44 retired.

### Echo of a Trial.

May I encroach on your space and give you the full facts? About two miles from Sunrising Hill I was running 7 minutes late, when, from the side of the road, a stationary Ford lorry drew across my path without warning at all, giving me barely 2 yards in which to stop. Pulling quickly to the left and applying my brakes, I avoided a bad engine smash, but skidded with force into the side of the offending lorry, completely buckling my rear axle.

Birmingham.

E. MOTTERSHEAD.

### Belt Drive.

Regarding the article on belt-drive, your contributor apparently favours the "expanding pulley system of changing gear." In my opinion the advantages of this system are outweighed by its disadvantages, which are obvious.

### Expanding Pulleys Not Satisfactory.

In the first place, to obtain the proper tension on all ratios, the complete rear axle requires to be built so that it can be moved backward and forward; that is to say, in the lowest gear the rear axle requires to be moved back, which immediately sets up complications.

Another disadvantage is that there is no clutch pedal, only a lever, which takes longer to operate.

The cyclecar of the future will, in my opinion, embody a horizontally opposed air-cooled twin, friction discs, and final drive by twin V-belts; but please steer clear of such complications as "expanding pulley gears." What a pity there is not a modern Rollo two-seater!

Edinburgh.

ROBERT S. MOORE.

# For Motorists by Motorists

The English  
MOTOR CAR  
POLICY



THE "ENGLISH" CAR POLICY finds favour with most motor owners because it is *practical*—covering risks which in many cases only experienced motorists could anticipate. THE "ENGLISH" POLICY, approved by the R.A.C., was actually compiled by motorists whose knowledge of the chances and dangers is the outcome of many years at the wheel. Nothing is left to chance—no risk is skilfully avoided by distorted phraseology. Everything is plain, straight and safe in the "ENGLISH" POLICY.

Write for full particulars without delay.

## The English Insurance Company Ltd.

Managing Director: PERCIVAL J. ALEXANDER.

English House, 58, Gresham Street, London, E.C.2.

Telegrams: "Enginsuru, Cent, London."

Telephone: City 489 (4 lines).

WEST END BRANCH—16-17, Pall Mall, S.W.1.

Telephone: Regent 2585.

## THE REVIVAL OF THE VICTORIOUS

3 speeds and reverse.

Helical Bevel Drive.

# BUCKINGHAM

50 M.P.G.

# 200

GUINEAS.

50 M.P.H.

New and Second-hand Light Cars of various makes in stock.

**THE CHESTER MOTOR CO., LTD.,**  
32a, Chester Street, Grosvenor Place, London, S.W. 1.

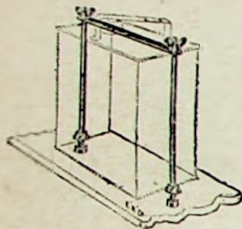
TO THE  
READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers,  
you will be working for the cause of the new motoring.

B49

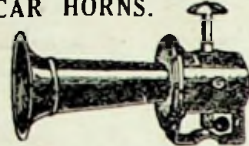
# BENETFINKS Stocktaking Sale

Wonderful Bargains for Owner-Drivers



### Mechanical CAR HORNS.

In Black and Brass. Plunger action. Loud note. List Price, 30/-  
Sale Price **8/11**  
Post 9d.



### 350 TOOL ROLLS

In stout canvas. With double leather strap and pocket for spares. Size 21" x 13" to take 15 tools. Usual Price 6/6  
Sale Price **2/9**  
Post 9d.

### 380 SETS Petrol Tin Holders

In solid Brass. Very strong. Will fit any car. Usual price 7/6 Sale Price **4/9**  
Nickel or Black finish 1/- extra. Post 9d.



### 3500 CAR SPOKE BRUSHES

As illustration. Well made. Strong fibre. Usual Price 3/0.  
Post 9d. Sale Price **1/-**



### PETROL INJECTORS.

Very handy for flushing out bearings or for priming. 2,180 offered at the low  
SALE PRICE **1/-** each.  
Usual Price 2/9 Post 4d.



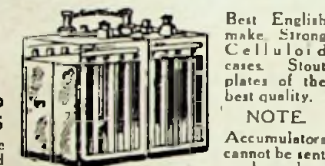
**CAR SPOKE BRUSHES**  
Strong fibre with long handle. Usually 3/9 Sale Price **1/3**



### 300 ASSORTED OBSERVATION MIRRORS

4 1/2" and 5" flat bevelled glass. Adjustable to any angle. Plate fitting for dashboard or clip fitting for screen. Finished Black, Brass or Nickel. Well worth **10/9**  
17/6 Sale Price  
Post 9d.

### ACCUMULATORS



Best English make. Strong Celluloid cases. Stout plates of the best quality.

#### NOTE

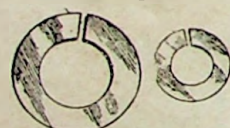
Accumulators cannot be sent charged.

4 volt	<b>9/9</b>	4 volt	<b>27/6</b>
10 amp.	Usual Price 15/-	30 amp.	Usual Price 45/-
4 volt	<b>12/6</b>	6 volt	<b>22/6</b>
20 amp.	Usual Price 20/-	20 amp.	Usual Price 27/9
4 volt	<b>16/3</b>	6 volt	<b>26/6</b>
40 amp.	Usual Price 27/6	40 amp.	Usual Price 42/6
4 volt	<b>19/11</b>	6 volt	<b>33/3</b>
60 amp.	Usual Price 35/-	60 amp.	Usual Price 50/-

Post 1/- extra.

### 480 Solid Brass 3" Spout OILERS.

As illustration. Strongly made. Usual Price 4/6  
SALE PRICE **2/11**  
Post 9d.



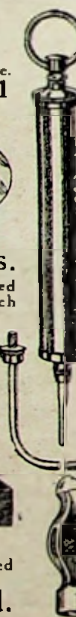
### SPRING WASHERS.

2500 Gross Boxes of Assorted Steel Spring Washers, each box containing 100.  
Usual Price 2/3  
SALE PRICE **1/-**  
Post 4d.



### SPLIT PINS

500 Boxes of 1 gross Assorted Split Pins.  
Usual Price 2/9  
SALE PRICE **11 1/2d.**  
Post 3d.



### 4,700 pairs of COMBINATION PLIERS

with double cutters, burner grip and main wire cutter. 6in. or 7in.  
Usual Price 5/6  
SALE PRICE **1/3**  
Post 6d.



Write now for our  
**SALE LIST.**  
Full of Bargains Sent  
post free on request

**3,000 Solid Leather Straps.**  
Fine Quality. Very strong. Size 50" x 1" Ex Government Stock.  
Usual Price 3/-  
SALE PRICE **1/4 1/2** Post 4d.

### Short Handle Hammers

With ball pane or oval head.  
Usual Price 2/6  
Sale Price **9d.**  
Post 9d.

## AROUND THE TRADE.

The imposing figure portrayed in the photograph may be at once recognized as that associated with productions of the Rover Motor Co., Ltd. This figure, which stands 3 ft. 4 ins. high, finished in antique bronze, with the word "Rover" picked out in red, is being supplied to Rover agents for show-room display. It is proposed to supply miniature replicas of this figure for use as radiator mascots. The device was designed by Heritage-Peters, Ltd.



An advertising figure registered by the Rover Motor Co., Ltd.

We have received an interesting booklet issued by Swift of Coventry, Ltd., which is devoted solely to testimonials supplied by users of Swift cars. This type of advertising is forcible and convincing.

Norwich is the home of one of the most thriving motoring businesses to-day, viz., Messrs.

Mann, Egerton and Co., Ltd. More or less centrally placed is a compact series of buildings, embracing capacious and well-planned showrooms, together with garage accommodation for 400 cars, and there are extensive premises devoted to all kinds of repair work and also coachbuilding and renovating.

To light carists in the East Anglian country, such a facility as the plant and works which Mann, Egerton provide should be really a boon, for there one can rely on quick service, good workmanship, and ready attention.

We recently made a simple test in connection with the M.E. valve, which is a feature this firm has introduced for the benefit of motorists after much careful experimental work. A standard Calthorpe with a four-seater body was taken out over a distance of approximately four miles, the valve having previously been fitted to the induction pipe—a very simple operation, as a special piece containing the valve is made to fit between the induction pipe and the carburettor—and driven at a speed of approximately 25 m.p.h. On accurate test, a consumption of 1 1/4 pint for four miles, an average consumption of 39.5 m.p.g.

It should be mentioned that the car carried a load of three passengers. The oil used was Filtrate, and a standard Claudel-Hobson carburettor with a standard setting of 80 main and 16 choke was fitted.

Our readers will doubtless be interested to hear that Mr. Jack Dessar, late of the Museum Super Garage, having severed his connection with that concern, is now connected in a managerial capacity with the Lucid Lamp Co., 8a, Eden Street, Hampstead Road, N.W. 1, where he will be very pleased to hear from old friends.

# BENETFINKS CHEAPSIDE, London, E.C.2

B50

HELP THE MOVEMENT by letting advertisers know that their advertisements in "The Light Car and Cyclecar" interest you.

# OFFICERS' ARMY TRENCH COATS

AT **70/-** EACH. (Without Detachable Fleece Lining 55/- each.)



Carriage Paid in United Kingdom.

Reduced from 75/- at which price over 25,000 have been sold in the last five months.

On January 16th, we announced a Special Sale of our Officers' Army Trench Coats at 70/- each. So great was the success of this sale that although the individual profit was less the aggregate profit was greater than formerly. We have, therefore, decided not to revert to the old price, but to continue to sell this magnificent coat at 70/-, thus acting in accordance with the spirit of the times and carrying out our business principle of giving the public the utmost value for money.

**Quite 60% below present-day prices.** *These Goods can never be duplicated at the price.*

Brand New, Triple-proof Gabardine, check lining, OILSKIN INTER-LINING, and with detachable ALL-WOOL fleece lining. **FOUR COATS IN ONE.** These Coats are made from guaranteed Government materials throughout by Contractors who made thousands of Officers' Army Trench Coats during the War. This is the only coat made THROUGHOUT with the Surplus Government materials which we control.

When existing stocks of Government material are exhausted, it will be impossible to buy a genuine officer's army trench coat at anything like this price. There are no REAL Officers' Army Trench Coats on the market approaching it.

**POINTS FOR TRENCH COAT BUYERS.** 1. A Genuine Officer's Army Trench Coat Surplus material will last for years. An inferior one will "crack up" in a few months. 2. See that the fleece lining is ALL WOOL. 3. See that the fleece lining extends down the sleeves to the wrists. 4. See that the inter-lining is oilskin or oil cotton and not a rubber solution fabric which is perishable. 5. See that you deal with a "MONEYBACK" Firm, so that if the coat does not meet with these requirements you can demand a refund.

**OUR GUARANTEE.** We guarantee this coat to be as described above, and that the description is in no way exaggerated. If the customer is not satisfied with his purchase we guarantee to return his money in full without question, provided the coat is returned undamaged within seven days of purchase.

**MONEYBACK PRINCIPLE.** All our business is conducted on the "Moneyback" principle. Inasmuch as a Mail Order Customer has no opportunity of inspecting his goods before purchasing, this is the only fair and satisfactory way of conducting a Mail Order Business. An announcement such as ours forms a legal contract between the Seller and the Purchaser and, therefore, fully protects the latter.

The present Wholesale Price of Coats equal to these from Contractors not in possession of the surplus Government material is 165/- each.

Who ordering state height and chest measurement over waistcoat. CHEST SIZES: 34, 36, 38, 40, 42, 44 ins. Also state whether Coat is required in Military style or adapted for civilian wear. In the latter case, shoulder straps and brass D's on belt are omitted.

Cheques, Money Orders and Postal Orders should be crossed Barclays Bank Limited. Treasury Notes should be registered.

**GEORGE WESTON & CO.**

Clothing Contractors, "Moneyback" Merchants (Dept. "L.C.")

Offices

Warehouse & Stores:

1, Bath Road

Inverness Rd.

HOUNSLOW

MIDDLESEX.

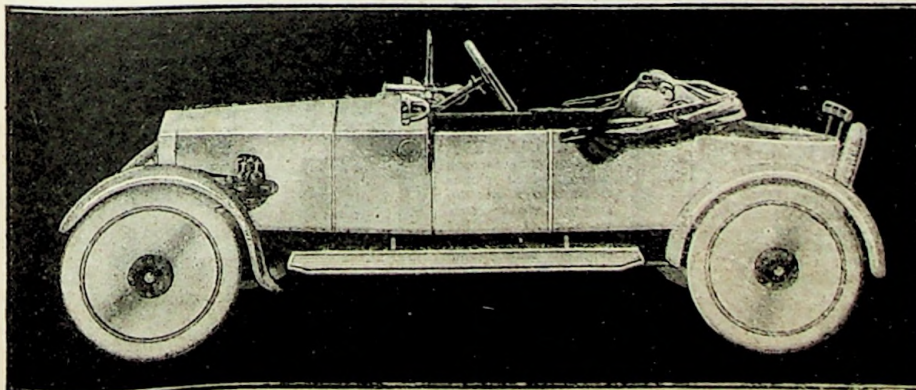
The 10 h.p.



**T**HE new BUCKINGHAM 10 h.p. AIR-COOLED TWO-SEATER with Dickey Seat and complete specification, *knocks the bottom out of light car values.* In appearance, performance, specification, and price it commands your attention. The crowning achievement of a famous engineer whose cars in pre-war days secured many World's Records, it may be purchased with every confidence. It is exceptionally fast and quiet, perfectly built and sprung, with a polished aluminium body of pleasing and distinctive appearance. Two years' tests prove its speed 50 m.p.h., petrol consumption 50 m.p.g. and any ordinary hill may be taken on top gear. With a large manufacturing and service organization behind it you may, with every confidence purchase a BUCKINGHAM. A unique scheme of easy payments has been arranged. *Write NOW for illustrated particulars and Agent's address.*

The BUCKINGHAM ENGINEERING CO., Holyhead Road, COVENTRY.  
Telephone: 1246 (3 lines), Telegrams: "Utility."

*has got all others licked*



at **199** GUINEAS complete with Electric Lighting Set and Dickey Seat.

The 10 h.p. BUCKINGHAM AIR-COOLED LIGHT CAR, 199 Guineas, Manufactured by the Makers of the World-famous "ALVIS" Car.

TO THE READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.

B51

# Morgan

## SERVICE DEPOT

TRADE SUPPLIED.

STANDARD MODEL	a.-c.,	£150
DE LUXE	„ a.-c.,	£175
„	„ w.-c.,	£186
GRAND PRIX	„ w.-c.,	£180
FAMILY	„ a.-c.,	£180
„	„ w.-c.,	£191

All models fitted Hood, Screen, Lamps, Horn, Mats, Tools, Pump, etc., inclusive.

### Every Spare Part in Stock

Officially Appointed Repairers by—  
THE MORGAN MOTOR CO., LTD.

**HOMAC'S** 243, LOWER CLAPTON ROAD, N.E.  
MOTOR AGENTS  
Phone: Dalston 2408



**Fits snug and tight**  
on any shape or make of spring  
without straining or pulling.

The only correct method of feeding springs with lubricant is by a supply of grease available to both sides of the spring from end to end. Our illustration shows the top Scroll of a three-quarter elliptic spring (Daimler).

None but the Withers Lubrigait with its Grease Cells of non-absorbent material, in contact with the Spring Sides, can efficiently lubricate and protect a Spring of this shape. The Withers Lubrigait does it indefinitely without attention.

Get our Illustrated Brochure and Price List. Post Free on request.

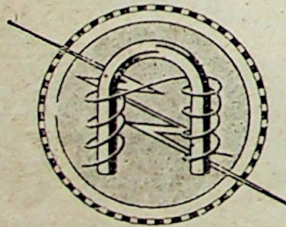
Compare our prices and ask your Dealer or Garage man to show you the Withers Lubrigait.

**J. WITHERS & SON, Ltd.**  
Dept. 25, Wisemore Street, WALSALL  
Sole Manufacturers and Patentees.

## The Motor Electrical Manual

3/- NET

All about Motor Car  
Electrical Equipment  
in Simple Language.  
Fully Illustrated.



An authority on all electrical matters concerning the car. Clearly written and well illustrated, it forms a standard reference for all motorists. Of great value to owner-drivers in explaining the working of motor car electrical equipment. Gives instruction on keeping electrical devices in efficient working order. 3/- net; post free 3/3d

TEMPLE PRESS LTD.,  
7-15, Rosebery Avenue, London, E.C.1.  
Wholesale only—E. J. LARBY, LTD.,  
30, Paternoster Row, London, E.C.4.

WRITE

**A. P. HATTON,**  
192, Toller Lane, Bradford,  
for  
**COMPRESSED CORK  
FRICTION RINGS**

for any make of Friction-driven Light Car.

Don't Run Risks with Rain or Snow on your Screen!

GET AN

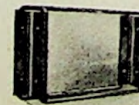
## EASYQUIP

## DUPLEX SCREEN WIPER

Brass - - - 18/6  
Plated Finish - 21/-

THE "DUPLEX"

is an efficient screen wiper which cleans both sides of the screen with one movement of the hand, and does not interfere with driving the car. It gives a clear view along the full length of the glass screen. Can be moved to one side or removed when not in use.



Regd.  
Number  
679314.



**COVENTRY EQUIPMENTS, LTD.**  
Empire Works, Clarendon Street, COVENTRY.  
Telegrams—"Coear, Coventry." Telephone—1771 Coventry.

# PETO & RADFORD

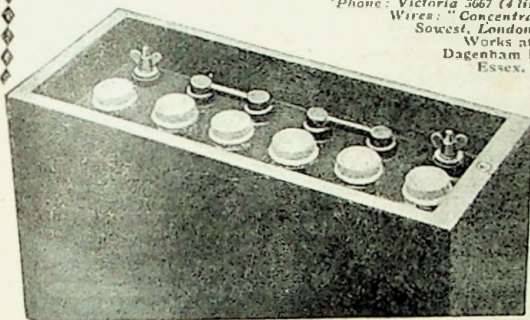
Accumulators for every purpose

EVERY user of a P. & R. "Bull Dog" Accumulator knows that it does not need constant attention and that it works at its best—always.

More acid room; thicker and stronger plates; longer life; better service.

There is 40 years of manufacturing experience behind every Peto & Radford Accumulator.

PETO & RADFORD (Proprietors: Pritchett & Gold and E. P. S. Co., Limited) 50, Grosvenor Gardens, London, S.W. 1. Phone: Victoria 3667 (4 lines). Wires: "Concentration, Sowest, London." Works at Dagenham Dock, Essex.



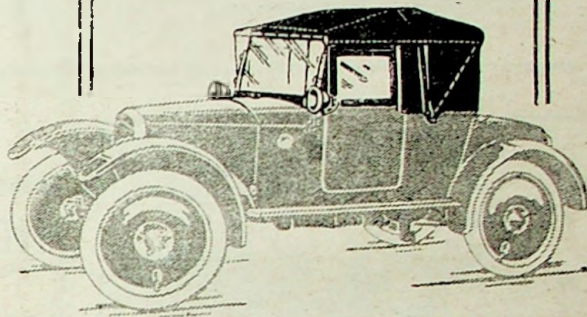
## WHY NOT HAVE THE REAL THING?

### THE R. O. COUPE FITMENT

costs a little more than other methods but there is no comparison in either the finish to your Car or in the "weatherproof-ness" it gives.

And—in fine weather you have the added appearance and comfort of permanent side screens.

Why not give your 8 h.p. Rover the BEST. It's worth it, you know.

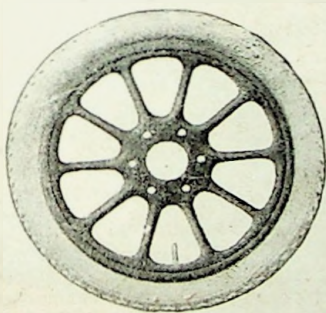


## GOODWIN'S

Motor Agency Ltd., J. D. BURBIDGE, Managing Director. 2 & 4, EDMUND STREET, Birmingham.

DISTRICT AGENTS FOR ROVER CARS

# GOODYEAR



## PATENT STEEL WHEELS

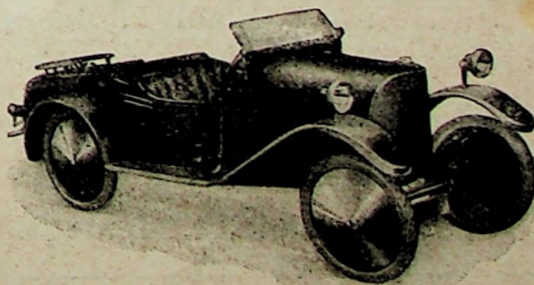
LIGHTEST — EASIEST TO CLEAN — INDESTRUCTIBLE  
BUILT TO OUTLAST THE LIFE OF THE CAR  
W. GOODYEAR & SONS, LTD., DUDLEY.

## Eight h.p.A.V.

Price £160

1922 ALL-WEATHER TWO-SEATER

J. A. P. or Blackburne Engine, 3-Speed Sturmev-Archer Gearbox with Reverse incorporated, T.B. Magneto, Claudel-Hobson Carburetter, Ackerman Steering, Chain Drive, Sprung Cushions, Roomy Seating, Handle Starter, Hood, Windscreen, Tools, Horn, etc. Painted in Red, Matchless Grey or Sylvian Grey.

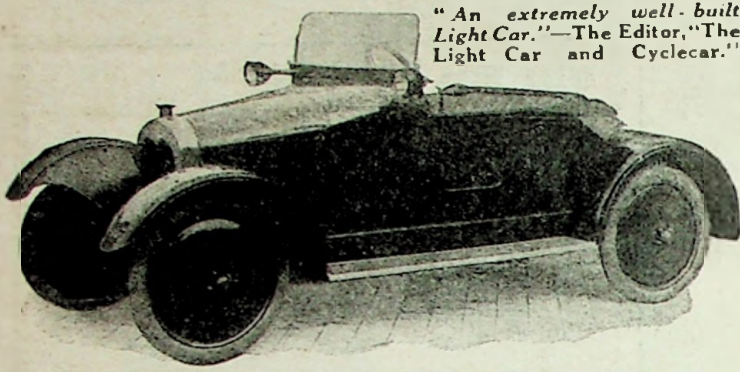


Illustrated Specification on application to:—

Ward & Avey, Ltd., TEDDINGTON, MIDDLESEX.

TO THE READER

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers you will be working for the cause of the new motoring.



*"An extremely well-built Light Car."—The Editor, "The Light Car and Cyclecar."*

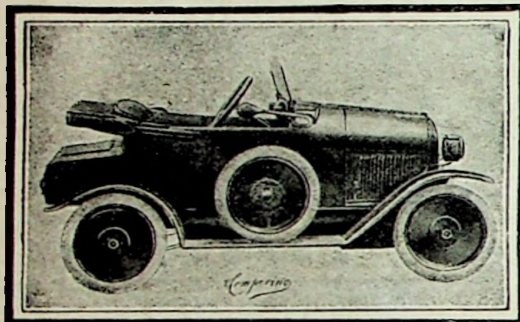
## The CORONA 8 h.p. Light Car

The Corona Two-Seater was entered in the London-Exeter to show what an untrained driver could do on this excellent Light Car. He had never driven a car before and had only driven the Corona for six miles before leaving Staines. The car ran to schedule time all through without involuntary stops, and was awarded a Silver Medal owing to him entering his gear on Chard Hill. All the hills were surmounted without difficulty.

Price, **£250**; Chassis, **£225**

Manufactured by  
**The Meteor Manfg. Co., Ltd.,**  
 98, Tollington Park, N. 4, London.  
 Telephone—Hornsey 2450.

Sole Selling Agent for London and 50-mile radius  
**W. H. Bailey, 85, Great Portland Street, W. 1.**



**£175**

### THE CHEAPEST LIGHT CAR.

*Write for particulars.*

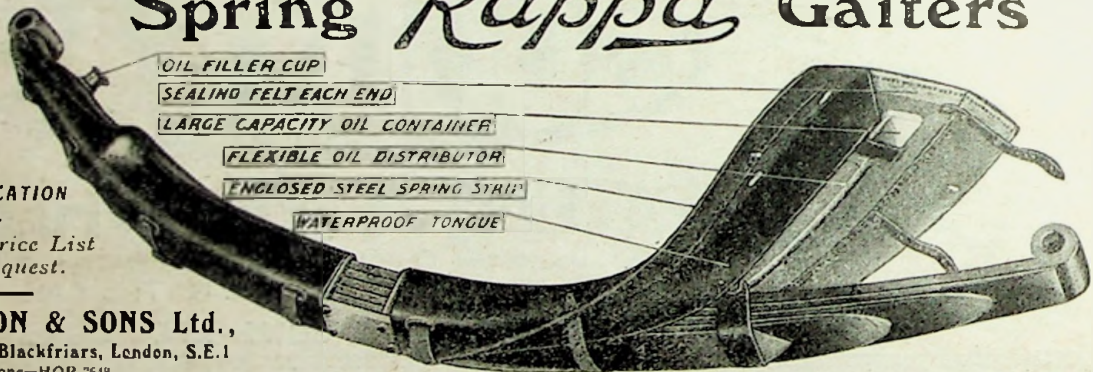
Spare Parts from Stock. Trial Runs by Appointment.  
**IMMEDIATE DELIVERY.**

Brief Specification:—ENGINE—V Twin, air-cooled by powerful fan. TRANSMISSION—Cardan, bevel and pinion. GEARBOX—Wholly incorporated; diff. drive on rear axle. STARTER—Kick, placed in front. STEERING—By rack and pinion, patented. GEARS—3 and reverse, patented. LIGHTING—Acetylene. WEIGHT—8 cwt. CONSUMPTION—50-60 m.p.g. SPEED—30-35 m.p.h.

**TEMPERINO MOTORS (Gt. Britain) Ltd.,** Waldorf House, 1, Catherine Street, ALDWYCH, W.C.  
 Telegrams: "Ockinswamo, Phone, London." Telephone: Regent 691.

- NO LACES
- EASIEST TO FIT
- SOLID LEATHER
- CONSTANT LUBRICATION

## Spring Rappa Gaiters



Folder and Price List sent on request.

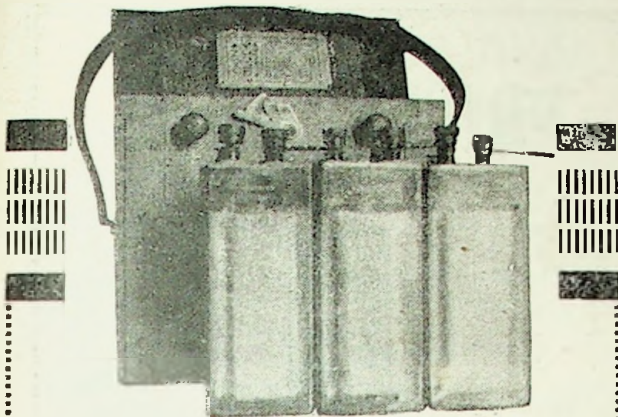
**E. HARRISON & SONS Ltd.,**  
 19, Meymott St., Blackfriars, London, S.E. 1  
 Phone—HOP 2649.

# CELLULOID

First Quality Transparent for Hoods, Screens, Etc.  
 Accumulator Cases. Corrugated Material, Etc.

## GREENHILL & SONS, LTD.,

8, Water Lane, Ludgate Hill, LONDON, E.C. 4. Telephone—Central 1306



Sale of Surplus Government Stock of Absolutely New  
**FULLER BLOCK ACCUMULATORS**

at approximately 35% less than Manufacturers' prices.

Every Motorist should avail himself of this opportunity to equip his car with a set of these accumulators. Agents wanted in all parts.

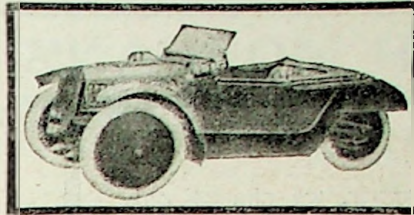
These Accumulators have no plates to buckle, internal short-circuiting is impossible, and, unlike plate cells, they will retain their charge for months' months. It is most disappointing to find, as so often happens with plate cells, that just when they are wanted the cells have run out of their standing idle. THIS CANNOT OCCUR WITH BLOCK ACCUMULATORS, which have the invaluable quality of retaining their charge when not working. Shaking and rough usage do not injure them as with plate cells, and they can be left for months without attention.

4 volt, 20 amp. hour set, in celluloid cases ..	£1 12 6
do. do., ditto .. ditto ..	2 8 6
do. do., ditto complete in Teak Case, asillus ..	2 19 6
do. do., ditto .. ditto ..	5 19 0
do. do., ditto in celluloid cases ..	4 17 6

Postage per 4 volt set, 1/3 extra.

Illustrated Catalogue and wiring diagram post free on application.

**THE CITY ACCUMULATOR CO.,**  
79, MARK LANE, LONDON, E.C.3 Phone: - Avenue 91 (3 lines).



From  
**£150**  
IMMEDIATE  
DELIVERY  
of  
ALL MODELS

Exchange  
your  
**Motorcycle**  
for **Morgan**

Deferred Payments 4% only

**LAMB'S**

151, High St., Walthamstow, London, E.17  
387, Euston Rd., London, N.W. 1  
50, High Road, Wood Green, London, N.22

*Speed  
in supply-and  
Speed for your Car*

For a quick supply—for easy starting, speed, and all-round economy use Pratt's "Perfection." Obtainable pure, filtered, and without waste from the Golden Pump.

**PRATT'S  
PERFECTION  
SPIRIT**

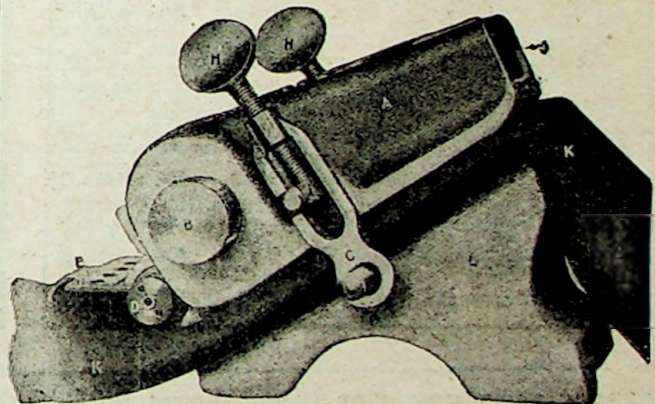
Sold also in the Green Can. Available everywhere.

Anglo-American Oil Co. Ltd.

Head Office: 36, Queen Anne's Gate, London, S.W.1.



**Halve your Tyre Bill**



by using

**The Vulcan  
Automatic Vulcanizer**

It works by itself, automatically—requires no skill and there is no possibility of burning the tyre as with other machines.

**Price . . . £4 4s.**

Write for particulars and trial offer.

**J. LACOSTE & CO.**

(Sole Proprietor: J. Lacoste, French nationality.)

**184, Shaftesbury Avenue, London, W.C.2.**

**TO THE  
READER**

By mentioning "The Light Car and Cyclecar" when corresponding with advertisers, you will be working for the cause of the new motoring.

# A-B FOR MORGANS

Come to Croydon for your 1922 Morgan.

Remember, we charge only 4% extra on Extended Payments, and give service with every car sold.

**PRICES.**

- MORGAN, 8 h.p., air-cooled, Popular ... £150
- MORGAN, 8 h.p., de luxe, air-cooled ... £175
- MORGAN, 8 h.p., de luxe, water-cooled ... £186
- MORGAN, 8 h.p., Grand Prix £180
- MORGAN, 8 h.p., Family, water-cooled ... £191

**NOTE!**

Prices quoted include Lamps, Horn, Hood, Screen, Mats, Tools, Pump, etc.; Dynamo Lighting £13 10 extra. All Spares in stock. Officially appointed Repairers by the Morgan Motor Co., Ltd.

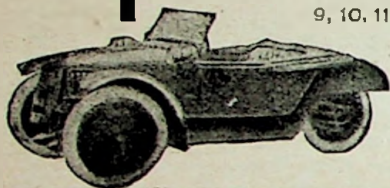
**TRADE SUPPLIED.**

ALLEN-BENNETT MOTOR CO., LIMITED.

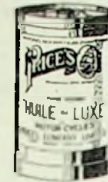
Showrooms:—

9, 10, 11, Royal Parade, London Road, West Croydon.

Phone—Croydon 2450.



# PRICES' prices



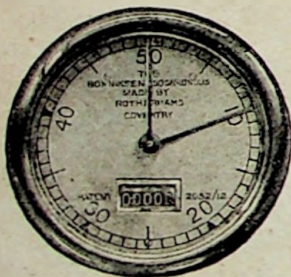
are down substantially.

February lists and leaflets are yours for the asking.

Send a Post Card to—

PRICES' COMPANY LIMITED, BATTERSEA—S.W. 11.

## The "BONNIKSEN" SPEEDOMETER



AN IDEAL COMPANION FOR COMPETITIONS AND TOUR.

For Competition Work this Speedometer is an invaluable asset, giving both accurate and reliable indications of speed and distance run.

**PRICES:**

- Motorcycle Type Speedometers With Trip. Non-Trip. £5:5:0 £4:15:0
- Rear Drive 10/- extra for American Machines only.
- Car Type Speedometers With Trip. Non-Trip. £7:0:0 £6:10:0

SEND FOR ILLUSTRATED BOOKLET.

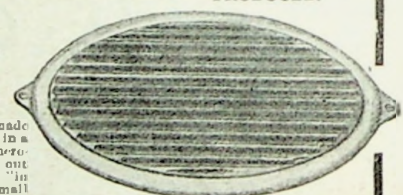
Rotherham & Sons, Ltd., Coventry. Telephone: 752 and 753. Grams: "Rotherhams, Coventry."

## EASYQUIP

The BEST, NEATEST, and the MOST DURABLE MAT yet PRODUCED.

### OVAL STEP-MAT

Price £1-1-0



The "OVAL" Step-Mat is made of Pure Para Rubber fixed in a Special Aluminium Frame, therefore it will not wear or get out of shape. It is simply fitted "in a few seconds" by two small screws supplied, and there is no necessity to remove the Mat for Car cleaning.

Registered No. 681190.

Obtained from all Dealers or direct from the Makers—

"Coventry" Equipments Ltd., Empire Works, Clarendon Street, Coventry. Telegrams—"Cmasr, Coventry." Telephone—1771 Coventry.

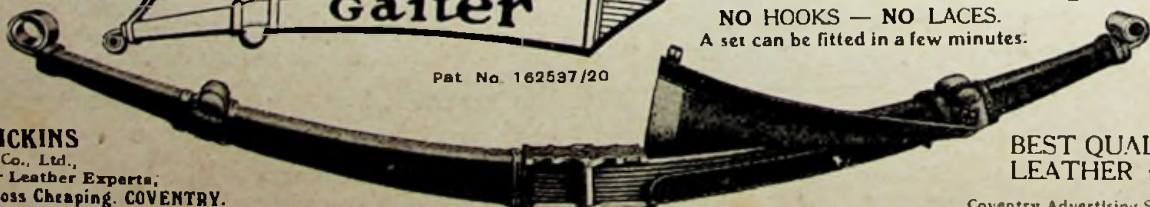
Order your new Car to be fitted with the

Consult your nearest Garage or send for Illustrated Folder and Measurement Forms to the Manufacturers.

# Quick Fit Gaiter

Pat No. 162537/20

W. DICKINS & Co., Ltd., Motor Leather Experts, Cross Cheaping, COVENTRY.



However variable the load

The Quick Fit Gaiter never gapes. A special steel blade in the overlapping edge sees to that. Normally of opposite curvature to the camber of the spring, so that when the gaiter is strapped in position a perfectly elastic and uniformly tight grease and waterproof joint is maintained at all times along the whole length of the spring.

Note Ease of Fitting.

NO HOOKS — NO LACES. A set can be fitted in a few minutes.

BEST QUALITY LEATHER ::::

Coventry Advertising Service.

**SECOND-HAND**  
AND NEW  
LIGHT CARS, CYCLECARS,  
and ACCESSORIES FOR SALE

"The Light Car and Cyclecar" deals with its own types of machines exclusively. Old cars produced before 1912 as distinct from modern light cars, and cars with an engine of a cubic capacity exceeding 1,500 c.c., cannot be accepted for its advertisement columns.

**RATES.**

For advertisements in this section: 12 words, 2/- (minimum); 2d. per word after. Subject to a discount of 5 per cent. for 13 consecutive insertions, 10 per cent. for 26, 15 per cent. for 52. Terms: Cash with order, and otherwise net. Cheques, Postal Orders, etc., should be crossed and made payable to Temple Press Ltd.

**BOX NUMBERS.**—Advertisers desiring to have replies sent care of "The Light Car and Cyclecar" may do so on payment of a nominal fee of 6d. to cover booking and cost of forwarding such replies. The words "Box" , s/o "The Light Car and Cyclecar," count part of the advertisement.

**DEPOSIT SYSTEM.**

For the convenience and security of our readers we have an approval-deposit system. The intending buyer forwards to our office the amount of the purchase money, which will be acknowledged to both parties. Notes or money order save time. Cheques must be made payable Temple Press Ltd., and are acknowledged to seller when "cleared." If a sale is concluded, we forward to the seller the amount agreed upon. If no sale is made, we return the amount deposited. In either case we deduct a commission of 1 1/2 per cent. (3d. in the £, 2s. 6d. minimum), on amounts deposited up to £50, 1 per cent. on amounts from £50 to £100, and 3/4 per cent. on amounts exceeding £100, to cover our expenses of booking, postage, etc. Carriage is to be paid by the buyer. If the article is returned, each party pays one way. The risk of damage in transit is the seller's. Articles on approval are not to be retained more than three days, unless by arrangement between the parties. All disputes to be settled by the arbitration of the Editor of "THE LIGHT CAR AND CYCLECAR," whose decision shall be final and binding on both parties.

**WARNING.**—Acknowledgments of deposits or instructions to forward goods advertised are only written on our special headed paper, which bears a facsimile of the title of this journal. To prevent fraud, the advertiser should **ACKNOWLEDGE IMMEDIATELY** any such letter apparently coming from us, and delay forwarding the goods for a day or so. Should we, on receiving such an acknowledgment, find that no letter has been sent by us, we will wire the advertiser not to part with the goods advertised.

**DISPLAY ADVERTISEMENTS.** Scale of charges, with reduction for series, sent on application.

**REGULATIONS WITH REGARD TO ADVERTISEMENTS.**

All advertisement orders are subject to confirmation in writing from the Head Office.

All advertisements and contracts are accepted and made upon the express condition that "Copy" is subject to the approval of the Publishers generally, who also reserve the right to reject any advertisement, in whole or in part, referring to cars or accessories which in the opinion of the Publishers are outside the scope of the journal, and such refusal of copy shall not be a good ground for advertisers to stop a current contract or to refuse to pay for the same or for taking action for breach of contract.

Advertisements received too late for insertion in the issue then closing for press will—unless accompanied by express instructions to the contrary—be inserted in the following issue.

Whilst every precaution is taken to ensure accurate printing, the Publishers will not be responsible for printer's errors, nor will they be responsible for advt. blocks destroyed by fire or that are left in their possession for more than one year.

Copy for, and all matter relating to, advertisements must reach the office **first post Tuesday**, and should be addressed to **THE MANAGER, "THE LIGHT CAR AND CYCLECAR," 7-15, ROSEBERY AVENUE, LONDON, E.C. 1**, to whom all communications concerning advertisements should be sent. If proof of displayed advertisements is required, copy should be forwarded in sufficient time to allow of it being submitted and returned.

**Head Offices:**—7-15 Rosebery Avenue, London, E.C. 1. Telephone No. 5292 Holborn (five lines). Telegrams: "Pressimus, Holb., London."  
**(Addresses of Branch Offices and other Business and Editorial Notices will be found on the last page of this section.)**

**NOTICE.**

Owing to postal delays and irregularities, it is advisable to post advertisements **EARLY ON MONDAY** so as to ensure, as far as possible, that they reach us by the **FIRST POST on Tuesday**. Lately several advertisements have been received too late for inclusion, although despatched on Monday.

**SECOND-HAND**

**LIGHT CARS AND CYCLECARS FOR SALE.**

**A.B.C.** Several of these cars second-hand and, new shop-sold at bargain prices, all carrying our full guarantee. Deferred payments can be arranged and other cars taken in part payment. Gordon Watson and Co., Ltd., 51 Brook St., W.1. Phone, Mayfair 2966. zzz-812

**A.B.C. Smith and Hunter,** the authorized agents, have always several sound second-hand cars they will sell under guarantee. Now models always available at £295. 77 Gt. Portland St. Langham 2365. 484-988

**A.B.C. sports 1921 model,** with approximately £50 worth of extras, in addition has been tuned by George England, Ltd., for high speed, fitted with Specialoid pistons, special carburetter, induction pipe, battery ignition, privately owned, price £275. George England, Ltd., 11 Curzon St., Mayfair, W.1. Phone, Grosvenor 2191; and Walton-on-Thames. 484-492

**A-C. Sociables for sale** dependable little runabouts, by the A-C. Co., carry 2 persons anywhere, fully equipped, good condition and appearance, from £50, trial, 23 Allison St., Upper Baker St., London, N.W. (opposite Baker St., Station). 484-h689

**A-C. runabout, just overhauled, repainted, take 2 anywhere,** fully equipped, hood, screen, lamps, speedometer, tax paid, £50, trial, appointment. Green, 23 Bath Rd., W.4. 484-127

**A-C. 1914 2 seater and dickey, detachable wheels, dynamo lighting,** exceptional condition, private owner, tax paid, price £175; seen by appointment. S. G. Morris, Silmanhurst, Golf's Oak, Chesunt, Herts. 484-a97

**A-C. Sociable, B type, new, hood, lamps, screen, perfect running order,** £40. 88 Park Rd., Dulwich. 484-a156

**A-C. 1921 2 seater, double dickey, C.A.V. lighting and starting, fully equipped, bargain, 320 guineas.** L. H. Pugh, 9 South Molton St., London, W. Mayfair 4453. 484-27

**A-C. 1920, 2 seater, C.A.V. dynamo lighting, bargain, £250.** Phone, Wanstead 403. Junction Garage, Highstone, Leytonstone, E.11. 484-50

**A-C. 1914, single-cylinder, 4 wheels and Stopper, good condition and order** (just overhauled by makers, cost £34), what offers? Ash, Bohemia, Swange. 484-a5

**A-C. Alfred Wastnag, authorized A-C. agent, has the following used cars for sale:—**

**A-C. 1921 coupe, as new, £535.**

**A-C. 1921 Sports, mileage under 1,000, £425.**

**A-C. 1921 4 seater, all-weather hood, revarnished, £410.**

**A-C. 1921 2 seater and dickey, starter, £385.**  
The above cars are all in first-class condition and are open to any expert examination. Alfred Wastnag, 65 Gt. Portland St., W. Tol., Langham 484-903

**A-C. Sociable, excellent condition, complete, would exchange for lightweight motor bicycle.** Williams, Ltd., Wellington College Station (near Reading). 484-71

**A-C. 1921, standard 11.9, 2 seater, dickey, lighting and starting, any road trial or examination, £375.** Batchelor, 50 Clarence St., Kingston. 484-a185

**A-C. 1921 (August 29th), 4 seater, actually as new, mileage under 3,000, colour turquoise blue, black wings and upholstery, C.A.V. starter and lighting and electric bell, speedometer, clock and bulb horn, all-weather body, curtains opening with door, adjustable driving seat, hood envelope, in perfect condition, cost £575, accept £450, no offers.** Howe, King's Head, Clapham Park Rd. Phone, Battersea 864. 484-64

**A-C. 10hp, 1914, 2 seater, dickey, dynamo lighting, 5 wheels, good condition** (seen Manchester district, £155. Box No. 7709, c.o. "The Light Car and Cyclecar." 484-a28

**ALLDAYS MIDGET, 1914, 2 cylinder, w.c., 5 Riley detachable wheels, hood, screen, speedometer, tools, jack, pump, 2 spare tyres, 3 tubes, Lucas nestylens lighting, fully licensed 1922, £105.** Smith, 8 Mortimer Rd., West Ealing. 484-k257

**ALLDAYS MIDGET, 69 guineas; year's tax paid, 8-10hp twin, worm drive, 2 seater, wire wheels, smart little car.** Seabridge. (See "Exchange.") 484-a190

**AUTOCRAT 1914 8-10hp 2 seater, streamline, bulbous back, 3 speeds and reverse, gate, in splendid running order, all accessories, £90 or near offer.** Sumner, 8 Briel St., Myatt's Park, Camberwell, S.E. 5. 484-a4

**A.V. 2 seats** A few second-hand and demonstration models, in perfect order, for sale by the manufacturers at exceptionally low prices. Ward and Avey, Ltd., Teddington, Middlesex. 485-184

**A.V. 1920, 6hp J.A.P., 2 speed, mileage under 700, splendid condition, any trial.** Norris, 7 Colville Terrace, W. 11. 484-112

**A.V., 1920, £50 only.** 63 Stewart Rd., Bournemouth. 484-k970

**A.V. monocar, 8hp, grey model, 1920, special passenger seat, £60; exchange motorbike; trial anywhere.** Write, Adeny, 8 Gloucester Terrace, W. 2. 484-a150

**A.V., 1920, 6hp, electric lighting, speedometer, lavishly equipped with many extras, new tyres, 48 guineas.** Short, 487-493 Upper Richmond Rd., East Sheen, S.W. 14. Phone, Richmond 2362. 484-58

**A.V. Bicar, 1920, 8hp J.A.P., good mechanical condition, 3 months' insurance, £75.** Roy's, of Euston Rd. (378-384). Phone, Museum 6459. 484-924

**A.V., 1920, single-seater, sporting model, aluminium body, disc wheels, electric lighting, Stewart speedometer, Klaxon horn, exceedingly attractive car, in excellent condition, £80.** Mauds', 100 Gt. Portland St., London. 484-85

**A.V. 1919 monocar, less engine unit, £35.** Halifax Motor Exchange, Horton St., Halifax. 484-91

**BABY PEUGEOT de luxé, 3 speed, dynamo lighting, tax paid, £100.** Overend and Cotton, Grafton News, Warren St., W.1. 484-a194

Readers are referred also to "THE MOTOR" (Wednesdays, 4d.), which contains each week many hundreds of advertisements of new and second-hand cars of all kinds.

**SECOND-HAND  
LIGHT CARS AND CYCLECARS FOR SALE**

(continued).

- BEBE PEUGEOT** 2 seater, as new, £30 spent on overhaul, Stepany, lamps, tools, etc., £120, near offer, by appointment. Rawlings, Wyndford, Sherwood Park Rd., Sutton, Surrey. 484-a102
- BEBE PEUGEOT**, 115 guineas, 8hp, 1915, 3 speeds, Lucas dynamo lighting. Rolls, 4 Little Cadogan Place, Belgrave Square, S.W.1. Victoria 2914. 484-11
- BAYARD**, 89 guineas; 1913, wide 3 seater, 8-10hp, 4 cylinder, enclosed valves, hood, screen, speedometer, economical. Seabridge. (See "Exchange") 484-a189
- RAYLISS-THOMAS**, 10hp, 4 cylinder, w.-c., Lucas Magdno lighting, demonstration model, shop-soiled, £265, bargain; buying 4 seater. Parker Walker, Spring St., Hull. Tel., 62 X Cont. 484-a176
- BELSIZE-BRADSHAW**, 9hp, 2 seater, with speedometer, for immediate delivery. Course and Son, Ltd., 20 Bromham Rd., Bedford. 486-44
- BELSIZE-BRADSHAW** Smith and Hunter, wholesale and retail contractors, can give you the earliest delivery; 3 seater sporting or standard, £275, self-starter if desired; delivery on payment of 25 per cent., balance over long periods; demonstration cars any time, any day. 77 and 74 Gt. Portland St. Langham 2363. 484-991
- BLERIOT-WHIPPET**, 1921, handle starter and reverse, all-weather hood, electric lighting, special headlamp fitted, £130. Box No. 7726, c/o "The Light Car and Cyclecar." 484-a131
- BLERIOT-WHIPPET**, 1921, mileage 2,000, exceptional engine, 50 m.p.h., 50 m.p.g., 5 detachables, electrically equipped, starter, tools and spares, £100, or exchange first-class combination, 62 Princess Rd., Kilburn, N.W. 6. 484-a123
- BLERIOT-WHIPPET**, Private owner disposing of Bleriot-Whippet 1920, seat starter, 5 wheels, electric, oil emergency, hood, screen, speedometer, spares, tax paid, perfect, £100, offers, Richards, 4 Ranelagh Avenue, Barnes, S.W. 484-a140
- BROOK** 1921 2 seater, 8hp, twin, 5 wire wheels, 8 day clock, speedometer, live axle, 90 guineas. Kyle, 4 Denman Place, Piccadilly, Regent 986. 484-45
- BUCKINGHAM**, Cass's Motor Mart, Ltd. 1914, 10hp, overhauled and repaired, bargain, £90; or exchange, cash either way; any new car supplied. 5 Warren St., W. 1. Museum 623. 484-982
- CALCOTT**, 1919, 10.5hp coupe, C.A.V. lighting, spare wheel, shock absorbers, car as new throughout, recently repainted, new head cover fitted, etc., £300, or near offer. Grosse, Ltd., Northampton. zzz-635
- CALCOTT** 1916 2 seater, whole chassis as new, repainted, car ready for 20,000, £155. 198 Sheen Lane, Mortlake. 484-g477
- CALCOTT**, 1919, 10hp, 2 seater, double dickey, C.A.V. lighting, 2 spare wheels, speedometer, £210. Maudes', Walsall Garage, Walsall. 484-86
- CALCOTT**, 1916, 10hp, 2 seater, dynamo lighting and dickey, 5 detachable wheels, tyres all perfect, tax paid, in magnificent condition, like new, £165. 69 St. Paul's Ave., Willesden Green, London. 484-a103
- CALCOTT**, 1915, 10.5hp, 2 seater, dickey, repainted and thoroughly overhauled last year, guaranteed perfect, splendid condition, any trial by appointment, £175. 115 Stockwell Rd., S.W. 9. 484-a164
- CALCOTT** coupe, 10hp, 1919, Bedford cord upholstery, painted dark blue, dynamo lighting, 5 detachable wheels, complete, tools, etc., mechanically perfect, price £275 net. Box No. 7727, c/o "The Light Car and Cyclecar." 484-a137
- CALCOTT**, 10hp, 2 seater, dickey, dynamo, detachables, smart, fast, bargain, £185; exchanges. 7 Victoria Rd., Guildford. 484-49
- CALTHORPE** 1917 coupe, dynamo lighting, splendid condition, upholstered Bedford, exchange entertained, £195, any trial. Blake, 216 Westbourne Grove. 484-146
- CALTHORPE**, very late 1920, De Luxe, 2 seater, sporting, electric lighting, starting, clock, speedometer, etc.; this car is guaranteed perfect order and condition, paintwork, etc., unscratched, used very little, £250 secures. Green, 7 Brewery St., Chesterfield. 484-a22
- CALTHORPE**. Unique bargain. Late 1920, 10hp, De Luxe, coupe body, electric lighting, starting, clock, speedometer, 2 horns, etc., used very little, guaranteed in perfect order and condition, any trial, cost over £650, first £300 secures, no offers. Miss Millard, Elzer House, Chesterfield. 484-a21
- CALTHORPE**, 10hp sports, as new, Brolt dynamo, Apollo and bulb horns, speedometer, lamps, spare wheel discs, £225, or exchange good Morgan and cash; tax paid 1922. 10 Elaine Grove, Gospel Oak, N.W. 5. 484-a177
- CALTHORPE**, 1915, 2 seater, dickey, clock, speedometer, electric and acetylene lighting, owner driven, small mileage, very good condition, bargain, £180. Markland, Warwick Bridge, Carlisle. 484-a126
- CALTHORPE**, 10hp, purmasco 1921, 4 seater, sports, self-starter, dynamo lighting; this car is unscratched, and as brand new in every way, specially finished light grey, dome wings, concealed hood, electric horn, and complete set of tools, disc wheels, owner must sell, £265. 69 St. Paul's Ave., Willesden Green, London. 484-a107
- CALTHORPE**, 10hp, late 1921, sports, 4 seater, self-starter, dynamo, been very little used, 5 detachable disc wheels and tyres, electric horn, Retax hood, licensed, runs beautifully, owner will accept 300 guineas for urgent sale. 69 St. Paul's Ave., Willesden Green, London. 484-a106
- CALTHORPE** coupe, 175 guineas, 10hp, dynamo and starter 1917, splendid order; exchanges or E.P. Short, 487-493 Upper Richmond Rd., East Sheen, S.W. 14. Phone, Richmond 2362. 484-39
- CALTHORPE** 1922, 4 seater, de luxe, mileage under 200, fully guaranteed, £395. See below.
- CALTHORPE**, 1921, 4 seater, sports, dynamo lighting starter and horn, 5 detachable discs, spare and cover, as new, 2 Magnum covers on rear, extras, side curtains, J.M. shock absorbers, clock, speedometer, dash lamp, Bowden extra air, bulb horn, tax paid December, 1922, £320. Stretton and Smith, 12 Woodstock St., Oxford St., W. 1. 484-21
- CALTHORPE** Minor, 1915, 10hp, 2 seater, dickey, dynamo lighting, overhauled, bargain, £160. Rolls, 4 Little Cadogan Pl., Belgrave Sq., S.W. 1. 484-10
- CALTHORPE**. Smith and Hunter have 1920 2 seater, lighting, starter, speedometer, luggage grid, every accessory, £210; several other bargains. Calthorpe Agents, 77 Gt. Portland St. Langham 2363. 484-989

**SECOND-HAND  
LIGHT CARS AND CYCLECARS FOR SALE**

(continued).

- CARDEN**, 1921, No. 702, only run 300 miles, £95. 63 Stewart Rd., Bournemouth. 484-k966
- CARDEN**, 1921, electric, hood, horn, perfect, fast, done 500 cash wanted, 65 guineas. 198 Sheen Lane, Mortlake. 484-g476
- CARDEN** Service Depot. Officially appointed repairers by the Carden Engineering Co. for London. Full range of spares carried. New and second-hand machines always in stock. Clarence A. Hall, late London repairs manager to the Carden Engineering Co., 21 Queensberry Mews East, South Kensington. Carden oiling systems, new type drip feed, £3 10s. fitted, 700 m.p.g.; spring seats, 37s. 6d. and many other improvements. Above. 484-63
- CARDEN**, 1921 (October), de luxe, spare wheel, electric lighting, not run 200 miles, £82 10s. Phone, Wanstead 403. Junction Garage, Highstone, Leytonstone. E11. 484-51
- CARDEN**, 1921, 2 seater, electric lighting, very small mileage, exchanges. Newham Motor Co., 223 Hammersmith Rd., W.G. Phone, Hammersmith 80. 484-947
- CASTLE THREE**, 4 cylinder, dynamo lighting, guaranteed in perfect mechanical condition, mileage negligible, price £175. Cornwall: Town Hall Parade, Edmonton, N.9. 485-874
- CASTLE THREE**, 1921, new November 4 cylinder, dynamo lighting, spare wheel (unused), mileage under 600, chassis newly back from manufacturers, having had all 1922 improvements fitted, licensed, insured till January, 1923, £180. Harris, 12 West Savile Ter., Ladbroke, W. 484-150
- CHARRON**, 1915, 9hp, 2 seater coupe, dark blue, upholstery blue leather, dynamo lighting, self-starter, detachable wheels, speedometer, all accessories, in first-class condition, £260. Griffiths, Harrison and Co., 1 Albemarle St., London, W. Phone, Regent 528. 484-872
- CHARRONETTE**, 1914, 8hp, excellent mechanical condition, fully equipped, 35 m.p.g., nearly new tyres, £130 or near offer. Plastons, South Rd., Southall. 484-35
- CITROEN**, 1921 coupe, Bedford cord upholstery, mileage 700, practically new, many extras, £315. Pickworth and Hull, 23 Gt. Queen St., Kingsway, Regent 3193. 484-984
- CITROEN**, 1921. Smith and Hunter have 4 seater, lighting, starter, speedometer, perfect, £265. 77 Gt. Portland St. Langham 2363. 484-987
- CLULEY**, 1 shop-soiled (run 500 miles only) de luxe 2 seater, double dickey, dynamo and starter, licensed 1922, £385. Light Car Co., 331 Euston Rd., London. 484-95
- COVENTRY-PREMIER** runabout, 1921, splendid condition, £120. 63 Stewart Rd., Bournemouth. 484-k969
- COVENTRY-PREMIER**, shop-soiled only, including speedometer, free insurance and delivery, £215. Dan Guy, Weymouth. zzz-757
- COVENTRY-PREMIER**, Cass's Motor Mart, Ltd. 1921 3 wheeler, unused, dynamo lighting, spare wheel, painted cream, very attractive, offered terms, exchanges, put or take cash, bargain to clear, £195; 40 cars in stock. 5 Warren St., W. 1. Museum 623. 484-977
- COVENTRY-PREMIER** 4 wheeler, latest 1922 model, demonstration only, speedometer and insurance, £205. Roys, of Euston Rd. (378-384). Phone, Museum 6436. 484-919
- COVENTRY-PREMIER** 4 wheeler, very little used, everything complete (except no dickey seat), sacrifice, £205. Frank Whitworth, Ltd., 139 New St., Birmingham. zzz-704
- COVENTRY-PREMIER**, 1921, 3 wheeler, dynamo lighting, spare wheel, speedometer, clock, dickey, mileage only 700, £160. R. J. Hillier, 9 Wallingford Ave., North Kensington. 484-a123
- COVENTRY-PREMIER**, 1921, 2 seater, spare wheels, in splendid condition, full year's tax paid, all tyres new, £135. 69 St. Paul's Ave., Willesden Green, London. 484-a104
- COVENTRY-PREMIER**, October, 1920, perfect condition throughout, done 5,500 miles, speedometer, clock, electric side, dashboard and tail lights, side outstays, tyres good, tax paid, £170. Craddock, 64 Lysons St., Walsall, Staffordshire. 484-a163
- COVENTRY-PREMIER**, 3 wheeler, July, 1921, dynamo lighting, dickey, spare wheel, perfect, as new, fully insured, £175. (No dealers.) Huggett, 84 Tachbrook St., Westminster. 484-a144
- COVENTRY-PREMIER**, 1921, 3 wheeler, dickey, dynamo lighting, spare wheel, new condition, £147 10s. 12 Kendrick Mews, South Kensington Station. Ken. 7276. 484-9
- COVENTRY-PREMIER**, 1921, 8hp, 3 wheeler, dynamo, dickey, spare wheel, as new, £175 10s.; deferred payments. Parker's, Bradshawgate, Bolton; also 145 Deansgate, Manchester. 484-3
- COVENTRY-PREMIER**, 1921, 3 wheel super runabout, in good running order. Palaret, Kenton, Devon. 484-a26
- CROSSLEY** 9.5hp chassis, 4 cylinder on bloc, enclosed valves, enclosed cardan drive, gate change, 760 by 80 wire wheels, used demonstrations only, £100. Harcoppe Motors, 10 Park Rd., West Dulwich, S.E. 21. 484-967
- CROUCH** 9hp 1921 2-3 seater, grey, black wings, electric lighting, variable ignition, fully equipped, nice condition throughout, bargain, £160. Mebes and Mebes (Est. 1893), The Original Light Car Specialists, 144 Gt. Portland St., W. 1. Phone, Langham 2230. 484-910
- CROUCH** 1921 2 seater, 5 wheels, new tyres, equipped, fast, smart, 105 guineas. 198 Sheen Lane, Mortlake. 484-g474
- CROUCH** 85 guineas; genuine 1914 2-3 seater, 5 wheels, equipped, smart, reliable, any examination, trial. Seabridge. (See "Exchange") 484-188
- CROUCH** 1914 2 seater, electric lighting, real good order, £75. Light Car Co., 331 Euston Rd., London. 484-66
- CROUCH**, 1921, 2-3 seater, in perfect running order, several spares, £145, or near offer, bargain. Cherratt, Clerdon, Bracknell, Berks. 484-a109
- DE MARCAY**, 1921, 8hp, dynamo lighting, 5 detachable wire wheels, original tyres as new, in splendid condition, £125; exchanges, easy terms. Allier Garage, Thornsett Rd., Earlsfield, London, S.W. Phone, Latchmere 4388. 484-31

**SECOND HAND  
LIGHT CARS AND CYCLECARS FOR SALE  
(continued).**

**DOUGLAS**, 1921, body newly painted deep blue, 2-3 seater, with roomy dicky, engine in especially good tune, 4 speed gearbox, capable 50 miles per hour with full load on ordinary roads, easy in traffic, special heating mull on induction pipe, self-starter and lighting set (C.A.V.), special set of Riley wheels (5), complete with covers and tubes, lamps, pump, jack, and usual tools. Very roomy and weather-tight, an ideal and economical car for family use; this car has won 2 medals in open competition last year. Write, Box No. 2085, c/o. "The Light Car and Cyclecar." zzz-770

**ELMSCOTE**, 1921, 2 seater and dicky, Lucas dynamo, 5 detachable wheels, 60 miles per gallon. Kyle, 4 Denman Pl., Piccadilly. Reg. 886. 484-46

**ENFIELD** 10hp 2 seater, dicky, dynamo lighting, 6 Sankey detachable wheels, fully equipped, splendid little car. £175. Law, 68 Frampton Park Rd., Hackney. 484-192

**ENFIELD**, 1916, 10hp, 5 seater cloverleaf, Rotax dynamo lighting, detachable wire wheels, £135. 12 Kendrick Mews, South Kensington Station. Ken. 7276. 484-8

**GIBBONS**, late 1920, 2 seater, electric lighting, good condition, quick sale, 55 guineas. Moment, 28 Blithor St., E.C.5. Phone, Avenue 102B. 484-27

**G.N.**, 1921 standard, with dynamo lighting, small dicky seat, all accessories, overhauled, £165 cash, or £34 15s. deposit and 11 payments of £12 9s., less rebate. Service Co., 292 High Holborn, W.C.1. zzz-675

**G.N.**, 1921 car, in excellent order throughout, fitted with dynamo lighting, etc., tyres in excellent order, low price for cash sale, £140.

**G.N.**, 1921, similar to above, but fitted with paraffin and acetylene lamps, car in excellent condition throughout, low price for cash sale, £150. Grace, Ltd., Northampton. zzz-653

**G.N.**, 1914, special model, 4 speeds, full equipment and spares, clean chubs Devon Hills, perfect condition, prizes last year. 37 Catherine St., Salisbury. 484-170

**G.N. De Luxe**, March, 1921, dynamo lighting, speedometer, clock, hood, windshield, 5 detachable wheels, all fittings plated, excellent condition throughout, low mileage, £157 10s. Scun, 436 Whitehorse Rd., Thornton Heath. 484-168

**G.N.**, 1921, Popular model, small mileage, complete with dynamo lighting, 2 windcreens, spot light, mirror, splendid order, £165. Mauds', 100 Gt. Portland St., London. 484-84

**G.N.**, 1921, standard with electric lighting, speedometer, etc., has just been overhauled, in perfect running order, £135. Davenport and Ashford, 15 Little James St., Holborn, W.C. 1. Phone, Museum 5839. zzz-911

**G.N. F.O.C.H.** have 1920 G.N., dynamo, discs, overhauled, bargain, 5 Hush St., Hampstead (near Tube). 484-970

**G.N.**, dark blue, aluminium bonnet, dynamo, spare wheel, smart, very good order, £145, trial by appointment. Langham 2955, 12 Cornwall Terrace Mews, rear Baker St. Station. 484-49

**G.N.**, 1920, speedometer dynamo, choice of 2, £132 10s. Roy's of Histon Rd. (378-384). Phone, Museum 6436. 484-920

**G.N.**, 1921, dynamo, speedometer, choice of 2, £142 10s. Roy's of Histon Rd. (378-384). Phone, Museum 6436. 484-921

**G.N.**, 1921, touring, dynamo lighting, spare wheel, speedometer, clock, aluminium dash, disc, £140. Hillier, 9 Wallingford Ave., North Kensington, W. 10. 484-124

**G.N.**, late 1920, dynamo lighting, overhauled, new tyres, fully equipped, £120, bargain. 143 Ravensbury Rd., Earsfield, S.W. 18. 484-117

**G.N.**, 1921, de luxe, dynamo lighting, spare wheel, every possible accessory, any trial, £154. 24 Balliol Rd., North Kensington. 484-110

**G.N.**, 1921, D.A. lighting, speedometer, perfect running order, £115. 88 Park Rd., Dulwich. 484-157

**G.N.**, 1921, dynamo lighting, speedometer, very good condition, £125. A.S.C. 166 Gt. Portland St., W. 1. Tele, Museum 6626. 484-42

**G.N.**, Smith and Hunter have an excellent 1920 model, dynamo lighting, repainted, £130. 77 Gt. Portland St. Langham 2365. 4 84-992

**G.N.**, 1921, touring, fitted 5 wheels, dynamo lighting, speedometer, this machine is in perfect condition and open to any inspection, £138. Write, Dawn, 38 Burlington Rd., Westbourne Grove, W. 484-a31

**GRAHAM WHITE** cyclecar, 1921, painted red, special screen, hood, valances, luggage grid, accumulator lighting, comfortable, absolutely dependable, takes 2 people anywhere at 18 m.p.h., average 70 miles per gallon, genuine bargain at £80; trial by appointment. Allen, 154 Lower Addiscombe Rd., Croydon. Telephone 117. 484-a159

**G.W.K.** 1916 2-5 seater, De Luxe model, just overhauled and re-upholstered, expert examination invited, seen any time, £125 or offer; bought 5 seater. Dentistry, 769 Roinford Rd., Manor Park, London, E. Phone, Ilford 500. 484-b669

**G.W.K.** 1921 4 seater, used demonstration, better than new, £260. Langney, Oswestry. 484-1960

**G.W.K.**, 4 seater, perfect throughout, dynamo lighting, many extras, cheapest G.W.K. ever offered, bargain at £185, any trial. Cornwallis, Town Hall Parade, Edmonton, N.5. 485-875

**G.W.K.** 1921 2 seater, double dicky, speedometer, many extras, perfect condition throughout, £165 or offer, quick sale owing to owner's departure from England, B. Applequist, 90 Cornwall Gdns., S.W. 7. Phone, Western 4547. 484-a178

**G.W.K.**, 1914, 2 seater, well kept, thoroughly reliable, £100 or near cash offer. Bunting's Exchange, Wealdstone. 484-57

**G.W.K.**, September, 1921, 4 seater, mileage 900, licensed, £20 extras, perfect, unscratched, £270. Highburke, Chelmsford. 484-a24

**G.W.K.** 1921 4 seater, first-class order, £220. Royston Lodge, Ellis Rd., Clacton-on-Sea. 484-a19

**G.W.K.** 1913 2 seater, just repainted, upholstered, essential engine parts recently renewed, nearest £120. Patterson, Deal House, Wellington College, Merks. 484-1417

**G.W.K.**, 1918-1919, ideal tradesman's van, mechanically sound throughout, 1922 tax paid, fully equipped, with spare wheel, lamps, etc., etc., any trial, £125 or near offer. R. G. Gamble and Co., 13 Somers Mews, Cambridge Terrace, Edgware Rd., W. 2. Phone, Fadd. 899. 484-a1

**G.W.K.**, 1914, 2 seater, perfect condition, runs splendidly, electric lighting, speedometer, Stepieny, special body, tax paid, £120 or near offer. Davis, 22 Brookville Ave., Bredensbury Park, N.W. 6. 484-a96

**G.W.K.**, October, 1920, 4 cylinder, 4 seater, dynamo lighting, in perfect order and in new condition, little used, many extras, £195 or nearest. Write, 108 Emmanuel Rd., Balham, S.W. 12. 484-a114

**SECOND HAND  
LIGHT CARS AND CYCLECARS FOR SALE  
(continued).**

**G.W.K.**, 1914, smartest on road, re-enamelled, properly overhauled, upholstery refaced, oversize tyres, spare wheel, all accessories, £89. Doctor Thomas, Acres, Bradfield, Berks. 484-a115

**G.W.K.** 2 seater, overhauled, repainted, very fine condition, £120; exchanges. 7 Victoria Rd., Guildford. 484-47

**HILLMAN**, £365, Speed model, 1921 model, polished aluminium body, dynamo lighting set, outside exhaust pipe, in excellent condition, several extras, including shock absorbers, brand-new tyres on rear wheels, wings recently repainted, any trial or inspection, special gear ratios and carburetor. Box No. 7695, c/o. "The Light Car and Cyclecar." zzz-646

**HILLMAN** 1914 9.5 2 seater dicky, clock, speedometer, electric side lamps, excellent condition, £175, trial given. G. Walpole, 12 Wimbledon Rd., Tooting. Phone, Wimbledon 1264. 484-a169

**HORSTMAN**, 200-mile racer, actual car to finish fifth, perfect order, speed guaranteed over 80 m.p.h., price £450; modern light car exchange entertained. Hawkes, Box No. 5030, c/o. "The Light Car and Cyclecar." zzz-178

**HORSTMAN**, 1920, late, 2 seater, starter and lighting, perfect condition, £235; terms, exchanges. Midland Garage, 7 Broad St., Birmingham. zzz-310

**HORSTMAN**, 9hp, 4 cylinder, sporting 2 seater, head and side lamps, detachable wheels and spare, hood and screen, foot-starter, in splendid order, any trial, £130. C.S., 14 Swatan Rd., Bow, E. 3. Tel, E3155. 484-a100

**HUMBERETTE** Spare Parts Dept. Repairs and replacements, overhauls, repainting. Inquiries invited for second-hand cars.

**HUMBERETTE** Humber Service Depot, Carterbury Rd., Kilburn, N.W. 6. Phone, Willesden 1298-1299. Telegrams, "Humberette, London." zzz-1939

**HUMBERETTE**, water cooled, complete, lamps, etc., good condition, great bargain, £60. Longney, Oswestry. 484-1962

**HUMBERETTE**, a beautiful little car, water cooled and in lovely trim, £100. Bunting's Exchange, Wealdstone. 484-58

**HUMBERETTE**, a.c., lamps, horn, etc., back axle recently overhauled, trial, £70 or offer. Thomas, New Court, Trinity, Cambridge. 484-a150

**HUMBERETTE**, 1915, 8hp, 2 seater, a.c., good tyres, Stepieny, complete with all accessories, in splendid condition, £65; exchanges, easy terms. Aliber Garage, Thornsett Rd., Earsfield, London, S.W. Phone Latchmere 4388. 484-32

**JOWETT** 1921 2 seater, dynamo lighting, fine condition, £220. Stretton and Smith, 12 Woodstock St., Oxford St., W. 1. 484-19

**JOWETT**, 2 seater, dynamo lighting, perfect condition licence paid, 1922, and extras, £250. 137 Noel St., Nottingham. 484-a38

**KENSINGTON** complete new light car chassis, G.W.K. type, friction drive, well sprung, Michelin detachable disc wheels, 10hp 4 cylinder engine with brass bull-nose radiator, set of dome wings, steering, etc., bargain, £68. Blake, 216 Westbourne Grove. 485-148

**KINGSBURY** 1920 2 seater, licence paid, £170. Caffyns, Ltd Eastbourne. 488-145

**KINGSBURY JUNIOR**, 1921, done 500, equal new, £175. Longney, Oswestry. 484-1961

**KINGSBURY JUNIOR**, 8hp, water cooled 1921, 2 seater car, very little used, mileage 1,400, dynamo lighting, detachable wheels and 1 spare wheel, offers. H. R. Moore, Ltd., Northgate End, Bishop's Stortford. 485-a15

**KINGSBURY JUNIOR**, 1921, 2 seater, dynamo lighting, splendid condition, £150. Hills Rd. Garage, Cambridge. Tel. 690. 485-a121

**LAGONDA**, 11.9 coupe, 4 cylinder, 3 speeds and reverse, 5 wheels and tyres, good order, unlicensed, £98 10s. Holdsworth, 160 Dudwell Lane, Halifax. 484-92

**LAGONDA**, 1919 (October), 11hp, 4 seater, dynamo lighting, speedometer, excellent condition, £215, exchanges. Newham Motor Co., 225 Hammersmith Rd., W. 6. Phone, Hammersmith 80. 484-945

**LAGONDA** 1922 coupe, mileage under 200, absolutely unscratched, fully granted, £365. Stretton and Smith, 12 Woodstock St., Oxford St., W. 1. 484-20

**LAURENCE-JACKSON**, late 1921, Lucas dynamo lighting, aluminium bonnet, condition like new, £150; terms, exchanges. Midland Garage, 7 Broad St., Birmingham. zzz-311

**LAURENCE-JACKSON** 1920 8hp 2 seater, electric lighting, £120. Saunders Garage, Golders Green. 484-62

**LAURENCE-JACKSON** 2 seater, cost £300 in 1920, price £105. Langham 2955, 12 Cornwall Terrace Mews, rear Baker St. Station. 484-a11

**LUCAR**, 1915, 10hp, light car, detachable wheels, dynamo lighting, good order, any trial, £160. Batchelor, Clarence St., Kingston-on-Thames. 484-a184

**MASCOTTE**, 1920, 11.9hp, clover-leaf, 3 seater, detachable rims, Dorman engine, whole car in excellent order throughout, £150. Grose, Ltd., Northampton. zzz-630

**MATHIS** 1914 2 seater, dynamo, 5 wheels, live axle, sound, repainted, recommended, £155. 198 Sheen Lane, Mortlake. 484-g473

**MATHIS-B.A.C.** 1921 8hp 2 seater, electric light, starter, excellent condition in all respects, £500. Haswell, Chatsworth, Seymour Rd., Plymouth. 485-a142

**MERCURY**, list price £425, our price £220; 2 seater and sunk dicker, four-cylinder 10hp, dynamo lighting, detachable wheels many extras, nearly new; exchanges or E.P. Short, 487-493 Upper Richmond Rd., East Sheen, S.W. 14. Phone, Richmond 2362. 484-40

**MERRALL-BROWN** 1920 2 seater, 4 cylinder, tax paid, £125. Overend and Colton, Gratton Mews, Warren St., W. 1. 484-a193

**MORGAN** Service Depot. Officially appointed repairers by the Morgan Motor Co. for London. Full range of spares carried. New and second-hand machines always in stock. Trade supplied. Official agents, Homan's, 245 Lower Clapton Rd., E. 5. Dalston 2408. zzz-580

**MORGAN** specialists, James and Co. (Sheffield), Ltd., 263 Ecclesall Rd., Sheffield. Telephone, Central 2460. Good stock of spares carried. If in difficulty wire us. New and second-hand machines nearly always in stock. zzz-864

**MORGAN**, 1919, Grand Prix, 8hp J.A.P., water cooled, acetylene lighting, excellent condition, £125. 8 Prince's Rd., Heaton Moor, Stockport. 484-a6

**MORGAN**, J.A.P. a.c., all on, fine condition and appearance, £85. 14 Bentley Grove, Meanwood, Leeds. 484-a2

**THE BEST BARGAINS** in second-hand light cars and cyclecars are offered in these pages

**SECOND HAND  
LIGHT CARS AND CYCLECARS FOR SALE  
(continued).**

**MORGAN** de Luxe, 1914, air-cooled, electric lamps, sound order, £90. Maude's. Below.

**MORGAN**, 1920, De Luxe, J.A.P., 8hp, lamps, horn, discs, £120. Maude's, Walsall Garage, Walsall. 484-81

**MORGAN**, 1919, Aero model, brand new, 10hp water-cooled M.A.G. engine, all lamps and horn. Maude's. Below.

**MORGAN**, 1917, Grand Prix, 8hp J.A.P., water-cooled, all lamps, overhauled and repainted, £145. Maude's. Below.

**MORGAN**, 1919, De Luxe, 8hp J.A.P., water-cooled, lamps, horn, speedometer, red and black, £150. Maude's. Below.

**MORGAN**, 1920, De Luxe, 8hp M.A.G. water-cooled, all lamps, horn, speedometer, special oversize tyres, special luggage carrier, overhauled and repainted, £155. Maude's, 100 Gt. Portland St., London, W. 1. 484-82

**MORGAN** De Luxe, 1921, w.c. M.A.G., acetylene lighting, horn, hood, screen, etc., £155. Elco, Ltd., 15-16 Bishopsgate Avenue, Camomile St., E.C. 3. Phone, Avenue 5548. 484-937

**MORGAN** De Luxe, 1920, full equipment, excellent condition, £130. Rey's, of Euston Rd. (378-384). Phone, Museum 6436. 484-918

**MORGAN** Grand Prix, 1920, full equipment, excellent condition, £125. Rey's, of Euston Rd. (378-384). Phone, Museum 6436. 484-922

**MORGAN** 1921 de Luxe, M.A.G. water-cooled engine, speedometer, disc, very fast, £140. Hillier, 9 Wallingford Ave., North Kensington. 484-122

**MORGAN**, 1921, G.P., 10hp M.A.G. engine, most lavishly equipped, £145. 24 Balliol Rd., North Kensington. 484-109

**MORGAN**, G.P., December, 1920, dynamo lighting, special exhaust, fixed handle, discs, hood, windscreen, guaranteed as new throughout, very fast, £145, exchange considered, 7 Cowdrey Rd., Wimbledon. 484-162

**MORGAN**, family model, 1920, J.A.P. water-cooled, 3 acetylene and 3 electric lamps, screen, hood, hood cover, tax paid 1922, guaranteed perfect, £150 or nearest. Acton, Brookfield, Bakewell. 484-158

**MORGAN**, special successful competition machine, G.P., late 1920, being repainted light grey at makers, absolutely as new, any trial, dual lighting, very many extras, spare covers, brand new Magnums, discs, special J.A.P. engine, aluminium pistons, etc., £165. Douglas Prentice, 22 Harborne Rd., Edgbaston, Birmingham. 484-148

**MORGAN**, G.P., 1922, Lucas dynamo lighting, aluminium dashboard, fully equipped, show model with super finish, cost £220, offers, or exchange for combination. 32 Woodside Rd., Kingston. 484-146

**MORGAN**, 1917, Grand Prix, 8hp J.A.P., splendid order, smart, any trial, £135, motorcycle part. The Haven, 120 Sutherland Rd., W. Croydon. 484-145

**MORGAN**, 1917, G.P. model, discs, electric light, horn, overhauled, repainted, in good condition, will drive 50 miles to purchaser, Liverpool district, £105, no offers. Box No. 7728, c/o "The Light Car and Cyclecar." 484-141

**MORGAN**, 1920, Grand Prix, M.A.G., acetylene and electric, speedometer, clock, aluminium dash, Dunlop Magnums, very smart, £145. Clark, 7 Exhibition Rd., S.W. 7. 484-53

**MORGAN**, late 1921 2 seater, fitted with speedometer, acetylene lamp and generator, Klaxon horn, etc., chassis and engine in perfect condition, coachwork practically unscratched, a genuine bargain, £150. Full particulars by post. Herbert Robinson, Ltd., Regent St., Cambridge. 484-15

**MORGAN**, 1921 Aero Special, Lucas dynamo, hood, full aluminium instrument board, cost £285, Michelin tyres, discs, £165, no offers. 61 Netherhall Gardens, Hampstead 566. 484-63

**MORRIS-OXFORD** 2 seater, complete, lamps, spare wheel, good tyres, excellent condition, not used during war, bargain, £160. Longney, Oswestry. 484-k959

**MORRIS-OXFORD** 1914 2 seater, dynamo lighting, £125. Overend and Cotton, Grafton Mews, Warren St., W. 1. 484-195

**MORRIS-OXFORD** 2 seater, dynamo, really good, smart, £135. 12 Cornwall Terrace Mews, rear Baker St. Station. 484-112

**MORRIS-OXFORD**, 1914, 10hp, thoroughly overhauled, and in perfect running order, £110. Townsheds, Albion Mills, Worcester. 484-429

**PALMERSTON**, 1920, Ask for particulars. Cost £275 selling at £80. 62 Stewart Rd., Bournemouth. 484-k968

**PERRY** 1914 wide 2 seater, electric lighting, detachable Sankey wheels, recently overhauled and painted, 100 guineas. Kyle, 4 Denman Pl., Piccadilly. 484-36

**PEUGEOT** 11hp 4 seater, 4 speeds, electric starter and lighting equipment, blue, perfect, any expert examination, run only 800 miles, chassis and body work as new, must sell, £400. Douglas Prentice, 22 Harborne Rd., Edgbaston, Birmingham. 484-149

**RICHARDSON** 1921 2 seater and dickey, 4 speeds, reverse, powerful electric and gas lighting, clock, speedometer, disc wheels, as new, trial, what offers? Box No. 7498 c/o "The Light Car and Cyclecar." 484-37

**ROVER** 8, 1921, been very little used, can warrant as new, £175; exchange Morgan or combination. Bunting's, Walsall. 484-56

**ROVER**, F.O.C.H. have a Rover 8, excellent condition, tax paid; cash or exchange. 5 Heath St., Hampstead (near Tube). 484-971

**ROVER** 8hp, standard equipment, also speedometer, side curtains and other extras, guaranteed perfect, £155. Martin, 10 Herbrand St., W.C. Museum 6594. 484-969

**ROVER**, 1921 (June), mileage 1,700, condition equal to new, perfect running order, licence paid until end of year, insured till June, impulse starter, speedometer, many extras, bargain, £190 cash; garage £8 W. London. Box No. 7708, c/o "The Light Car and Cyclecar." 484-118

**ROVER** 8hp 2 seater, 1921 car, dynamo lighting, detachable wheels, etc., as new, used for demonstration purposes only, £195. H. R. Moore, Ltd., Northgate End, Bishop's Stortford. 485-114

**ROVER**, 1921, fully equipped, small mileage, £160.

**ROVER**, 1921, fully equipped, speedometer, clock, dash lamp, many extras, mileage under 2,000, bargain, £175. L. H. Pugh, 9 South Molton St., London, W. Mayfair 4433. 484-28

**ROVER**, Smith and Hunter have 8hp, 1922, hardly used, as new, £210. Below.

**ROVER**, 1921, 8hp, brand new, £200. Below.

**ROVER**, 1921, 8hp, 2 seater, dynamo lighting and speedometer, perfect little car, £165. Smith and Hunter, 77 Gt. Portland St., Langham 2363. 484-990

**SECOND HAND  
LIGHT CARS AND CYCLECARS FOR SALE  
(continued).**

**ROVER** 8, 2 seater, dynamo, any trial, £160. 12 Cornwall Terrace Mews, rear Baker St. Station. 484-113

**ROVER**, 8hp, 1921, splendid condition, £162 10s. Rey's, of Euston Rd. (378-384). Phone, Museum 6436. 484-923

**ROVER**, 1921, 8hp, new tyres, side curtains, £150. Albany Mills, Oldham. 485-a30

**ROVER**, 1922, 8hp, 2 seater, painted buff, equal to new, only run few hundred miles fitted with speedometer, aluminium number plates and registered, any examination and trial, guaranteed perfect, offered for quick sale, £200. Fryer, Leominster. 484-939

**ROVER** 8, 1921, privately owned, coupe fittings, new oversize tyres, spare wheel unused, speedometer, spring gaiters, mats, tax paid 1922, insurance, beautiful condition, perfect every way, 170 guineas lowest. Colombatti, 28 Pembroke Sq., W.2. Park 4101. 484-227

**SINGER** 1914 2 seater, renovated and repainted as new, new tyres, dynamo electric lighting, £175. Callins, Ltd., Eastbourne. 488-145

**SINGER** coupe, 1920, self-starter, repainted as new, dark blue, £350. Callins, Ltd., Eastbourne. zzz-591

**SINGER**, 1921, 10hp, beautiful car, little used, self-starter, 5 electric lamps, speedometer, like new, £280 or nearest offer; no dealers; insured. Dr. Kirtlan, 70 Queen's Rd., Portsmouth. 485-175

**SINGER**, 1919-20, dynamo lighting, self-starter, overhauled and repainted, £235 cash, or £49 deposit and 11 payments of £17 15s. 3d., less rebate. Service Co., 292 High Holborn, W.C.1. zzz-538

**SINGER**, Sol 1919 10hp, mileage 8,500, electric lighting and starting, 2 new tyres, 3 done about 1,000, all accessories, £200, or part exchange 1922 Morris-Oxford. Townsend, 84 Grove Rd., Millhouses, Sheffield. 484-186

**SINGER** 1920 coupe, upholstered Bedford cord, dynamo lighting and starter, total mileage under 5,000, in perfect condition, price £255. Brynston Garage, London's Model Garage, Crawford Pl., Edgware Rd., W. 1. Padd. 929. 484-964

**SINGER**, 10hp, dynamo lighting, 2 seater and dickey, splendid running order, any trial, £150 secures. Goodhall, 3 Cambridge Terrace Mews, Albany St., N.W. 1. 484-235

**SINGER**, 1920, double screen, dynamo lighting and starter, like new, £235. Langham 2933. 12 Cornwall Terrace Mews, rear Baker St. Station. 484-110

**SINGER** magnificent coupe, late 1920, almost new, unscratched, self-starter and lighting, upholstered Bedford cord, suit doctor or lady, cost £675, sacrifice £295. 31 Claremont Rd., Alexandra Park, Manchester. 485-119

**SINGER**, 10hp, late 1920, self-starter, dynamo; this car is unscratched and as new in every way, very comfortable 2 seater body and dickey, double windscreen, exceptionally powerful starter on flywheel, all new tyres, very latest type, owner will accept £215. 69 St. Paul's Ave., Willesden Green, London. 484-105

**SINGER** 10hp, dynamo lighting, 5 detachable wheels, hood, screen, etc., any trial, £135. C.S., 14 Swaton Rd., Bow, E. 3. Tel., E. 3155. 484-999

**SINGER**, 1916, 10hp, 2 seater with dickey, dynamo lighting, practically all new tyres, just overhauled and repainted, £145. 24 Observatory Rd., East Sheen. Richmond 2379. 484-55

**SINGER** 1920 coupe, dynamo, starter, dickey, many extras, new condition, £300; deferred payments. Parker's, Bradshawgate, Bolton; also 245 Deansgate, Manchester. 484-4

**SINGER**, 10hp coupe, late 1919, lighting, starting, any trial, bargain, private, £235. Spence, 288 East Park Rd., Leicester. 484-a34

**STANDARD** 1918 9.5 2 seater, £260. Callins, Ltd., Eastbourne. zzz-390

**STANDARD** spare parts; everything for the 9.5hp model. Pychley Autocar Co., Ltd., 42a Walmer Rd., North Kensington, W. 10. Park 1299. zzz-703

**STANDARD**, late 1920, 2 seater, starter and lighting, perfect condition, long wheelbase, £325; terms, exchanges. Midland Garage, 7 Broad St., Birmingham. zzz-312

**STANDARD**, F.O.C.H. have 1919 Standard 2 seater and dickey, all-weather, dynamo and starter, splendid condition, year's tax paid, bargain. 5 Heath St., Hampstead (near Tube). 484-972

**STELLITE**, late 1920, mechanically perfect and repainted like new, £290. Smith, 3 St. James's Sq., Manchester. 484-a25

**STELLITE**, Cass's Motor Mart, Ltd., 1919 2 seater, dickey, painted blue, dynamo lighting, speedometer, just overhauled, magnificent condition, tax paid to December, deferred terms, exchanges, put or take cash, £240; 40 cars in stock, 243 Brompton Rd., S.W. 3. Kensington 2194. 484-979

**STELLITE**, 10hp, July, 1919, 2 seater, with dickey, 3 speed, dynamo lighting, in excellent condition and appearance, £220. Telford Garage, 47 Streatham Hill, S.W. 2. 484-958

**SWIFT** 1921 10hp 2 seater, double dickey, starter and lighting, speedometer, horn, £300. Maude's, Walsall Garage, Walsall. 484-85

**SWIFT**, 8hp, twin, water cooled, 2 seater, dynamo lighting, detachable rims, excellent condition, guaranteed, £85. Ariel Motors and General Repairs, Ltd., 182 New Cross Rd., S.E. 14. 484-933

**SWIFT**, 8-10hp, 2 cylinder, coach-built 2 seater body, hood, screen, electric lamps, in excellent condition, £80. Griffiths, Harrison and Co., 1 Albemarle St., London, W. Phone, Regent 528. 484-963

**TAMPLIN**, 1921, like new, approximate mileage 500, hood, screen, lamps, horn, disc wheels, £110 cash, or £25 2s deposit and 11 payments of £8 6s, less rebate. Service Co., 292 High Holborn, W.C.1. zzz-811

**TAMPLIN**, 1920 condition perfect, speed a revelation, £80. 63 Stewart Rd., Bournemouth. 484-k967

**WARREN-LAMBERT**, £255. 1921 11hp 2 seater, hood, screen, Lucas dynamo lighting, 5 disc wheels, speedometer, etc., mileage only 3,700. Faultless mechanical condition, speed 50 m.p.h. and especially fast on hills, comfortable, and holds the road well, deliver 100 miles, cost £435; first-class motorcycle part payment accepted. Solwaybank, Hayes, Kent. Phone, Bromley 532. 484-277

**WOLSELEY**, 1922 Popular Ten, 2 seater, dynamo, as new, run 200 miles only, £365. Light Car Co., 331 Euston Rd., London. 484-68

**WOLSELEY**, Smith and Hunter have 1921 2 seater, 10hp, lighting, starter, speedometer, clock, perfect and licensed to 1923, £360. Portland St., Langham 2363. 484-986

NEW LIGHT CARS AND CYCLECARS.

NEW LIGHT CARS AND CYCLECARS

(Continued).

**A.B.C.** latest models, lowest prices, immediate delivery; cash or deferred payments. Taylor's, Ltd., 52-53 Sussex Pl., S.W. 7. Phone, Kens. 7260.

**A.B.C.** Sports model, £295 cash, or £62 deposit and 11 payments of £22 5s., less rebate. Service Co., 292 High Holborn, W.C. 1. zzz-485

**A.B.C.**, Sports model, shop soiled only, to be cleared, accept £265. Loxhams Garages, Fishergate, Preston. Tel. 1288. 484-498

**A.B.C.** Smith and Hunter, agents, can supply 1922 cars from stock. Sports models, £295; double dickey £7 extra; standard models, £325. Easiest deferred terms over 18 months. 77 Gt. Portland St. Langham 2365 484-994

**A.C.** 2 and 4 seaters, 1922 models, in stock. Caffyns, Ltd., Eastbourne zzz-438

**A.C.**, 1922, all models. Offord, 94 Gloucester Rd., S.W. 7. Kensington 642 zzz-622

**A.C.** The Lancaster Motor Co.

**A.C.** specialists.

**A.C.** cars. All models. All-weather 2 seater, £550.

**A.C.** all-weather 4 seater, £575.

**A.C.** coupe, £650, the smartest coupe on the road.

**A.C.** sports model, £575, a really elegant sporting car

**A.C.** Exchanges and deferred payments arranged.

**A.C.** Authorized repairers.

**A.C.** The Lancaster Motor Co., 158 Norwood Rd., West Norwood, S.E.27. Phone, Streatham 2541. 494-825

**A.C.** Autoveyors, Ltd., 84 Victoria St., Westminster, S.W. 1.

**A.C.** All models actually in stock. Autoveyors, Ltd.

**A.C.** 1922 three-quarter coupe, painted blue, actually in stock, £675. Autoveyors, Ltd.

**A.C.** S.P. 2 seater model, immediate delivery at £495.

**A.C.** Any model A.C. light car supplied on easy terms at moderate rates.

**A.C.** Autoveyors, Ltd., 84 Victoria St., Westminster, S.W. 1. 484-908

**A.C.** Alfred Wastnag, leading A.C. agent, offers immediate delivery of 2 seaters, either blue or grey; other models within a few days. We specialize in part exchange deals and will make you a liberal allowance for your present car. Deferred terms. Write for our booklet describing fully our system of easy payments. Alfred Wastnag, 65 Gt. Portland St., W. 1. Tel., Langham 2172. 484-904

**A.C.**, 1922, standard, slightly shop soiled, offers wanted. Hatchelor, Clarence St., Kingston. 484-182

**A.C.**, 1922, 2 seater model in stock, immediate delivery, £495; ex changes. Newham Motor Co., 225 Hammersmith Rd., W.6. Phone, Hammersmith 80. 484-948

**ALBERT.** Sole local agents. Immediate delivery. Exchanges or deferred payments. Maudes, Below.

Maudes Motor Mart, 100 Paris St., Exeter; Walsall Garage, Walsall; and temporary office, 27 Prince of Wales Rd., Norwich. Head Office, 100 Great Portland St., London, W. 1. 484-80

**BAYLISS-THOMAS.** 10hp, 4 cylinder, w.-c., Magdyno lighting, 300 gns., dickey £5; cash or extended payments. Sole West London agents, H. Taylor and Co., Ltd., 52-53 Sussex Pl., South Kensington. Telephone, Kens. 7260. zzz-233

**BAYLISS-THOMAS.** 1922, with dickey seat, £320 cash, or £69 deposit and 11 payments of £24, less rebate. Delivery from stock, trial given. Service Co., 292 High Holborn, W.C. 1. zzz-595

**BAYLISS-THOMAS.** Allen-Bennett Motor Co., Ltd., authorized agents for Bayliss-Thomas light car, 10hp 4 cylinder water-cooled engine, 3 speed and reverse, Magdyno lighting, 300 guineas, immediate delivery; trade supplied. G. 10, 11 Royal Parade, London Rd., West Croydon. Phone, Croydon 2450. zzz-977

**BAYLISS-THOMAS** 10hp light car, 300 gns. Immediate delivery. Exchanges and extended payments arranged. Eastern Garage Co., 418 Romford Rd., Forest Gate, E. 7. 484-207

**BAYLISS-THOMAS.** 1922, 10hp model, 4 cylinder water-cooled engine, 3 speeds, Magdyno, 300 guineas, immediate delivery. Godfrey's, Ltd., 208 Gt. Portland St., London, W.1. 493-591

**BAYLISS-THOMAS** light cars in stock, 300 guineas, cash or instalments. W. J. Bladder and Son, Worcester. 491-871

**BAYLISS-THOMAS** cars in Brighton. Demonstrator always in stock at Wellford's, St. James St. 494-697

**BEDELIA.** The new 1922 model 8-10hp, with air-cooled or water-cooled engine.

**BEDELIA.** Air-cooled model, £185; water-cooled model, £195. Immediate deliveries. Trial runs free.

**BEDELIA.** Catalogues free from L. N. Palmer, sole concessionaire for the British Empire. Palmer's Garage, Footing. 484-54

**BELSIZE.** 9hp (Bradshaw model), £275; early delivery of this popular light car. Tom Norton, Ltd., Charles St., Cardiff. Tel., 2738-9. 489-560

**BELSIZE-BRADSHAW.** For prompt deliveries, deferred payments or exchange deals. Loxhams Garages, Fishergate, Preston. Tel. 1288. 503-614

**BELSIZE-BRADSHAW.** Gordon Watney and Co., Ltd., 31 Brook St., W. (Phones, Mayfair 2965 and 2966). West-End concessionaires, wholesale and retail, can give early deliveries of the 9hp Belsize-Bradshaw cars, oil-cooled 2 seater, complete, £275. Car on view for demonstration and inspection. Special deferred terms arranged and part exchange deals. zzz-179

**BELSIZE-BRADSHAW.** One only for immediate delivery, list price £275, complete, from the authorized agents, Loxhams Garages, Fishergate, Preston. Tel. 1288. 484-499

**BELSIZE-BRADSHAW.** 9hp, oil cooled. Let us arrange a demonstration run for you on this famous light car. Any car or motorcycle taken in part exchange. Deferred terms. Catalogues willingly sent. Order from the agents, who can give you early delivery and good service. Gerald Rolls and Co., 4 Little Cadogan Pl., Belgrave Sq., S.W. 1. Victoria 2914. 484-12

**BELSIZE-BRADSHAW.** Smith and Hunter, wholesale and retail car and tractor, can give you the earliest delivery; 3 seater sporting or standard, £275; self-starter if desired; delivery on payment of 25 per cent. balance in 18 months. Service Depot adjoining showrooms. Demonstration cars any time any day. 77 and 74 Gt. Portland St. Langham 2365 484-995

**BELSIZE-BRADSHAW.** 9hp, oil cooled, dynamo lighting, £275, speedometer £5 extra; delivery from stock. Morris and Co., Ltd., 139 Finchley Rd., Swiss Cottage, London, N.W. 5. 484-52

**BELSIZE-BRADSHAW.** Sole agents, earliest deliveries, £275. Maudes, 100 Paris St., Exeter; also Walsall Garage, Walsall. 484-78

**BELSIZE-BRADSHAW.** prompt delivery, £71 down, 12 monthly payments £17; 12 months free maintenance guarantee. Telford Garage, 47 Streatham Hill, London, S.W.2. 484-959

**BLERIOT WHIPPET.** 1922 models, 3 speeds and reverse, fully equipped, £198. Arrange trial runs with the agents, Lloyd and Son, Lewes. 491-180

**B.S.A.** 10hp 2 seater, dickey, self-starter, full tool kit, £740. The Chester Engineering Co. (1918), Ltd., City Rd., Chester. 485-834

**B.S.A.** 10hp cars, complete equipment, self-starter, dickey, etc., £340; demonstrations anywhere. County Cycle and Motor Co., Special Midland Agents, 300, 301 Broad St., Birmingham. 508-720

**B.S.A.**, 1922, the new 10hp car, dynamo lighting, speedometer, etc., £340. Wilkins, Simpson, opposite Olympia, London. 484-143

**B.S.A.** 10hp car, with self-starter and dickey seat, £340; earliest deliveries from the Newham Motor Co., 225 Hammersmith Rd., W.6. Phone, Hammersmith 80. 484-951

**CALCOTT** 10hp 2 seater, 1922, £350. Caffyns, Ltd., Eastbourne and Brighton. zzz-392

**CALCOTT.** 10.5hp, delivery from stock, cash or deferred terms. Loxhams Garages, Fishergate, Preston. Tel. 1288. 484-500

**CALCOTT.** 1922, the new 10.5hp model, £350; actually in stock for immediate delivery; trade supplied in Dorset. Dan Guy, Weymouth. zzz-766

**CALCOTT.** 1922, 10.5hp, £350; with dickey seat, £355; self-starter and dickey, £380; all models in stock; inspection invited. Easiest of easy payments; exchanges. Authorized agents; trade supplied. Wilkins, Simpson, opposite Olympia, London. 484-141C

**CALCOTT.** £350, new 10hp model in stock for immediate delivery by Smith and Hunter, 77 Gt. Portland St. Langham 2363. 484-997

**CALTHORPES.** 1922, all models, delivery from stock. Caffyns, Ltd., Eastbourne. 488-148

**CALTHORPE.** 1922, all models. Offord, 94 Gloucester Rd., S.W.7. Kensington 642 zzz-623

**CALTHORPE.** Leamington Automobile Co., 2 Parade, Leamington Spa, agents for Calthorpe cars. Immediate delivery. 496-853

**CALTHORPE** Service Depot, The House for Motors, Colmore Depot, 200 Deansgate, Manchester.

**CALTHORPE** 1922 2 seater de luxe, £410. Below.

**CALTHORPE** 1922 4 seater de luxe, £435. Below.

**CALTHORPE** 1922 2 seater, sports, £425. Below.

**CALTHORPE** 1922 4 seater, sports, £435. Below.

**CALTHORPE** Popular 2 seater, £355. Below.

**CALTHORPE** Popular 4 seater, £375. Below.

**CALTHORPE.** Immediate delivery of all models from stock.

**CALTHORPE** cars. Buyers in the north will receive every attention from The House for Motors, Colmore Depot, 200 Deansgate, Manchester, and 24 Paradise St., Liverpool. zzz-392

**CALTHORPE** cars. Good delivery all models, from £355; cash, H.P. or exchange. Morecambe Motors, Ltd., Harbour Garage, Morecambe. Tel. 97. 490-1624

**CALTHORPES.** new models in stock, exchanges considered. Braid Bros., Midland Garage, Colwyn Bay. Tel. 105. 484-14

**CALTHORPE.** all-aluminium super sports 2 seater, 2 spare wheels, shock absorbers, speedometer, electric horn, etc., list price £670, special offer £415, soiled only, never used. Saxon Jeffries, 253 Deansgate, Manchester. zzz-200

**CALTHORPE.** exceptional bargain, brand new 1921 10.4 model de luxe 2 seater, grey paint, antique red leather upholstery, standard equipment, car unused, cash price £365. Grose, Ltd., Northampton. zzz-631

**CALTHORPES.** New Popular models: 2 seater, £355, fully equipped; 4 seater, £375; terms and exchanges. Midland Garage, 7 Broad St. Birmingham. zzz-879

**CALTHORPE.** Smith and Hunter.

**CALTHORPE.** Authorized agents.

**CALTHORPE.** Every model now in stock.

Popular 2 seater with dickey, £355; de luxe 2 seater, £410; Popular 4 seater, complete, £375; de luxe 4 seater, £435; sporting de luxe type, £435; coupe, 2 models, £520. Deferred payments over long periods. Exchanges. Delivery now. Smith and Hunter, 77 Great Portland St. Langham 2363. 484-998

**CALTHORPE.** Stretton and Smith, authorized Calthorpa agents. Exchanges or deferred terms. 12 Woodstock St., Oxford St., W. 1. 484-24

**CALTHORPE** 4 seater popular model in stock, £375; exchanges; immediate delivery all models. Newham Motor Co., 225 Hammersmith Rd., W.6. Phone, Hammersmith 50. 484-949

**CASTLE THREE.** £225, immediate delivery. Demonstrations and catalogues from London agents, Cornwall's Motor Works, Edmonton. Phone, Tottenham 1634. 488-724

**CASTLE THREE** runabouts, in stock for immediate delivery, £225, dickey seat £5 extra, disc wheels £6 6s. extra. Easy payments or exchanges arranged. The Wicklife Motor Co., Stroud. 486-7

**CITROEN.** £115 down secures immediate delivery of the 11.4 de luxe model; a liberal allowance made for your present car. Alfred Wastnag, 65 Gt. Portland St., W. Tel., Lang. 2172. 484-505

**CLULEY.** "The cream of Coventry's light cars." The best light car on the market, irrespective of price. De luxe model, £4201 Popular model, £350. 1922 models in stock. Stanley Wrench, 331 Euston Rd., London, N.W.1. Phone, Museum 3081. zzz-604

**THE BEST BARGAINS** in second-hand light cars and cyclecars are offered in these pages.

## NEW LIGHT CARS AND CYCLECARS

(continued).

- CLULEY**, the owner-driver's car, early deliveries all 10hp models; exchanges and easy payments; send us your inquiry. Storey's Garage, Peter-sham Rd., Richmond. zzz-804
- CLULEY**, 10hp, brand new, slightly shop soiled, maker's price £360, accept £325. Batchelor, Clarence St., Kingston. 484-a180
- COVENTRY-PREMIER**, new model, 2 seater. Offord, 94 Gloucester Rd., S.W. 7. Kensington 642. zzz-624
- COVENTRY-PREMIER**, 1922, new models, £250. £50 down, remainder in 12 equal monthly payments; motorcycles or motor combinations taken as part payment. Wauchop's, 9 Shoe Lane, London. Write, call or 'phone Holborn 5777. 486-709
- COVENTRY-PREMIERS**. Latest 1922 models in stock. £250. Saxon Jeffries, Official Agent, 253 Deansgate, Manchester. zzz-197
- COVENTRY-PREMIER**, 1922 models in stock. Walbro Motorcycle Co., Saffron Walden 'Phone 45. 492-148
- COVENTRY-PREMIER**, 1922, new, to be delivered end of February, cannot accept delivery, will sacrifice for £255. Nicklin, 79 Perschouse St., Walsall. 485-k984
- COVENTRY-PREMIER** 4 wheeler, 2 seater, 1922 model, 8hp water-cooled, 5 gears and reverse, readily detached wheels, spare wheel and tyre, dynamo lighting, ready for the road; price, inclusive of insurance policy, £250. Immediate delivery from Singer and Co. Ltd., proprietors of Coventry-Premier (Successors), Ltd., 17 Holborn Viaduct, E.C. 1. 'Phone, Central 7700-7701. 'Grams, "Cranks, London." zzz-805
- COVENTRY-PREMIER**, 1922, 8hp, £250, in stock; immediate delivery. Easiest of easy payments. Authorized agents, Wilkins, Simpson, opposite Olympia, London. 484-1411
- COVENTRY-PREMIER** 1922 cars for immediate delivery, £250. Buy of the authorized agent. Extended payments or exchanges arranged. Roy's, of Euston Rd. (378-384). 'Phone, Museum 6436. 484-917
- COVENTRY-PREMIER**. Exceptional bargain. 1922 brand-new 8hp Coventry-Premier, dynamo lighting, spare wheel and tyre, tools, etc., free insurance and fully guaranteed, usual price £250, first cheque £220 secures. Wilkins, Simpson, opposite Olympia, London. 484-g559
- COVENTRY-PREMIER**, 1922 model, latest improvements, price £250, including manufacturer's 12 months' free insurance policy; in stock; a fair price allowed for second-hand cars and motorcycles in part payment; Shipside, Daybrook, Nottingham zzz-3
- COVENTRY-PREMIER** Service Depot. Colmore Depots.
- COVENTRY-PREMIER**, 1922 models, 4 wheeler type, dynamo lighting, disc wheels, handsome bodywork and full equipment, £250, early deliveries. Colmore, 200 Deansgate, Manchester, and 49 John Bright St., Birmingham. zzz-549
- COVENTRY-PREMIER**, 1922, 4 wheel model, £250, immediate delivery, deferred terms or cash. Ratcliffe Bros., 200 Gt. Portland St., W. 1. zzz-109
- COVENTRY-PREMIER**, dickey seat and free insurance for one year, £250 cash, or £47 17s deposit and 11 payments of £17 8s, less rebate. Service Co., 292 High Holborn, W.C. 1. zzz-70
- COVENTRY-PREMIER**, in stock at new reduced price, £250. Deferred payments. Parker's, Bradshawgate, Bolton. 484-2
- COVENTRY-PREMIER**.
- COVENTRY-PREMIER**, 1922, 8hp, 2 3/4 seater, with double sunk dickey seat, brand new, painted grey, spare wheel and tyre, Rotax lighting set, speedometer, etc., beautifully finished, a comfortable, convenient and dependable car, £250 cash or by economical instalments of £57 10s. down and 12 monthly instalments of £15 13s. 6d., which includes a comprehensive insurance for 12 months. Strict privacy, no unpleasant inquiries. Modern motorcycle or combination taken as first instalment. Herbert Robinson, Ltd., Regent St., Cambridge. 484-18
- COVENTRY-PREMIER** new model with higher body, dickey seat, etc., at the reduced price £250, in stock; specification includes free insurance, dynamo lighting and speedometer; exchanges. Newham Motor Co., 223 Hammersmith Rd., W.6. 'Phone, Hammersmith 80. 484-946
- FIAT** 4 seater, 10-15, £550. Caffyns, Ltd., Eastbourne. zzz-393
- G.N.**, 1922 models. Early delivery; deferred payments; exchanges. Wauchop's, 9 Shoe Lane, London. Holborn 5777. 486-712
- G.N.** Early delivery of all models for cash, exchange, or hire-purchase. Stanley Wrench, 351 Euston Rd., London. 'Phone, Museum 3081. zzz-365
- G.N.**, the unapproachable speed machine; immediate delivery of all new models; standard 2 seater with dynamo lighting and dickey seat, £225. Illustrated lists on application. The Birmingham Garages, Ltd., Navigation St., Birmingham. zzz-487
- G.N.s.** Order now from sole agent for Salisbury and district, Longman's Garage, Fisherton, Salisbury. 501-g290
- G.N.**, standard, £226 cash, or £47 deposit and 11 payments of £17, less rebate; other models on similar terms. Service Co., 292 High Holborn, W.C. 1. zzz-359
- G.N.**, 1922, immediate delivery. Main Berkshire agents, Drake and Mount, Ltd., Bracknell. 'Phone 74. 488-762
- G.N. F.O.C.H.**, the G.N. agents. Cash, exchange, or deferred payments. 5 Heath St., Hampstead (near Tube). 'Phone, Hampstead 3752. 484-973
- G.N.** 1922 touring model, painted blue, actually in stock, £225; easy terms arranged. Autoveyors, Ltd., 84 Victoria St., S.W. 1. 484-909
- G.N.**, new 1922 model, ready at works, unable to take delivery, what offers? 2 Tennyson Rd., Bedford. 484-a16
- G.N.** 1922 cars, latest models for immediate delivery. Buy of the authorized agent. Extended payments or exchanges arranged. Roy's of Euston Rd. (378-384). 'Phone, Museum 6436. 484-915
- G.N.** 1922 models in stock, all-weather and standard, dickey seat, dynamo lighting. Elce, Ltd., 15-16 Bishopsgate Avenue, Camomile St., E.C. 3. 'Phone, Avenue 5548. 484-936
- G.N. cars**. 1922 models in stock for immediate delivery: all-weather £250, standard £225. Telc., Museum 6626. A.B.C., 166 Gt. Portland St., W. 1. 484-41
- G.N. Popular**, new 1921 model, £150; solo motorcycle taken part payment. Cow Bros., Guildford. 485-a152
- G.N.**, 1922, 2 seater and dickey, dynamo lighting, in stock for immediate delivery, £225. Light On Co., 331 Euston Rd., London. 484-67
- G.N.** 1922 models, actually in stock; exchanges or deferred payments. Maudes', 100 Gt. Portland St., London, W. 1; and 100 Paris St., Tactar. 484-79
- G.N.**, 1922 models in stock for immediate delivery; exchanges. 223 Hammersmith Rd., W.6. 'Phone, Hammersmith 80. 484-844

## NEW LIGHT CARS AND CYCLECARS

(continued).

- G.W.K.** 1922 2 and 4 seaters for immediate delivery. A fair price allowed for second-hand cars and motorcycles in part payment. Shipside, Daybrook, Nottingham. zzz-4
- G.W.K.**, with dickey seat, 1922 model, £285 cash, or £60 deposit and 11 payments of £21 10s less rebate. Service Co., 292 High Holborn, W.C. 1. zzz-360
- G.W.K.** Service Depots. The House for Motors, 200 Deansgate, Manchester, and 49 John Bright St., Birmingham.
- G.W.K.** cars. Immediate delivery of 2 seater, £285; 4 seater, £295. From the House for Motors, Colmore Depot, 200 Deansgate, Manchester. zzz-424
- G.W.K.** Smith and Hunter, authorized agents. Sweeping reductions: 2 seater now £285, 4 seater £295. We can deliver from stock. Catalogue and demonstrations with pleasure. 77 Gt. Portland St., Langham 2363. 484-996
- G.W.K.** 4 seater, £295. We have 1922 models available for you to thoroughly test without obligation. Early deliveries. Cash or easy payment terms. Ariel Motors and General Repairs, Ltd., 78 North St., Guildford; 320-2 Camberwell New Rd., London, S.E.5; and 182 New Cross Rd., S.E.14. 484-172
- HILLMAN**, immediate delivery sports model, exchanges considered, cash or deferred payments. Braid Bros., Midland Garage, Colwyn Bay, Tel. 105. 484-12
- HORSTMAN**, 1922 model, 10hp, 4 seater, adjustable front seats, detachable wheels, spare wheel and tyre, speedometer, hood envelope, etc., slightly shop-soiled, £350, bargain. A. W. Chapman, Ltd., Harehugh Gdns., Hurlingham, S.W.6. Putney 2372. 484-93
- JOWETT**. Leamington Automobile Co., 2 Parade, Leamington Spa, agents for Jowett cars. Immediate delivery. 495-852
- JOWETT** 8hp water-cooled light car, 2 seater, fitted with detachable steel wheels, dynamo lighting, speedometer, etc., complete, £500; early delivery can now be given. The Birmingham Garages, Ltd., Navigation St., Birmingham. zzz-488
- JOWETT**, all models, immediate delivery. R. A. Johnstone, Ltd., Jowett agents, Tinsley, Sheffield. 491-517
- JOWETT**, The world's finest flat twin. De luxe model in stock, £555. Official distributor for Lancashire. Wholesale and retail. Saxon Jeffries, 253 Deansgate, and 27 Lower Mosley St., Manchester. 'Phone, 4978 Central. zzz-198
- LAGONDA** coupe or 4 seater, £395 cash or £81 deposit and 11 payments of £50, less rebate. Service Co., 292 High Holborn, W.C. 1. zzz-229
- LAGONDA** Service Depot. The House for Motors, Colmore Depot, 200 Deansgate, Manchester; 49 John Bright St., Birmingham.
- LAGONDA** cars. Immediate delivery of 2 seater coupe or 4 seater touring, one price only, £395, ex works. Colmore Depot, The House for Motors, 200 Deansgate, Manchester; and 49 John Bright St., Birmingham. zzz-433
- LAGONDA**, 1922, 4 seater, immediate delivery, £505. Taylor, 52 Sussex Pl., S.W.7. 'Phone, Kensington 7260. zzz-625
- LAGONDA**, 1922, both models. Offord, 94 Gloucester Rd., S.W.7. Kensington 642. zzz-625
- LAGONDA**. Sales and service. Vandervell, 199 Piccadilly, W. 1. Gerard 495-822
- LAGONDA**. Stretton and Smith, district agents Lagonda coupe and 4 seaters, £395 complete; exchanges or deferred terms. 12 Woodstock St., Orford St., W. 1. 484-26
- LITTLE MIDLAND** cars in Brighton. Welford, St. James St., for full particulars. 484-698
- MATHIS** 1921 3 seater, new, £350.
- MATHIS** 1922 models, £395. Get advice and buy from the Original Mathis experts. B. S. Marshall, Ltd., 17 Hanover Sq., W. zzz-990
- MATHIS** car, exceptional bargain, brand new 6.14hp 2 seater, special body, starting and lighting, Michelin wheels with spare, etc., car unused, for immediate disposal, £250 (two hundred and fifty pounds). Grosz, Ltd., Northampton. zzz-634
- METRO-TYLER**, 1922, 2 seater model 3 speed, from £125; easy payments arranged. Write for specification, The Metro-Tyler Co. Ltd., Banister Rd., Kilburn Lane, W.10. 484-a163
- MORGAN** Service Depot. The House for Motors, Colmore Depot, 200 Deansgate, Manchester; and 24 Paradise St., Liverpool.
- MORGAN** runabouts. To secure early delivery place your order with The House for Motors. Grand Prix water-cooled and de luxe models in stock at makers' list price. The House for Motors, Colmore Depot, 200 Deansgate, Manchester; and at 24 Paradise St., Liverpool. zzz-433
- MORGANS**. Allen-Bennett Motor Co., Ltd., sole Surrey agents. Earliest delivery of all models; second-hand Morgans always in stock. We specialize in these wonderful machines; repairs executed by Morgan experts; all spares in stock; cash or extended payments. 9-11 Royal Parade, London Rd., W. Croydon. 'Phone, Croydon 2450. 'Grams, "Track, Croydon." zzz-605
- MORGANS**, all models, supplied, delivery from stock, new Grand Prix, just delivered ex works, £190 10s.; extended payments arranged; motor cycles taken as part payment. Wauchop's, 9 Shoe Lane, London. 'Phone, Holborn 5777. 486-710
- MORGAN**, standard Popular, £150 cash or £32 deposit and 11 payments of £11 5s. 6d., less rebate; other models on similar terms. Service Company, 292 High Holborn, W.C. 1. zzz-587
- MORGANS**, 1922, de luxe, Grand Prix, and Popular models, in stock; exchanges. Walbro Motorcycle Co., Saffron Walden. 'Phone 45. 492-147
- MORGAN**, Grand Prix model, brand new, water cooled, not been used, accept £175. Pyatt, Hillary St., Walsall. 485-k986
- MORGANS**. All models for immediate or early delivery. Buy of the authorized agent. Extended payments or exchanges arranged. Roy's of Euston Rd. (378-384). 'Phone, Museum 6436. 484-916
- MORGANS**, new and second-hand, always in stock; immediate delivery; exchanges, extended terms. Elce, Ltd., 15-16 Bishopsgate Avenue, Camomile St., E.C. 3. 'Phone, Avenue 5548. 484-935
- MORGAN Popular**, 1922, in stock, £150; exchanges or deferred payments. Batchelor, Clarence St., Kingston. 484-a181
- MORGANS**, 1922 models, prices from £150 complete; deferred payments arranged; immediate delivery. Potter, Morgan Specialist, 21 Leicester Grove, Blackman Lane, Leicestershire. 'Phone, 22578. Telegrams, "Runabouts, Leeds." 4887-134

**NEW LIGHT CARS AND CYCLECARS**  
(continued).

**NEW LIGHT CARS AND CYCLECARS**  
(continued).

**MORGAN.** Being contracting agents for London, East Devon and Norfolk, we can offer immediate delivery of most models on most advantageous terms. *Maudes', Below.*

**MORGAN.** 1922 Aero model, M.A.G. 10hp water-cooled, screens, dynamo lighting, aluminium dash, horn, dials, primrose and black, £216. *Maudes', Below.*

**MORGAN.** 1922 Popular model, 8hp J.A.P., air-cooled, hood, screen, lamps, horn, licence holder, £150. *Norwich and London depots. Maudes', Below.*

**MORGAN.** 1922 Grand Prix J.A.P., 8hp, water-cooled, hood, screen, lamps, horn, licence holder, £180. *Maudes', Below.*

**MORGAN.** 1922 de luxe J.A.P., air-cooled, hood, screen, lamps, horn, licence holder, £175. *Exeter depot. Maudes', Below.*

**MORGAN.** Any model on extended payments at 4 per cent. extra, one quarter deposit, balance 12 equal monthly payments. *Maudes', Below.*

**Maudes' Motor Mart.** The largest contracting agents 100 Great Portland St., London, W.1; 100 Paris St., Exeter; and (temporary office) 27 Prince of Wales Rd., Norwich; also Wolverhampton St., Walsall. 484-75

**PEUGEOT** Quad. Neville Hodson Motor Co., Ltd., Brighton, can deliver from stock 1922 model, with English staggered 2 seater De Luxe body, Lucas Magna lighting set, complete, £250; easy terms arranged. zzz-174

**PHENIX.** 11.9hp, delivery from stock, £475. *Caffyns, Ltd., Eastbourne and Guildford.* 488-150

**PHENIX.** 11.9, shop-soiled, both models, £425. *Caffyns, Ltd., Eastbourne, Bexhill and Brighton.* zzz-394

**PREMIER.** 1922, 4 wheeler, delivery from stock, £250. *Wrexham Motor Co., 39 Chester St., Wrexham.* 490-733

**RHODE.** Scottish Distributors, D. McNeil, Ltd., 144 Buchanan St., Glasgow. 803-1633

**RHODE** cars. For early delivery write Cyril Williams, Chapel Ash Depot, Wolverhampton. 492-b71

**RHODE.** Let me send you particulars of this wonderful utility car, which offers such remarkable value at £275. *Authorized Agent, A. J. Rice, 135 London Rd., Brighton.* 553-555

**RHODE** cars, delivery from stock, cash or deferred payments. *Brown, 3-7a Parker Lane, Burnley. Tel. 1032.* 487-965

**ROVER.** 8hp. *Authorized agents. Cash or deferred payments. Taylor's, 52 Sussex Place, S.W.7. Phone, Kensington 7260.* zzz-570

**ROVER.** £220 cash, or £46 deposit and 11 payments of £16 12s. 6d., less rebate. *Service Co., 292 High Holborn, W.C.1.* zzz427

**ROVER.** 1922, 8hp, in stock. *Offord, 94 Gloucester Rd., S.W.7. Kensington 642.* zzz-626

**ROVER.** Allen-Bennett Motor Co., Ltd., authorized agents for 8hp Rover, complete with dynamo lighting, £220 cash, or on our extended-payment system, immediate delivery from stock; trade supplied. 9, 10, 11 Royal Parade, London Rd., West Croydon. *Phone, Croydon 2450* zzz-979

**ROVER** light cars, immediate delivery; exchanges and extended payments arranged. *Easton Garago Co., 418 Romford Rd., Forest Gate, E.T.* 484-206

**ROVER.** Immediate delivery from stock, new 1922 model, £220; extended payments, and exchange motorcycles in part payment. *Wanchopp's, 9 Shoe Lane. Phone, Holborn 5777.* 486-711

**ROVER** cars. 1922 8hp model, price £220; early delivery. *Godfrey's, Ltd., 208 Gt. Portland St., London, W.1.* 488-869

**ROVERS.** 8hp, brand new, immediate delivery, £220. *Braid Bros., Midland Garage, Colwyn Bay. Tel. 105.* 484-43

**ROVER** 8hp light car, 1922 models, dynamo lighting, £220 cash; deferred payments 4 per cent. extra. *Ratcliffe Bros., 200 Gt. Portland St., W.* zzz-435

**ROVER** cars, 8hp, 1922 models, delivery from stock, £220. *Kays 8 Bond St., Ealing.* 492-181

**ROVER** 8hp models, in stock; exchanges. *Walbro Motorcycle Co., Saffron Walden. Phone 45.* 492-149

**ROVER.** Jarvis, Ltd., Official Rover agents, can give immediate delivery of the 8hp Rover, standard, £220, model de luxe, £245. 205 Edgware Rd., London, Tele. Padd. 2512. 506-b658

**ROVER** 8hp. *Fowler and Bridgen, authorized Rover agents. 130 Euston Rd., King's Cross. Museum 4827.* zzz-439

**ROVER.** Eagles and Co., official Rover agents. Standard 1922 model from stock, £220; de luxe model, £245; early delivery. *Motorcycles in part payment or deferred payments. 275 High St., Acton, London.* zzz-670

**ROVER** S. F.O.C.P. Actually in stock, Rover 8. 5 Heath St., Hampstead (near Tube). *Phone, Hampstead 3752.* 484-974

**ROVER.** Cass's Motor Mart, Ltd., new in stock. 243 Brompton Rd., S.W. 3. Kensington 2194. 484-978

**ROVER** 8hp, 1921, shop-soiled, £195. *Wright's Garage, Saffron Walden. Tel. 16.* 484-912

**ROVER.** 1922, 8hp, £220, in stock, immediate delivery. *Easiest of easy payments. Authorized agents, Wilkins, Simpson, opposite Olympia, London.* 484-1412

**ROVER** 1922 8hp cars for immediate delivery. *Extended payments or exchanges arranged. Rey's, of Euston Rd., (378-384). Phone, Museum 6436.* 484-913

**ROVER** 1922 8hp car, dynamo lighting, etc., £220; delivery from stock. *Elec. Ltd., 15-16 Blabopsgate Avenue, Camomile St., E.C. 3. Phone, Avenue 5548.* 484-934

**ROVERS.** Stretton and Smith have new 8hp model actually in stock, £220; slightly used models always available; catalogue and demonstrations; deferred payments. 77 Gt Portland St. Langham 2363. 484-993

**ROVER.** Stretton and Smith, authorized Rover agents; exchanges or deferred terms. 12 Woodstock St., Oxford St., W.1. 484-25

**ROVER.** 8hp models for immediate delivery, standard £220, de luxe £245; exchanges. *Newham Motor Co., 235 Hammersmith Rd., W. 6. Phone, Hammersmith 80.* 484-950

**SALMSONS.** Leamington Automobile Co., 2 Parade, Leamington Spa, agents for Salmsons 4 cylinder standard 2 seater, £255; earliest delivery. 498-242

**SALMSON** Ten. The Motor Marketing Co., Wantage Rd., Reading, are distributors for Berkshire. *Place your order now for early delivery. Agents interested, please write.* zzz-2

**SCOTT** Sociables in Brighton. Full particulars from sole agent, Welford St. James St. 494-695

**SINGER** Service Depot.

**SINGER** cars. We are in an excellent position to give deliveries of the new model Singer car. *Send your inquiries to the House for Motors, Colmore Depot, 49 John Bright St., Birmingham; and 200 Deansgate, Manchester.* zzz-257

**SINGER.** 1922, 10hp, 2 seater, roomy dickey, all-weather body, lovely car, immediate delivery, £395. *Wrexham Motor Co., 439 Chester St. Wrexham.* 490-732

**SINGER.** New design 10hp all-weather 2.3 seater, £395; 4 seater, £420; insurance included. *Deferred payments (£104 down secures immediate delivery); exchanges. Largest contractors London and Southern England. Trade inquiries invited. H. B. Cook, Ltd., 202 Gt. Portland St., W. 1. Langham 1726.* zzz-451

**SINGERS.** All-weather model, £395; 4 seater, £420; electric self-starter and dynamo lighting, complete ready for road. *Call, phone, or write. Singer and Co., Ltd., 17 Holloway Viaduct, E.C.1. Central 7700. 7701. Grama, "Cranks, London."* 533-588

**SINGER.** 1922 model, all-weather, starter, insurance, speedometer, delivery from stock. *Official agent, Saxon Jellifer, 253 Deansgate and 27 Lower Mosley St., Manchester.* zzz-199

**SINGER.** £102 down secures immediate delivery of the new all-weather model; a liberal allowance made for your present car. *Alfred Wastnax, 65 Gt. Portland St. Tel. Langham 2172.* 484-906

**SINGER** 1922 cars. All models for immediate delivery. *Buy of the authorized agent. Extended payments or exchanges arranged. Rey's, of Euston Rd. (378-384). Phone, Museum 6436.* 484-914

**SINGER.** 10hp. We are now booking orders for March delivery for all models; 12 months' free insurance policy given. *A fair price allowed for second-hand cars and motorcycles in part payment. Shipside, Daybrook, Nottingham.* zzz-5

**SINGER.** Early deliveries of 1922 models. 10hp all-weather body, £395; exchanges or deferred payments; 12 months' free insurance. *Maudes', 100 Paris St., Exeter.* 484-77

**SINGER.** 1921 coupe, with starting and lighting, spare wheel, speedometer, reduced shop-soiled price £375. *Maudes' Motor Mart, 100 Paris St., Exeter; and Walsall Garage, Walsall.* 484-76

**SINGER.** G. L. Francis and Co., authorized district agents for Singer cars. 1922, 10hp, 2 seater all-weather body, free insurance policy in stock for immediate delivery, exchanges and deferred payments guaranteed. *Trade inquiries invited. 169 Shaftesbury Ave. Phone, Gerard 3288.* 484-43

**SINGER.** 1920 coupe, brand new, shop-soiled, maker's guarantee, £350 or exchange. *Batchelor, Clarence St., Kingston.* 484-a183

**SINGER** cars. *Kingsway Motor Co., authorized agents for all models, also Coventry-Premiera, Waldorf House, Aldwych, opposite Strand Theatre. Deferred payments arranged.* 484-89

**SINGER.** In stock 1922 10hp, all-weather body, £395; deferred payments. *Parker's, Bradshawgate, Bolton.* 484-1

**SINGER.** Stretton and Smith, authorized Singer agents; exchanges or deferred terms. 12 Woodstock St., Oxford St., W.1. 484-23

**SINGER.** 1922, 10hp, with all-weather body, in stock, painted royal blue, £395; exchanges. *Newham Motor Co., 223 Hammersmith Rd., W.6. Phone, Hammersmith 80.* 484-962

**STANDARD.** Stretton and Smith, authorized Standard agents; exchanges or deferred terms. 12 Woodstock St., Oxford St., W. 1. 484-22

**SWIFT.** 10hp, 1922, upholstered leather, dickey, side curtains open with door, dynamo lighting, self-starter, 5 lamps, spring-gaiters, etc., just arrived, £395 *Wilkins, Simpson, opposite Olympia London.* 484-1414

**UNIT** No. 1 2 seater and dickey, dynamo lighting, 5 wheels, brand new, unregistered, just taken for debt, 160 guineas. *198 Sheen Lane, Mortlake.* 484-g475

**WOLSELEY** 10hp 2 seater, £475; torpedo, £525; coupe, £650; all models in stock. *Caffyns, Ltd., Eastbourne, Brighton and Bexhill.* zzz-439

**MISCELLANEOUS LIGHT CARS AND CYCLECARS.**

**EXPERIMENTAL** chassis, fitted 7-9hp J.A.P. engine, Bosch magneto, Senspray carburettor, positive drive rear axle, complete with tyres and tubes, £50 for quick sale; seen any time before 6.30 p.m. *Patmore, 240 King St., Hammersmith, W. 6.* 484-11

**BUNTING'S** can supply the car you want, also take or sell what you have. *Just write us and see our testimonials. Distance immaterial. Bunting's Motor Exchange, Wealdstone.* 487-61

**F.O.C.H.** are noted for reliable new and second-hand cars, runabouts, etc., at bargain prices; exchanges a speciality. *Any new car on easy terms if desired. Spot cash for good second-hand cars; highest possible prices paid. We also sell on commission. Our name implies our business methods. Fair Offer Car House, 5 Heath St., Hampstead (near Tube). Phone, Hampstead 3752. Hours 9-7, including Saturdays.* zzz-928

**CARS FOR HIRE.**

**LIGHT** cars for hire, drive yourself, from 30s. per day. *Phone, Park 3232. Blake, 216 Westbourne Grove.* 486-147

**AGENCIES.**

**COVENTRY PREMIER** and Singer. To the trade. Important territories in Lancashire still available. *Communicate:- Parker's, Bradshawgate, Bolton; also 245 Deansgate, Manchester.* 484-5

**ASHTON-EVANS** 11hp cars. *The manufacturers will be pleased to receive proposals for direct or sub-agencies in all districts. No deposits required, generous contributions towards local advertising, minimum quantities, sole rights. Ashton Evans Motors, Ltd., Birmingham.* 484-940

**BODIES.**

**LIGHT** car bodies. *Send your inquiries to us with sketch of your requirements, for quotation. Bodies finished with polished aluminium panels a speciality. Trade inquiries invited for quantity production, either wood and iron, or finished. Pitt and Farrar, St. Germain St., Huntingwood.* 484-g312

**£25.** We are in the position to build bodies for cyclecars from £25. *Send your dimensions or illustrations for quotations. Wonderful value. Trade inquiries invited. Phone, Brixton 1585. Robini Manufacturing Co., 1 and 3 Tulae Hill, Brixton, S.W.* 484-943

## CONSULTING ENGINEERS.

**HUGH P. MCCONNELL** examines cars for clients and reports on condition and value; unbiased opinion on new and second-hand cars. 199 Piccadilly, London, W. Gerrard 1960. 484-87

**EXPERT** advice given on new or second-hand cars. Shipping abroad and insurance. H. W. Jameson, 3 Tower Hill, E.C. 3. Telephone, Minorities 2549. 484-11

**VANDERVELL.** Expert advice on all classes of motor vehicles, new or second-hand; examinations, valuations, etc.; preliminary consultations free; qualified representative sent anywhere. 199 Piccadilly, W. 1. Gerrard 562. 495-825

**W. H. SUMNER, A.M.I.M.E., M.I.A.E.,** 28 Victoria St. Westminster, S.W. 1 Telephone, Victoria 7575. Efficiency engineer. Development of inventions and experimental work; expert advice and examination on any make of car. 484-187

## DYNAMOS.

**LUCAS** dynamo lighting sets, complete, from £7 each. Dept. H. Leslie Dixon and Co., 9 Colonial Ave., Minorities, E. 1. zzz-707

## EXPERIMENTAL ENGINEERS.

**LEOPOLD WARD, B.Sc., A.C.G.I.,** Harmood Pl., Chalk Farm, N.W. 1. My tool-room, engineering works, drawing office, and laboratory are devoted entirely to experimental work. Write for free booklet. Phone, Hampstead 7559. 485-672

## ENGINES.

**COVENTRY-VICTOR.** The perfect flat twin engine, air or water-cooled. This famous 5-7hp engine now available for immediate delivery. The most reliable and economic engine for the real cyclist. No vibration, no noise, as fitted to the winning machine 500 mile race Brooklands, July 2nd; favourable price. The Coventry Victor Motor Co., Ltd., Coventry. zzz-104

**ALPHA** light car engines: three types: 8hp twin cylinder, 1,099 c.c.; 8hp 4 cylinder, 1,088 c.c.; 11hp 4 cylinder, 1,330 c.c. Write for particulars and prices to Johnson, Hurley and Martin, Ltd., Coventry. zzz-755

**ENGINES.** We have some special bargains this week. Wortham, Blake and Co., Waltham Cross. 484-739

**BRAND** new Dorman engine, 11.9hp, overhead valves, complete with magneto, Zenith carburettor, water pump and fan, flywheel cut for starter and machined for clutch, 3 point fixing for chassis, cost over £100, accept £65. Blake, 216 Westbourne Grove. 484-145

**BLACKBURN** 8hp twin engine, handle starting, complete with carburettor, £27 10s. Baston's, 228 Pantonville Rd., King's Cross, London, N. 1. 484-960

## EXCHANGES.

**SPECIALISTS** in exchanges of every description, cash either way. The Light Car Co., 331 Euston Rd., London, N.W. 1. zzz-605

**F.O.C.H.** are noted for fair exchanges. Fair Offer Car House, 5 Heath St., Hampstead (near Tube). Phone, Hampstead 3752. 484-975

**REYS,** of Euston Rd. (378-384), will take any motorcycle or light car in part payment for new or other models; all leading makes supplied, including Morgan, Coventry-Premier, Rover, G.N., A.C., Singer, Alberts, Calthorpe, Calcott, Hillman, Lagonda, Morris-Oxford, Wolseley and Standard cars. Deferred payments arranged. Phone, Museum 6436. 484-931

**HERBERT ROBINSON, LTD.,** Regent St., Cambridge, will accept second-hand cars or motorcycles in part payment for new cars. We will give you a fair deal for cash, exchange or deferred payments. Send particulars of your requirements. 484-17

**EXCHANGES** a speciality. Seabridge always has bargains in 2 and 4 seaters. Seabridge, Mansler Rd., East Dulwich, Sydenham 2452. 484-187

**WANTED, G.N.,** Crouch, 1921, for cash and G.P. Morgan, 1915, stored during war, expert examination gladly, sprung cushions, etc. State offer, Box No. 7732, c/o "The Light Car and Cyclecar." 484-174

**EXCHANGE** 1920 A.J.S. combination, like new, little used, for family Morgan or light car, late. 35 Mount Pleasant Rd., Malden, Surrey. 484-173

**EXCHANGES.** If you wish to exchange your present car or motorcycle for a new or different model, we can offer you exceptional facilities, as we have been specializing in this class of business for many years, and can offer best possible prices. Exchanges can be arranged by post and delivery effected anywhere. Authorized agents for all leading makes, including Singer, Calthorpe, Rover, G.N., B.S.A., Coventry-Premier, etc. Second-hand list on request. Newham Motor Co., Exchange Specialists, 223 Hammersmith Rd., W. 6. Phone, Hammersmith 80. 484-954

**EXCHANGE, brand-new** 1922 A.C. 2 seater for cheaper car and cash, list price £495. Newham Motor Co., 223 Hammersmith Rd., W. 6. Phone, Hammersmith 80. 484-956

**EXCHANGE** 11hp 1919 (Oct.) Lagonda 4 seater, C.A.V. dynamo lighting, speedometer, in first-class condition, for combination or 2 seater and cash. Newham Motor Co., 223 Hammersmith Rd., W. 6. Hammersmith 80. 484-955

**EXCHANGE** 1921 Carden 2 seater, electric lighting, nearly new, for combination. Newham Motor Co., 223 Hammersmith Rd., W. 6. Phone, Hammersmith 80. 484-953

## EXTENDED PAYMENTS.

**LIGHT** cars by most leading makers can be supplied on favourable terms and early delivery given. Service Co., 292 High Holborn, W.C. 1. zzz-979

**TRADE** financed for deferred payments. Send for particulars. Saunders, 31 Parade, Golders Green. zzz-815

**GORDON WATNEY and CO., LTD.,** 31 Brook St. (Phone, Mayfair 2956), can supply any make of cars on easy terms to suit customers' means; 4 per cent. interest, no guarantors; cars delivered immediately on payment of first instalment. zzz-813

**COOK, LTD.,** deferred payment specialists, deliver car within 24 hours; absolute privacy, no references or guarantors required, accommodation charge only 4 per cent.; any make supplied. 202 Gt. Portland St., W. 1. Langham 1726. zzz-458

**REYS,** of Euston Rd. (378-384), make a speciality of deferred payments; all leading makes supplied, including Morgan, Coventry-Premier, Rover, G.N., A.C., Singer, Albert, Calthorpe, Calcott, Hillman, Lagonda, Morris-Oxford, Wolseley and Standard cars. Used cars taken in part payment. Phone, Museum 6436. 484-932

**HERBERT ROBINSON, LTD.,** Regent St., Cambridge, supply any make of light car on easy terms. We give a fair deal at a reasonable charge. Strict privacy, no unpleasant inquiries, car delivered on payment of first instalment, any district, full particulars by post, exchanges arranged. 484-16

**SEVERAL** good second-hand light cars, take very easy payments. Parker's Garage, Oxford. 487-941

## GARAGES.

**LOCK-UP** garage to let near Paddington Station, room for 2 cars, running water, from April 1st for 7 months, 15s. per week. Write, Captain Strong, R.N., 1 Hyde Park Mansions; or Phone, 4766 Pall. 484-179

## HOODS AND SCREENS.

**HOODS** for light cars re-covered in best khaki material. Stockport Garage Co., Parsonage St., Wellington Rd. North, Stockport. Tel. No. 2503. zzz-189

**SIDE** curtains, completely enclosing 8hp Rover, £2 5s., or to open with door, £2 15s. Hoods or curtains carefully made to any specification. Drall, Manufacturer, Vine Garage, Rugeley. 485-h653

**HIGHEST-GRADE** 2 seater, £4 12s. 6d.; re-covers from £2 12s. 6d.; side curtains, envelopes, etc. Henry Jones, 778 High Rd., Tottenham, London. 484-g520

**30 HOODS.** Send width, length, shall not have any more at home. Write me. Also 20 covers to tack. Dawson, 166 Brightwell Ave., West-cliff-on-Sea. 484-a133

## INSURANCE.

**PREMIER** is the best. Have you secured your Premier policy? 486-201

**MORGAN, £5 10s.; G.N. or Rover, £6;** others at advantageous rates. Ernest Bass, Insurance Broker, 40 Chancery Lane, W.C. 2. Phone, Museum 2254. 512-1

**"MINIMUM COST"** motor policies in many cases save 50 per cent. Special scheme for owner-drivers. Write for particulars to Leslie Parsons and Co. (Dept. L), 108 Victoria St., S.W. 1. Phone, Victoria 34 1/2 lines). 495-h477

**"AGREED VALUE CLAUSE."** Motor policies containing this clause are effected at competitive premiums by James Milton and Co., Ltd., Incorporated Insurance Brokers, 51 Gracechurch St., London. Phone, Bank 8146. 487-968

## MAGNETO REPAIRS.

**RELIANCE** MAGNETO REPAIRING CO. for repairs and new and second-hand magnetos. All repairs within 2 days carried out in our up-to-date factory and strictly guaranteed 12 months. A complete range of guaranteed magnetos in stock for any light car. Quantities per return. Spares a speciality. Reliance Magneto Repairing Co., 285 St. John St., London, E.C. 1. 485-100

**WEYSIDE ENGINEERING WORKS,** Farnham Rd., Guildford. Cars cut, cylinders re-ground, welding. Components and assemblies made from sketch or pattern. General repairs. Prompt delivery. 484-h136

## MISCELLANEOUS.

**ALUMINIUM** number plates, best quality, embossed, any number within 24 hours, post free 15s. per pair. Freeman, Oakes and Co., Ltd., Devonshire St., Sheffield. zzz-307

**COACHWORK** shabby? Flint's polish instantly renovates, 1s. 6d. post free. Flint, Chemist, Newport, Mon. 491-115

**NUMBER** plates, cast, aluminium, raised polished letters, black background, 14s. 6d. per pair, delivered. H. J. Barlow and Co., Westbury. zzz-135

**MORGAN** spares. The Stevens Motor Co., Ltd., Stevenage, Herts., can supply the following from stock, carriage paid—Bavel nuts, 7s.; chassis, 41s. 9d.; rear wheel bearings, 13s. 9d. All spares supplied makes' prices, plus carriage. Phone, Stevenage 53. zzz-769

**DASH** switchboards, 4 way, with ammeter, 20s.; with ammeter and voltmeter, 35s. each net. Leslie Dixon and Co. (Dept. H), 9 Colonial Ave., Minorities, E. 1. zzz-567

**SINGER** (genuine) 10hp spares: Axle shafts, 37s. 6d.; bevel pinions, 50s.; ditto bearings, 12s. 6d.; valves, 3s. 6d.; carriage paid. Crow Bros, Guildford. 524-c865

**ALUMINUM** alloy pistons. Our pistons signalize efficiency for 20,000 miles; cylinders ground; pistons fitted; trade supplied. Commercial Engineering, Halifax Rd., Keighley. 488-e003

**PETROL** economy, extra-air valves, dashboard control, 10s. 6d., fits any car. J. W. Robins. zzz-135

**SPEEDOMETERS,** complete, season models, 45s.; trips, 55s. J. W. Robins, Speedometer Specialist, 97 Litchmere Rd., Batterssea. 490-635

**SINGER** steel wheels, 26s.; road springs from £1 pair; light tubular axles, fitted 26 by 2 1/2 B.E. wire wheels and domed guards, £3 2s. 6d.; 6hp Warrick engine, £10; Warrick back wheel with 2 speed gear, £5 10s.; Solex carburettor, 55s.; Zenith, 65s.; Bosch Z4A, £6; Freeman 2 cylinder, £3 7s. 6d. Harcope Motors, 10 Park Rd., Dulwich, S.E. 21. zzz-8

**MORGAN** owners! Write for illustrated list describing the Hall "5 second jack," designed for the Morgan; quick, simple, efficient. 9, Hall, 91 St. Peter's St., St. Albans. zzz-27

**AVRO** wheels, with Palmer cord tyres and tubes, 700 by 75, 700 by 100, 8s. each; axles, 3s.; Avro aluminium bucket seats, 5s.; basket bucket seats, 2s.; Dover steering wheels, off Handley Page controls, 15 ins., 6s. 6d.; Bowden brake levers, with length of cable and adjuster, 2s. 6d. post free; single Bowden ratchet controls, 3s., post free; dashboard spot lamps, brackets, with 2 volt bulb, 8d. postage 2d.; bulbs, 2 volt, 1s. doz., postage 2d.; altimeters, 7s., postage 9d.; rev. counters, with 2-1 and 7-1 gearbox and flexible drive, 14s., postage 1s. 3d.; air-speeds, with pilot head, 7s. 6d., postage 9d.; radiator thermometers with ether tube and dial, 7s. 6d., postage 9d.; genuine Avro watches, 8-day, with holder and pad, white and black dial, 35s., postage 8d.; New Lodge and K.L.G. plugs, in boxes, 1s. 4d. each, postage 2d. each, or 1s. doz.; C.A.V. starting magnetos, 18s. 6d., postage 1s. 6d. All goods packed free and sent carriage forward. Send 2d. for list of airtel parts. Coley, Ordnance Works, Queen Elizabeth Rd., Kingston-on-Thames. 484-h655

**ROVER,** Coconut mats of best short fibre supplied to fit 8hp Rovers, neat and extremely comfortable for the winter, £2, carriage paid. Barker's Motors, 194 Balham High Rd., S.W. 12. zzz-669

**ACCUMULATORS,** slightly soiled, otherwise new, 4 volt 40 ampere, 20s. 6d.; 60 ampere, 29s. 6d.; 80 ampere, 36s. 6d.; 6 volt sizes, 5 per cent. more; others in stock. Net cash with order; carriage extra. The Essex Accumulator Co., Ltd., 499 Grove Green Rd., Leytonstone, E. 11. zzz-695

**R.A.F.!** R.A.F.!! R.A.F.!!! Government surplus, leather motorling coats, double breast, storm collar, wind cuffs, lined fleece, few oil stains, otherwise good, 65s., post 1s. 6d.; better condition, 70s.; state chest and length. Bleach, Tallor, Marmion Rd., Portsmouth. zzz-846

**STRAPS,** best quality, full grain leather, 148 ins. long, with leather runner and brass buckles, 6s. per dozen, carriage paid; sample pair, post paid, 1s. Spring Rod Co., Cherry Tree, near Blackburn. 484-171

**MORGAN** chains, new, Coventry, high or low gear, 39s., post free. Hogg, 12 High St., Marylebone. 484-k972

**LIGHT** car, practical design for home building, not a freak, drawings 7s., parts supplied. Davey, 2b Alexandra Rd., New Southgate, N. 11. 488-k977

**EMSCOTE** light car gearbox, 3 speeds and reverse, complete with propeller shaft and tube, brand new, £10; quarter-elliptic springs, 21 by 1 1/2 ins., 7s. 6d. each; rack and pinion steering gears with column, new, 30s. each; also spare parts for Emscote cars. Below. zzz-135

**ZENITH** carburettors, horizontal fitting, 50s.; Claudel-Hobson ditto, 42s. 6d.; Stewart speedometer for 700 by 80 wheel, complete and nearly new, 70s. All Holland, Hearsall Lane, Coventry. Phone 1945. 484-138

**MISCELLANEOUS (continued).**

**FRICION** drive sets and countershafts for light cars, any car part made to customer's drawings. Friction rings, driving plates, friction wheels, pulleys, fixed and adjustable, all sizes. Ponsford, 219 Grove Green Rd., Leytonstone, E. 11. 484-172

**FRONT** axle, with 650 by 65 detachable steel wheels and springs, £3 10s. 6hp w.c. vertical engine, m.o.v. with magneto, carburettor and handle, perfect unit, £15; a similar unit, air-cooled, £13; Solex carburettors, 45s.; 3 Wheeler ash frame and cross members, 30s. Harlequin Motors, 10 Park Rd., West Dulwich, S.E. 21. zzz-966

**NUMBER** plates, cast aluminium, raised, polished letters and border, any number, 15s. pair; send for folder. Towler, 22 Thorn St., Burnley. 484-435

**CALCOTT** spares. Always a good stock of Calcott spare parts for immediate delivery. We are authorized agents for Calcott cars. Trade supplied. Wilkins, Simpson, opposite Olympia, London. 484-1415

**LIGHTEST** jacks, 24 oz., 6 ins., 8 ins., 10 ins., 4s. 9d. post. Henry Stephens, Stonehouse, Gloucestershire. 484-a-8

**CHATER LEA** channel-iron cyclecar frame for sale, complete with springs, wheels, steering gear, bonnet, etc., must sell. Apply, 54 Deycourt Gdns., Uppminster, Essex. 484-8315

4 700 by 80 **ARTILLERY** wheels, 2 hornet fasteners, silencer, pair ferrule electric side lamps, lot, 50s.; separate. Kreglin, 1 Newark Terrace, Lyle Rd., Greenock, N.B. 484-17

**ROVER** 5hp dieky seats, complete set of fittings, with full instructions, £5. can be fitted by an amateur in about an hour. Photograph, 6d. Carter, 82 Leghorn Rd., Harlesden, N.W. 10. 484-a-20

**MORGAN** Spare Part Depot. Spares for all models in stock. Elce, Ltd., 15-16 Bishopsgate Avenue, Canonville St., E.C. 3. Phone, Avenue 5548. 484-958

**UNIVERSAL** Spotlight, solid brass, used once, cost 50s., sell 35s., post free. Coombe, Outfitter, Holworthy. 484-a-52

**SET** of light car wheels and axles (belt drive), 26 by 2 1/2 by 2 1/2, £5. Bastons, 228 Pentonville Rd., King's Cross, London, N.1. 484-961

8hp **CHATER LEA** engine, magneto, front axle, rear axle, wheels, clutch, gears, transmission, brake assembly, etc., etc., price £25 or near offer; no dealers. Apply, E. H. Slater, Crown Hotel, Slough. 484-985

**MORGAN.** Side lamps and generator, £2 5s.; D.A. cylinder, £2; Stewart horn, 10s.; spring seat-mattress, 25s.; Rushmore headlamp and bracket, £1 5s.; 3 Golders Green Crescent, London. 484-34

**GEARS** and **brakes** in stock for Humberettes, Swifts, Premiers, Trumbulls, Calhorns, Rovers, Decenters, Mathis, Perry, Peugeot, Singer and Standard. The Streatham Engineering Co., Ltd., 47 Streatham Hill, London, S.W. 2. zzz-57

**MORGAN** spare parts, chains, Stepany tyres, always in stock. Overhauls and repairs by experts. Puffer Service Depot, 21 Leicester Grove, Blackman Lane, Leeds. Phone 22578. 487-a136

**LIGHT** car gearbox, 3 speeds, reverse, suit 10-12hp, perfect condition, bargain, £6. Fisher, Roschigli, Heston, Hounslow. 484-a147

**CYCLECAR** frame, wheels, tyres, steering gear, petrol-oil tanks, radiator, brass, £90, would separate. Wright, 595 City Rd., London. 484-316

**ROVER** 8 owners. Why waste money? The Arc atomizer air inlet will increase fuel mix; and your pleasure in driving. Descriptive folder from Arc Manufacturing Co., 15 Manchester Rd., Hyde. Agents wanted. 484-a112

**MOTOR** shed, 12 by 9, best weatherboarding, covered extra sheeting corrugated iron, £15, in Chiswick; also bench, etc. 19 Avenue House, Henry St., St. John's Wood. 484-a115

**PATENTS.**

**DESIGNER** invites cyclecar manufacturers to examine working model of variable and reverse speed gear which combines lightness, cheap production, and application; semi-automatic control; eminently suitable for low-priced propositions for competition with M.C. combinations; drawing if desired. Advertiser would like to meet with influential automobile engineer, who could assist with exploitation of invention; quarter share offered. Box No. 7729, c/o. "The Light Car and Cyclecar." 484-a165

**PATENT AGENTS.**

**PATENTS** and trade marks. Advice and handbook free. B. T. King, Registered Patent Agent, 146a Queen Victoria St., London. zzz-696

**W. BRYSOON**, B.Sc., Assoc. M. Inst. C.E., A.F.R.Ae.S., Chartered Patent Agent, 29 Southampton Buildings, London, W.C. 2. Phone, Museum 3651. 507-964

**FREE**, 100 page patent guide, post 6d. The Consulting Patent Agency, 253 (H) Gray's Inn Rd., London. 495-10

**RADIATORS.**

**BOWMAN RADIATORS, LTD.**, guarantee all repairs and replacements. Honeycomb Ford radiators from stock. Send for illustrated leaflet. Below.

**BOWMAN RADIATORS, LTD.** Trade supplied with blocks, tubes, etc. 56 Pritchett St., Birmingham. Phone, Central 2820. 522-896

**MIDLAND (1913) EXPRESS SERVICE** for radiators, tanks, wings, etc. Midland Motor Radiator Co., Aston, Birmingham. Central 705. "Radiator, Birmingham." 488-d569

**REPAIRERS.**

**MAGNETOS!** Try the Mico Repair Service. B, Bidley Place, Newcastle-on-Tyne. 486-154

**CYLINDER** grinding, new pistons, etc., accurate and highly-finished work, prompt delivery; price list sent on application. W. and F. Wills, Ltd., Engineers, Bridgwater. zzz-981

**STANDARD** car repairs, mechanical and coachwork, 9.5hp model specialized in. Sole London agents for several years. First-class mechanics. Moderate charges. Pytchley Autocar Co., Ltd., 42a Walmer Rd., North Kensington, W. 10. Park 1299. zzz-702

**FOR** all G.N. and light car repairs, tuning and overhauls, bring your car to the G.N. and light car specialists. Prompt and expert attention. The Eastgate Garage and Works, Lewes. 492-h23

**A.C.** authorized repairers. The Lancaster Motor Co.

**A.C.** We specialize in repairs to A.C. cars. Complete overhauls, re-painting, trimming, hood covering, etc., first-class workmanship, moderate charges.

**A.C.** spare parts. We keep a large stock for all models.

**A.C.** authorized repairers. The Lancaster Motor Co., 158 Norwood Rd., West Norwood, S.E. 27. Phone, Streatham 2541. 494-826

**CALCOTT** repairs. We specialize in repairs to Calcott cars, any kind, small or large. Complete overhauls, hoods re-covered, repainting, etc. We are authorized agents for Calcott cars. Trade supplied. Wilkins, Simpson, opposite Olympia, London. 484-1416

**ALLOW** us to give you a free estimate for repairing or overhauling your car; competitive prices; all work guaranteed; fully-equipped workshops. Gerald Rolls and Co., 4 Little Cadogan Place, Belgrave Square, B.W. 1. Victoria 2914. 484-14

**REPAIRERS (continued).**

**MORGAN** and G.N. overhauls and repairs. Years of experience behind us. Advice given. Open Sunday mornings. Luna Motor Co., Daleham Mews, Hampstead. Phone, 4608. 484-a120

**CYLINDERS** re-ground, new pistons, complete, cycle or car, in 4 days; complete engine overhauls. Conington, Engineers, 22 Leampit, Vale, Lewisham. zzz-87-a95

**CYLINDER** grinding, new pistons fitted, engine overhauls, accuracy guaranteed. Robins, Chapman and Co., York St., St. Paul's, Bristol. 496-a197

**SITUATIONS WANTED.**

**ADVERTISER**, now disengaged, desires position with firm contemplating production low-priced light car or cyclecar; carry through design, construction and testing, reducing expenses to minimum, would arrange major remuneration on sales basis on production. Box No. 7725, c/o. "The Light Car and Cyclecar." 484-a132

**TOOLS AND PLANT.**

£2 2s. Cass's Motor Mart, Ltd., offer a set of 32 tools, complete with tray, metal box, lock and keys, post £4 10s.; photo, on application. 5 Warren St., W. 1. Museum 623. 484-980

**TUITION.**

**THE BRITISH SCHOOL OF MOTORING, LTD.**, is indispensable to motor users. Special facilities for training car owners in essential knowledge of correct and economic running of cars. Largest and most comfortable instruction works. Lowest fees. Call or write, free prospectus. B.B.M., 5 Coventry St., Piccadilly Circus, W. zzz-936

**TYRES AND TUBES.**

700 by 80 covers, all makes, £2 5s. each; 700 by 85 covers, £2 5s. each; 710 by 90 covers, £2 5s. each; 760 by 90 covers, £2 10s. each. Other sizes pro rata. The General Motor and Tyre Co., 81 Queen St., Hammersmith, W. 6. zzz-242

**BULL'S.** The Light Car Tyre Specialists. Huge stocks Dunlops, Michelines, Beldams, etc.

**BULL'S.** 650 by 65 Goodrich safety, 39s. 6d.; Dunlop steel stud, 55s.; tubes, 8s. 6d.

**BULL'S.** 550 by 65 Goodrich safety, 37s. 6d.; Pirelli steel stud, 55s.; tubes, 8s. 9d.

**BULL'S.** 700 by 80 Michelin Universal, 69s. 6d.; Avon Sunstone, 65s.; Avon ribbed, 45s.; Beldam Bulldog, 50s.; Dunlop Magnum, 55s.; do. cord, 59s. 6d.; tubes, 9s.

**BULL'S.** 700 by 85 Beldam Bulldog, 55s.; Dunlop steel stud, 60s.; tubes, 9s. 6d.

**BULL'S.** 710 by 90 Goodyear all-weather, 65s.; Michelin Universal, 65s.; Dominion plain or Wood Milno ribbed, 45s.; steelstudded do, 55s.; tubes, 10s.

**BULL'S.** 750 by 90 Goodyear all-weather, Dunlop Magnum or Michelin Universal, 77s. 6d. each; Clincher rubber n.s., 65s.; Dunlop steel-stud, 85s.; McGraw rub n.s., 50s.; Rodace ribbed, 47s. 6d.; tubes, 10s. 6d.

**BULL'S.** 765 by 105 Michelin ribbed, 75s.; Clincher ribbed, 65s.; tubes, 12s. 6d.

**BULL'S.** 28 by 3 rubber n.s. covers, 38s. 6d.; tubes, 7s. 6d.

**BULL'S.** Second-hand covers, all sizes, 25s. to 35s.

**BULL'S.** All above new blemished goods. All sizes of light car tyres stocked at all good value, 7 days' approval against remittance, satisfaction guaranteed.

**BULL'S RUBBER CO., LTD.**, 3 Upper St. Martin's Lane, London, W.C. 2. Phone, Gerrard 1547. zzz-618

**ECONOMIC TYRE CO.** Clearance and blemished covers and tubes at greatly reduced prices. All goods sent on 7 days' approval, carriage paid against remittance.

**ECONOMIC.** 550 by 65 (Baby Peugeot and Temperino) Goodrich Safety blemished (warranted), 37s. 6d.; Michelin tubes, 11s. 9d.

**ECONOMIC.** 650 by 65 Goodyear Diamond, 30s.; 700 by 80 Goodyear Diamond, 50s.; car valve tubes, 8s. 6d.

**ECONOMIC.** 760 by 90 McGraw ribbed or non-skid, 50s.; 765 by 105 (overize 760 by 90) Keystone factory wrapped, 65s.

**ECONOMIC.** 28 by 3 American light car Fisk rubber non-skid, 42s. 6d.

**ECONOMIC.** Full range of standard Dunlop, Michelin, Goodyear, etc. Trade supplied.

**ECONOMIC TYRE CO.**, 314 New Cross Rd. (near Town Hall). Phone, New Cross 1395. Repairs and retreading. 484-90

**WANTED—Cars.**

**CASH** on slight for cars, light cars and cyclecars, any make, age or condition. Write, phone or call. Short and Glass, Ltd., 485-493 Upper Richmond Rd., East Sheen, S.W.14. Phone, Richmond 2362 and 2363. zzz-522

**SPECIAL** cash buyers, Lagodas, Horstmanns, G.W.K.s, Citroens, G.N.s, Chaparrals, Singers, Saxons, Swifts, Standards, Rovers, Calcotts, Morris, Oxford's, Wandsworth Motor Exchange, Ebner St., Wandsworth (Town Station). 503-40

**WANTED**, Morgans, especially water-cooled, very best prices paid, must be in sound condition. Maudes', 100 Gt. Portland St., London, W. 1. zzz-967

**SELL** your light car to the Light Car Co., specialists in cars for economical motoring, 331 Euston Rd., London. Phone, Museum 3081. zzz-754

**WE** shall be pleased to hear from owners of second-hand cars who wish to exchange for new cars with cash adjustment; best possible prices allowed. Vivian Hardie and Lane, Ltd., 23 and 24 Woodstock St. (off Blenheim St.), New Bond St., W. 1. zzz-599

**AUTO-BUYERS, LTD.**, specialize in exchanges and cash purchases of cars. Any car taken in exchange, and quick deliveries of all 1922 models. Landauls and all-weather cars urgently required. 5-6 Eden St., Hampstead Rd., N.W. 1 (near Maple). Tel. Museum 6149. zzz-867

**5 PER CENT**, commission only charged to sell your car. Why not send your car to our showrooms, the best equipped south of the Thames, on main London-Brighton road, and in finest position? Photos with pleasure on request. Telford Garage, 47 Streatham Hill, London, S.W. 2. Telephone, Streatham 2010. zzz-78

**HUMBERETTES**, Tamplina wanted. Spot cash. Wandsworth Motor Exchange, Ebner St., Wandsworth (Town Station). Phone, Latchmere 4686. 532-370

**CASH** for cars.

**YOU** will be sure of getting full market price if you sell to the Light Car Co., 331 Euston Rd., London, N.W.1. Phone, Museum 3081. zzz-519

**HAVING** a large sale for second-hand cars in really good condition, we are able to offer exceptional prices for same in part payment for new cars. Telford Garage, 47 Streatham Hill, London, S.W. 2. zzz-756

**THE BEST BARGAINS**

in second-hand light cars and cyclecars are offered in these pages.

## WANTED—Cars—(continued).

**MORGANS**, Gardens wanted. Spot cash Wandsworth Motor Exchange, Ebner St., Wandsworth. (Town Station). 532-369

**WANTED**, 1921 Snp Rover car. 150 Euston Rd., King's Cross, Museum 4827 zzz-440

**F.O.C.N.** pay highest possible price for good second-hand cars on sight. Courteous treatment assured. Exchange a speciality. Fair Offer Car House, 5 Heath St., Hampstead (near Tube). Phone, Hampstead 5752. Hours 9-7, including Saturdays. 484-976

**CASS'S MOTOR MART, LTD.**, purchase and supply all leading makes of new and used light cars, arrange exchanges, deferred terms; highest prices paid; distance no object. 5 Warren St., W.1 (Museum 623), or 245 Brompton Rd., S.W. 5 (Kensington 2194). 484-981

**A.-C.s, A.-C.s, A.-C.s.**  
**WANTED** immediately, a number of 1920-21 A.-C.s, 2 or 4 seaters, highest prices paid; send full particulars and chassis number. Alfred Wastnag, 65 Gt. Portland St., W. Tel., Lang. 2172. 484-907

**MORGANS**. All model. In good order urgently wanted; good prices or taken in part payment. Reys, of Euston Rd. (378-584). Phone. Museum 6436. 484-930

**C.N.s**, not earlier 1921, in good order, urgently wanted; good price, or taken in part payment. Reys, of Euston Rd. (378-584). Phone. Museum 6436. 484-929

**WANTED**, Morgans, Rovers and G.N.s, in good condition, good prices paid. Reys, of Euston Rd. (378-584). Phone. Museum 6436. 484-928

**MORGANS** wanted. Particulars requested of 1921 model, reasonable price. Heather, Bushey Heath, near Watford. 487-k356

**ROVERS**, not earlier 1921, in good order, urgently wanted; good prices or taken in part payment. Reys, of Euston Rd. (378-584). Phone. Museum 6436. 484-927

**REYS**, of Euston Rd. (378-584), are urgently requiring good second-hand A.-C., Calcott, G.W.K., Singer, Standard, Swift, Wolseley, and Hillman cars; good prices paid. Phone, Museum 6436. 484-926

**REYS**, of Euston Rd. (378-584), will purchase any up-to-date light cars for cash or take in part exchange for new. Phone, Museum 6436. 484-925

**WANTED**, late model A.-C., Singer, Rover or similar light car for cash. Rolls, 4 Little Cadogan Pl., Belgrave Sq., S.W. 1, Victoria 2914. 484-113

**REQUIRED**, reliable 2 seater, late model. 51 Spenser St., Victoria, S.W. 1. 484-6

**WANTED** immediately, 1921-2 Rover Eight. 23 Great Queen St., Kingsway. Regent 5198. 484-985

**L. M. PUGH**, 9 South Molton St., London, W. (Mayfair 4433), wishes to purchase at once late model Morris-Oxford, Standard, A.-C., and Rover cars, etc.; distance no object; cash in every instance and highest possible prices. Submit particulars for firm cash offer. 484-30

**1921 ROVER** eight required at once. Write, Rover, c/o Scripps, South Molton St., London, W. 484-29

**WANTED**, Bugatti 2 seater; cash waiting. Send particulars to A. 136 Ravensbury Rd., Earlfield, London, S.W. 484-33

**WANTED**, 2 or small 4 seater; write full particulars, lowest cash price. Amery, Victoria Rd., Guildford. 484-48

**WANTED**, Morgan, w.c. preferred, or light cyclecar, cheap for cash, no dealers, full particulars. Brantom, Plumber, Bletchley, Bucks. 483-158

**WANTED**, 2 seater, 3 or 4 wheeler, cheap. Smith 87 Garnethill St., Glasgow, Scotland. 484-154

**1921 ROVER** eight; state chassis number, lowest price. 4 Bertram Rd., Hendon. 484-160

**MORGAN**, 1920 or 1921, de luxe or Grand Prix, cheap for spot cash. Varney, 58 Cowley Rd., Oxford. 484-161

**CRANAME-WHITE**, about £50 any distance. Write fullest particulars, 9 Priestley Ave., Odsal, Bradford. 484-166

**LATE** model light car, cash. CS, 14 Swaton Rd., Bow. Tel. E. 3155. 484-938

**WANTED**, 2 or 4 seater Singer, Calthorpe, A.-C., Hillman or similar late model. 69 St. Paul's Ave., Willesden Green, London. 484-108

**CROUCH**, Rover or similar car wanted; lowest price and particulars. Lulworth, Grindledorf. 484-111

**MORGAN**, 1921-22, water-cooled, must be cheap, cash waiting. H. 63 Solon Rd., Brixton. 484-118

**WANTED**, water-cooled Morgan, Coventry-Premier or Castle Three; reasonable price given, write or call any time. Billier, 9 Wallingford Ave., North Kensington. 484-125

**100 LIGHT** cars wanted; spot cash offered; exceptionally favourable terms for inclusion weekly auction if offer not accepted. Palmer's Garage, Tooting, London. zzz-88

**WANTED**, 2 seater, about 10hp, dynamo lighting, reasonable price for cash. 456 White-horse Rd., Thornton Heath. 484-167

**WANTED** immediately, 2 and 4 seaters. Seabridge, Hansler Rd., East Dulwich. Telephone, Sydenham 2452. 484-191

**10-12hp 4 SEATER**, self-starter, maximum £500. Box No. 7731, c/o "The Light Car and Cyclecar." 484-175

**MORGAN**, G.P. or de luxe, w.c. M.A.G., 1920 or later; state price. 12 Brooks Rd., Chiswick, W. 4. 484-171

**WANTED**, 1920-21 light car, 2 or 4 seater, no dealers. Box No. 7734, c/o "The Light Car and Cyclecar." 484-74

**PALMER'S GARAGE**, Tooting. The pre-eminent place for disposing of car, and motorcycle.

**PALMER'S GARAGE**, Tooting, will make you a cash offer at sight.

**PALMER'S GARAGE**, Tooting. You will be sure of a good cheque if you sell your car or machine at Palmer's Garage.

**PALMER'S GARAGE**, Tooting. Thousands of men have sold their cars and machines here.

**PALMER'S GARAGE**, Tooting. No garage charge is incurred until 7 days' notice is given.

**PALMER'S GARAGE**, Tooting, will collect cars and machines from any London railway station. The auction sale is held every Thursday, commencing 2 p.m.

**PALMER'S GARAGE**, Tooting. If cash offer not accepted machine can be included in auction sale held every Thursday.

**PALMER'S GARAGE**, Tooting. You fix the price and we do the rest.

**PALMER'S GARAGE**, Tooting. Terms: Selling commission, 7½ per cent, not chargeable unless machine is sold; if no sale, a nominal auction fee is charged. For motorcar, 20s.; motorcycle, under £50 value, 5s.; ditto over £50 value, 10s. When we effect a sale these charges are cancelled and commission charged.

**PALMER'S GARAGE**, Tooting. Catalogue free. Telephone, 208 Stratford-Lam. Telegrams, "Palmer's Garage, Tooting." 484-55

## WANTED—Cars—(continued)

**WANTED**, a number of good second-hand cars and motorcycles required in part payment for new or other models. Cash either way. Distance no object. Newham Motor Co., 225 Hammersmith Rd., W.6. Phone, Hammersmith 80. 484-937

**COVENTRY-PREMIER** 3 wheeler, dickey model, wanted immediately; combination part exchange. Write lowest price, Warden, Hampden Club, N.W. 1. 484-196

**MORGANS** wanted, several buyers waiting. May we offer yours? Bunting's Motor Exchange, Wealdstone. 484-60

**SWIFT** cyclecar wanted at once. Write us, or Phone Harrow 195. Will come and view. Bunting's, Wealdstone. 484-59

**COUPE** wanted, recent model, cheap for cash. Box No. 7736, c/o "The Light Car and Cyclecar." 484-75

**GENTLEMAN** requires 2 seater, 4 cylinder, with dickey, about 1914-1916, such as Stellite, Hillman, etc., consider any popular make of sound and good value. State price, etc., Box No. 7735, c/o "The Light Car and Cyclecar." 484-72

**JOWETT** light car wanted. State year, price, chassis no. Box No. 7735, c/o "The Light Car and Cyclecar." 484-65

## Wanted—Miscellaneous.

**WANTED**, Morgan hood, good second-hand or new, price, etc. Hippi, Kidwelly. 484-145

**CONNECTING** rod (No. E1145) for 1914 G.W.K., Simplex engine. H. Anderson, Croxdale, Durham. 484-155

**INVALID** (novice), owner 10hp 2 seater, wants leisurely 1,500-mile tour in best rural parts in and about Surrey, Kent, and Sussex, going doubling if necessary, to avoid anything approaching a dangerous hill, or anything needing skill, or any hill more than say 1 in 12, if possible; starting and finishing Reading. £1 is offered for best itinerary. Box No. 7730, c/o "The Light Car and Cyclecar." 484-172

## BOOKS AND PUBLICATIONS.

**"THE MOTOR MANUAL."** 23rd edition. No fewer than 600,000 copies of "The Motor Manual" have hitherto been sold. The new edition has been entirely re-written and re-illustrated throughout. It has been brought up to date in every way, and in its revised form it is the simplest, fullest and most authoritative explanation of everything connected with motoring. It is the standard work for all practical owners and drivers, and, in addition, forms the usual introduction for all who are about to motor. 3s. 6d. net; post free, 3s. 10d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"THE MOTOR ELECTRICAL MANUAL."** 1st edition. An authority on all electrical matters concerning the car. Clearly written and well illustrated, it forms a standard reference for all motorists. 3s. net; post free, 3s. 3½d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"THE MANUAL OF MOTOR MECHANICS."** 4th edition. The only handbook of its kind dealing with engine tuning for speed, power, and economy. The functional working of an internal-combustion engine is fully explained. The tuning of carburetors of any make for any specific purpose is made clear, whilst the most recent deductions of modern research are incorporated. 3s. 6d. net; post free, 3s. 9½d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"MOTOR REPAIR WORK."** 3rd edition. A thoroughly practical handbook dealing with the home repair of motor vehicles. The best and latest workshop practice is incorporated, and the whole subject is dealt with very fully, assisted by remarkably clear illustrations. With the assistance of this handbook, the owner-driver having only a limited mechanical ability can carry out satisfactory repairs to his car in his own garage. 1s. 9d. net; post free, 1s. 11d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"HOW TO DRIVE A MOTORCAR."** 7th edition. This book is intended for every motorist. The result of a wide experience on the road and practice in the handling of many makes of cars has enabled the writer to become acquainted with many of the inside secrets of driving. Everything worth knowing in connection with driving the car on the road is to be found in this book. 3s. 6d. net; post free, 3s. 9d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"MOTOR CYCLING MANUAL."** 5th edition. An entirely new edition, re-written, revised and re-illustrated throughout. A profusely-illustrated text book in which is described every feature of the motorcycle and the manner in which it functions. The best driving methods are briefly dealt with, also the care and maintenance of the machine. 2s. 6d. net; post free, 2s. 9d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"MOTORCYCLE EFFICIENCY AND HOW TO OBTAIN IT."** A new practical handbook for motorcyclists. Written in the simplest non-technical language, it describes how any type of motorcycle can be maintained at its highest pitch of efficiency, and expense, time, and labour be economized. 200 pages of practical information; 150 clear illustrations. 2s. 6d. net; post free 2s. 9½d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"THE ART OF DRIVING A MOTORCYCLE."** 3rd edition. The standard handbook for motorcyclists, containing full information on the care and upkeep of both solo and sidecar machines. It has been carefully revised by the staff of "Motor Cycling." 2s. 6d. net; post free, 2s. 9d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"THE STEAM WAGON MANUAL."** 1st edition. A well-illustrated handbook, giving information as to how to get the best out of all types of steam road vehicles. Maintenance, overhaul, garage and running repairs are fully dealt with. 2s. net; post free, 2s. 2½d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"THE MOTOR BOAT MANUAL."** 8th edition. A new and revised edition of a practical guide to the maintenance and overhaul of all types of coastal and river motor craft. Contains many useful hints and tips. 3s. net; post free, 3s. 3d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"THE MARINE OIL ENGINE HANDBOOK."** 6th edition. Ready shortly. The standard reference on all classes of internal-combustion engines for marine work. The theory and working of each type simply explained in text and illustration. 3s. 6d. net; post free, 3s. 9d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**"CYCLING MANUAL."** 4th edition. An instructive handbook for all users of bicycles and tricycles. The care, repair and upkeep of all types of pedal machines, tricycles and tandems are dealt with. Written by the staff of "Cycling." 1s. 6d. net; post free, 1s. 8d. Temple Press Ltd., Technical Publishing Department, 7-15, Rosebery Avenue, London, E.C. 1.

**EDITORIAL AND BUSINESS NOTICES.**

"The Light Car and Cyclecar" is published in London every Friday morning.  
 Head Offices—7-15, Rosebery Avenue, London, E.C.1. Telephone—No. 5293 Holborn (five lines). Telegrams—"Prestimus, Holb., London."  
 Midland Offices: 16 Bennett's Hill (corner New Street), Birmingham. Telephone: No. 6014 Central. Telegrams, "Presswork, Birmingham."  
 6, Warwick Row, Coventry. Telephone—No. 1775 Coventry. Telegrams—"Presswork, Coventry."  
 Northern Offices—196, Deansgate, Manchester. Telephone—Central 2467. Telegrams—"Presswork, Manchester."

**EDITORIAL.**—All Editorial communications and copy must be addressed to "The Editor," and must reach this office not later than first post Tuesday morning. Drawings or MSS. which are not considered suitable will be returned if stamps are enclosed, but the Editor does not hold himself responsible for safe keeping or safe return of anything submitted for his consideration.

Accounts for contributions should be sent in, immediately after publication, addressed to "The Manager." Payment will be made during the month following publication. All drawings and other contributions paid for and published in this journal are the copyright of the publishers, from whom alone authority to republish or reproduce can be obtained.

**SUBSCRIPTION.**—THE LIGHT CAR AND CYCLECAR will be mailed regularly at the following rates:—

	12 mo.	6 mo.	3 mo.
United Kingdom	21s. 6d.	12s. 6d.	5s. 6d.
Abroad	24s. 6d.	12s. 6d.	6s. 6d.

**REMITTANCES.**—Postal orders, cheques, etc., should be crossed and made payable to "Temple Press Limited." All letters regarding subscriptions, advertisements and other business matters must be addressed to "The Manager."

(Other Business Notices will be found on the first page of this section.)

**FUEL CONTROL**  
 From Steering Column.  
**MAXIMUM ECONOMY** and **EFFICIENCY** without any tap twiddling. The amount of fuel flowing through the jet is definitely controlled by the driver without any device on the jet itself.  
**"DIXON" PRODUCE BALANCE VALVE JET CONTROL**  
 For any engine and any carburettor.  
**EVERY USER thoroughly SATISFIED**  
 Easily fitted in a few minutes. Satisfaction guaranteed.  
 Description Leaflet Free from  
**B. DIXON-BATE, CHESTER.**  
 Agents wanted where not represented.



40/-

**Pelido** Price 1/6  
 Regd. Trade Mark.  
 Patent applied for **SKIN CREAM**

PELIDO prevents dirt, grease and oil penetrating the skin. If you PELIDO YOUR HANDS **FIRST**, you can tackle any dirty, greasy adjustment or repair and all dirt and grease instantly wash off with soap and cold water.

To be obtained from leading Garages, Stores, Chemists, Ironmongers, Grocers, etc. If any difficulty in obtaining, send 1/6 to "Pelido" Works, Devon Wharf, Mile End, London, E. 1, giving the name and address of your nearest retailer.



(Wholesale: Brown Bros. Ltd.)

**TRIVERS LIMITED**  
**MOTOR SPECIALISTS, NEWCASTLE-ON-TYNE.**

The **LIGHT CAR** Specialists.

Telegrams "MOCAR."  
 Telephones: Central, 612-613.

**METALASTENE**



TUBES 1- and 3- From LIVE Agents, all Halford's Depots, or Post Free from—  
**METALASTENE CO., Breck Road, Poulton-le-Fylde.**

**MAGNETO & DYNAMO REPAIRS SERVICE**  
 Also Self-starters, Batteries and General Electrical Equipment are speedily and thoroughly repaired by the—

**RUNBAKEN REPAIRS & SPARES SERVICE**  
 All work returned indistinguishable from new. Spare parts for every known make.  
**Connecticut Service Station.**  
 There is a Service Depot in every large town. Call to-day for a quotation.

HEAD OFFICE and WORKS—Derby Street, Chesham, Bucks.  
 MANCHESTER TOWN DEPOT—288, Deansgate.  
 LONDON DEPOT—115, Gt. Portland Street, W.1.  
 LEEDS DEPOT—32, Woodhouse Lane.  
 LIVERPOOL DEPOT—43, Newshaw Street.  
 BIRMINGHAM DEPOT—192, Corporation Street.  
 BRISTOL DEPOT—14, Colston Street.  
 PARIS DEPOT—40, Rue Brunel.

**MOTORISTS!**

Keep your running accounts in  
**The Motor Car LOG BOOK**  
 Only 2 minutes per day required.

This little Book, compiled by L. A. H. STOVELL, may be obtained from your Bookseller for 1/6, or post free 1/8 from—  
**KING, 2, Westwell Road, STREATHAM, S.W.**

**50 Miles round... London.**

The best map extant. Covers a wide range, yet every feature of interest shown. Four miles to the inch.

On cloth 3/- net; Postage 2d.  
 Paper 1/6 net; Postage 1d.

**TEMPLE PRESS LTD.,**  
 7-15, Rosebery Ave., London, E.C.1  
 Wholesale: E. J. LARBY Ltd., 30, Paternoster Row, Londpn, E.C.4.

**RIM RUST**

means perished tyre walls, long ere the tread is worn out. "ATLAS RUS-KILLA" kills rust, and prevents further formation. Quick drying, durable, elastic and enamel-like.

Ask your Garage for the tin with the red label.

**ATLAS PRESERVATIVE CO., LTD.,**  
 LONDON S.E.8

**"It kills the rust"**


**17/6 FOR THE LIGHT CAR OWNER only**

A reliable Dashboard Timepiece in Heavy Nickel Case. Secret fitting. Splendid finish. Exceptional price.  
**J. J. STANFORD CO.,**  
 108, Dale End, B'ham.



**THE KIDNEY OF THE CAR IS THE RADIATOR**

Water causes internal troubles. Preventable or curable by "BOILERINE" Tablets. Buy through the trade or seek free advice from—  
**BOILERINE, Ltd., LONDON, S.E.15.**



**The RHODE**  
9.5 h.p. Car

**T**HIS is eminently suited to the requirements of the Family Man, offering the efficiency and economy of the two-seater with dicky, and at the same time giving the comfort and weather-proof qualities of the four-seater, while the Commercial Traveller can accommodate his samples with ease and accessibility. Economical in operation, a fuel consumption of 45 M.P.G.

is easily obtained, while oil and tyre costs are in proportion. The equipment is complete and comprises every essential for a Perfect Road Performance. Demonstrations any time, any place.

Price - **£275**

Sole West Riding Agents:—  
**THE HEADINGLEY MOTOR AND ENG. CO., LTD.,**  
18, St. Michel's Lane, Headingley, LEEDS. Phone: 480 Headingley.

**LAGONDA**

—and—  
**G. N. Service Depot.**

*All spares stocked and car overhauls and repairs put through promptly.*

Immediate Delivery, with SERVICE AFTER SALE, of CLEMENT TALBOT, G.N. and LAGONDA Light Cars.

**Victor Horsman, LTD.**  
7, Mount Pleasant, Liverpool

**INSTRUCTIONS**  
*for amateurs to enamel a car*



**A** COPY of our new leaflet, entitled "Instructions for Amateurs to Enamel a Car with Robbialac," will gladly be sent to those giving the name of their nearest accessory dealer. Write Jenson & Nicholson, Ltd., Publicity Dept., Robbialac Works, London, E.15.

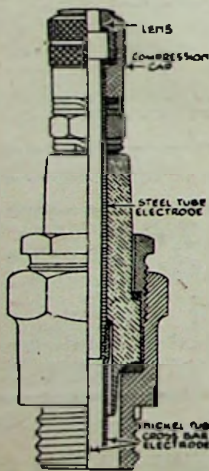
**ROBBIALAC TRANSPARENT.**—After enamelling a car with Robbialac apply a final coat of Robbialac Transparent. It gives an absolutely superfine coach finish to the work.

**ROBBIALAC BRUSHES.**—To get the best results with Robbialac Enamel and Robbialac Transparent Finish, it is essential to use the special Robbialac Brushes.



Sold by all Accessory Dealers.

**Removes Entirely Ignition Difficulties**  
**"VIEW"**  
Sparkign Plugs



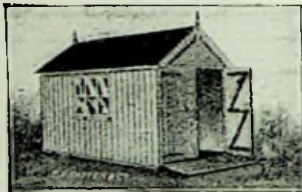
You can actually see it sparking under Compression.

No Priming Tap required. Also Self-cleaning.

Popular Price **7/6**

Post Free from—  
**A. REID & Co.,**  
Victoria Factory, MUSSELBURGH, Scotland  
And  
50, Borough Road, Kingston Hill, Surrey.  
Garages and R tailers Supplied.

**PRATTENS** For Quality and Value.



Carriage Paid.  
Long. Wide. Eaves. Price. Sills Floor 1st. 9ft. 7ft. **£21 5s. £5 16s.**  
No skilled labour for erecting.  
Other sizes at equally reduced prices. Catalogue Free Also Bungalows, Greenhouses, Etc.

**F. PRATTEN & CO., MIDSOMER BATH, NORTON.**  
Our Agents, Messrs. J. G. Graves, Ltd., Sheffield, will supply any of our goods on easy payment terms.

**For Quality & Efficiency**



**MAGNETOS**  
for Reliability under the most strenuous conditions

Makers: The M.I. Magneto Synd., Ltd., Coventry. Inquiries to S. Smith & Sons (M.A.), Ltd., Central Works, London, N.W.1.

**CYLINDERS REGROUND**  
and new pistons complete.

**LAYSTALL** EWER STREET, SOUTHWARK, S.E.1

**35/- 35/-**

**"Sentinel"**

**PRIVATE GARAGE BURGLAR ALARM**

A complete Electric Loud Bell Set—Easy to fit—Certain in action—Rings on door opening—Always ready—Never fails.

Let the "SENTINEL" guard your car. Don't be an unfortunate loser. Fit "SENTINEL" at once and rest assured.

PRICE **35/-** CARR. PAID.

Send for Descriptive Leaflet.

**MOTOR FITTINGS SUPPLY CO.**—39, Queen Street, Manchester.

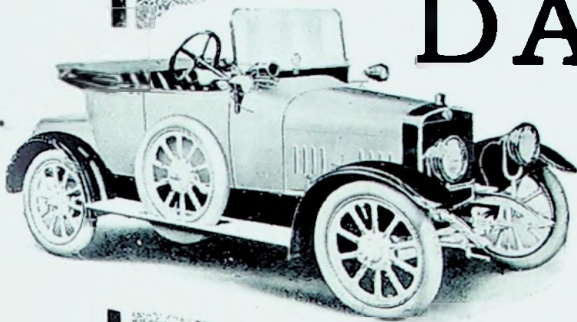


**PRESERVE your CYLINDERS.**

Withstands Heat, Petrol and Oil.

Tins, 1/2 and 2/- Post Free.

Owen Bros. & Co. Ltd., HULL, ENG.



# DAY-LEEDS LIGHT CAR

**DISTINCTIVE FEATURES of the  
DAY-LEEDS LIGHT CAR :**

High-grade quality of material throughout. Body of pleasing design, with dicky seat arranged to offer protection of windscreen to passengers. Exceptional width and length of seating accommodation. Upholstered in leather. Superior finish throughout.

**TAX - £10**

**OUR NEW PRICE**

Complete with electric lighting set and dicky seat.

**£ 395**

Electric Self-starter £25 Extra.

*Abridged Specification :*

**ENGINE.** — Day-Leeds, 10 h.p., 4-cylinder, 2½" x 100 mm. Clutch, internal leather cone. Transmission, 3-speed and reverse, bevel drive and differential. Steering, irreversible worm and segment.

Detachable steel wheels

Two-seater body and dicky seat; electric lighting set.

**JOB DAY & SONS, Ltd., Ellerby Lane, LEEDS.**

## POPULARITY

THE large and ever-increasing number of motorists owning the Cluley 10 h.p. Car testifies to the great popularity of this very desirable two-seater, popular because it is a real **QUALITY** car from design to finish—the ideal car for the owner-driver, light, serviceable, workman-like, and good to look upon, the production of engineers of experience and skill; popular also because it is a powerful and speedy car, and a famous hill-climber, taking the steepest of gradients with an easy and comfortable swing, which makes motoring a pleasure and delight. Popular again because it is an economical car both in initial outlay and in running cost, the minimum of petrol being used for the maximum mileage, and the wear and tear of tyres being negligible, mainly owing to the extremely good springing, which also ensures great carriage comfort and that ease of movement usually associated with the large and costly car "de luxe."

□□□□

Reliable and efficient in every detail, it is, above all, a **QUALITY** Car throughout, hence the wonderful success and popularity the Cluley two-seater has attained in motoring circles.

**"Popular" Model £350**  
complete with Lucas 6 volt Lighting Set.

**"De Luxe" Model £420**  
complete with Lucas 12 volt Lighting and Starter.

*Illustrated particulars and address of nearest Agent post free from the manufacturers.*

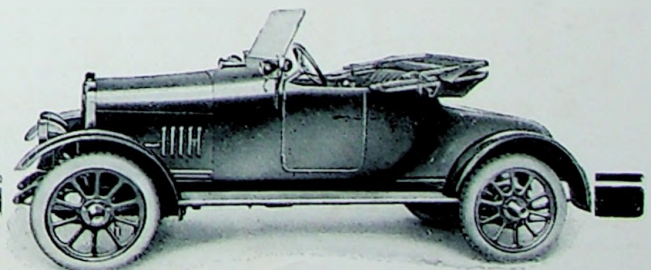
**CLARKE, CLULEY & CO.**  
COVENTRY.

Established 1890.



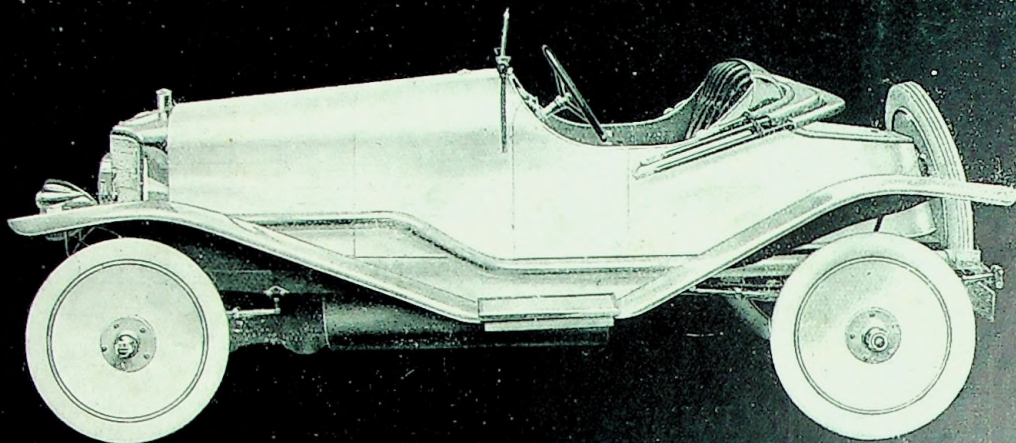
**CLARKE, CLULEY & CO.,**  
COVENTRY.

ESTABLISHED 1890.



10 h.p. CLULEY "Popular" Model.

PLEASE REFER TO "THE LIGHT CAR AND CYCLECAR" IN YOUR LETTERS TO ADVERTISERS.



*Hillman*  
 SPEED MODEL  
 H.P. R.A.C. RATING  
 9.76

*You cannot do better than  
 invest your money in a Hillman*

**A**DDITIONS to our own drop-forging plant have now enabled us to replace practically all malleable castings on our car with steel stampings made in our own shops, and heat treated to aircraft specifications. The advantage of steel stampings over castings, which are always liable to hidden weaknesses, is universally admitted. In offering what is practically an "ALL STEEL" chassis to the public, we are making a great stride towards what has always been the objective of The Hillman Motor Company—namely, to build the finest car it is possible to make, and to do it at a price that is competitive. It is only by adhering to this policy that we are able to give, with all our cars, a Guarantee more comprehensive than any other in the Motor Trade.

**10 h.p. HILLMAN Speed Model, £590**

*Specification and full particulars from*  
**THE HILLMAN MOTOR CAR COMPANY, LIMITED,**  
**COVENTRY.**

