

# MOTO GUZZI

# ZÌGOLO 98 cc SERIES II

INSTRUCTIONS FOR THE USE AND MAINTENANCE



# MOTO GUZZI

#### SOCIETA' PER AZIONI

STABILIMENTO E AMMINISTRAZIONE: Mandello del Lario (Como)

Via Emanuele V. Parodi, 27

Telefoni { Mandello Lario 71.112 (4 linee con ricerca automatica) Lecco 22.691

Collegamento ponte-radio con Milano e Genova Telegrammi: Motoguzzi - Mandello Lario

SEDE LEGALE: Milano - Via Durini N. 28
Telefoni: 705.784 - 705.785 - Telegrammi: Motoguzzi - Milano
FILIALE - CENTRO RICAMBI - OFFICINA RIPARAZIONI
Milano (640) - Via Giov. da Procida, 14 - (Filiale) Tel.: 341.421/341.296
(Centro Ricambi e Officina Riparazioni) Telefono 381.997
Telegr.: Filialmotoguzzi - Milano

UFFICI: Genova - C.so Aurelio Saffi, 29

Telefoni: 55.242 - 55.243 - 55.244 - 55.245

Telegrammi: Paromar - Genova

Roma - Via Barberini, 86 - Telefono 484.758

Telegrammi: Motoguzzi - Roma

Napoli - Piazza Municipio, 84 - Telefono 310.581

Telegrammi: Motoguzzi - Napoli

# ZÌGOLO 98 cc

SERIES II

INSTRUCTIONS FOR THE USE AND MAINTENANCE

# TOOL KIT

Tyre inflator.

Screw driver with tommy bar.

Tyre levers (3).

Double ended box spanner 11-14 mm.

Double ended spanner 19-21 mm.

Flat spanner 8-10 mm.

Hexagonal block (to lock the flywheel cover nut).

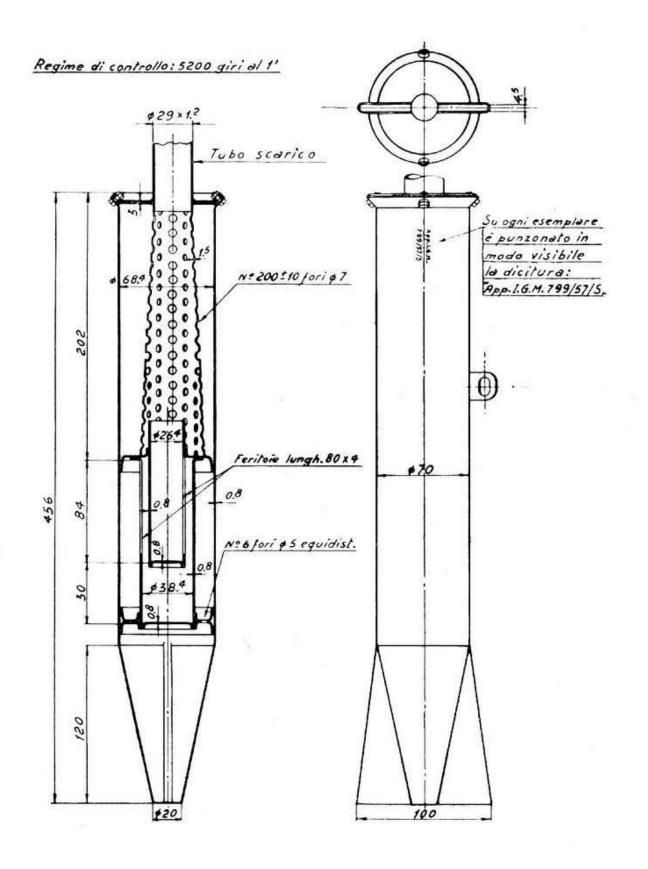
Instruction book.

### SERIAL NUMBER

Each machine has a single serial number for both frame and engine. This number is stamped on the central down tube and also on top of the engine crank-case cover. It is the only number valid for legal and selling purposes and it appears also in the certificate of origin and circulation book.

Always refer to this number when ordering spare parts.





STREET STEELS ST

# INDEX

Tool kit			٠		200 2.0 2.0	•	*	Page	2	
Serial number	7.0	S• 1		•	) <b>•</b>	*:	*	<b>»</b>	2	
Controls and accessories	•	•	٠					»	9	
General engine character	istcs				4,	•		»	10	
General characteristics of	fram	е.		•		10		<b>»</b>	12	
Instructions for the use o	of mad	hine			•		**	<b>&gt;&gt;</b>	14	
Mixture	4				32		45	<b>&gt;&gt;</b>	14	
Fuel tap	z.•	(2.50)			•	(*)	20	<b>»</b>	14	
Starting the engine .	54	8*8		*	51 <b>6</b>		*	<b>»</b>	14	
Accelerating the engine		•	•	7.	į	92	0.83	<b>»</b>	14	
Starting a hot engine .	7.	200		*		000	•	<b>&gt;&gt;</b>	14	
Starting off		•			•	•		<b>&gt;&gt;</b>	15	
Normal use	S.*	880		*		(3 <b>.</b> )		<b>»</b>	15	
Use of gear box	•					•	W)	<b>&gt;&gt;</b>	15	
Stopping the machine .	•			*	7.	(*)		»	16	
Inspection	2	580		*		848	4	<b>»</b>	16	
Storing the machine .	85	8#3			45	٠	73	<b>&gt;&gt;</b>	16	
Good use of the machine	74			٠	٠			<b>»</b>	17	
Running-in	•	*		٠	•	•		<b>&gt;&gt;</b>	17	
Important notice		•					•	<b>&gt;&gt;</b>	17	
Table for periodical main	tenan	ce		•				<b>»</b>	18	(
Maintenance instructions		1907		*		S.*.		<b>»</b>	22	3
Lubrication of engine-gea	r box	unit			•	•		»	22	
Lubrication of cycle part	s.	•						William I	22	

Lubrication of the con-	tact	brea	ker	93			•	è	page	22
Lubrication of chain	٠	٠	1400	•	٠	•	•	•	<b>»</b>	23
Timing of flywheel alt	terna	tor			٠		ī.	•	<b>»</b>	25
Adjusting the contact	breal	ker	•	•				•	<b>»</b>	26
Sparking plug .		*	•	•	•	•		•	<b>»</b>	26
Carburettor			•	•	*		•	•	<b>»</b>	30
Air filter	-21		360	•	•	•	٠	•	<b>»</b>	33
Cleaning the fuel tank	•		: <b>.</b> €8	0.58			3 <b>.</b> 00	•	<b>»</b>	35
Cleaning the filter .	•	٠	•			2		•	<b>&gt;&gt;</b>	35
Decarbonising .			(( <b>.</b> )	•		<b>.</b> €0	•	*	<b>»</b>	35
Cleaning the silencer				*	•		•		<b>&gt;&gt;</b>	35
Adjusting the clutch		*	•	•	•			•	<b>»</b>	35
Adjusting the chain	•	50	•	•3	•				<b>»</b>	36
Adjusting the steering	hea	d			٠	•	٠	•	<b>»</b>	37
Adjusting the rear swir	nging	forl	k	•			•		<b>»</b>	39
Adjusting the rear sus	pensi	ion	•))			•			<b>»</b>	40
Adjustment of handleb	oar c	ontr	ols	•		8 <b>≒</b>			<b>»</b>	41
Adjusting the brakes		•	•	•	•	٠	٠	100	<b>»</b>	42
Removal of front whe	el	•	: ·	•	•	•	V.¶§		<b>»</b>	42
Removal of rear wheel			500	*		•	•	•	<b>»</b>	42
Electrical equipment		٠	•	•			8.50		<b>»</b>	42
General manitenance Summary of engine tro	ouble	s. T	heir	prob	able	caus	e, ar	nd	<b>»</b>	45
cure		•	•			•			<b>»</b>	47
List of concessionaires	•	•	٠		- 10 m	٠	٠	*	»	55
90								55		0

ž

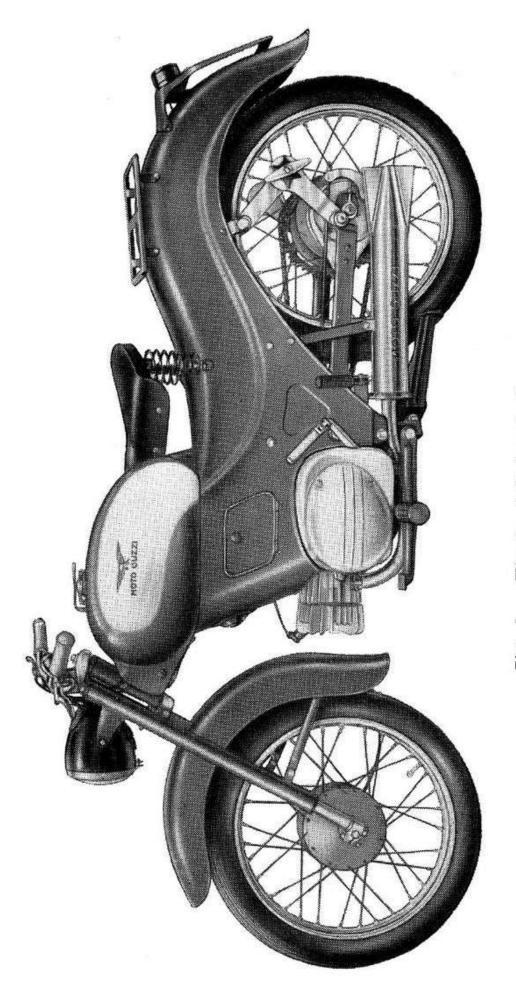


Fig. 1 - Zigolo, left hand view

(Also available with saddle, luggage grid, and touring type handlebars)

SHAMAN SHE SHE SHE

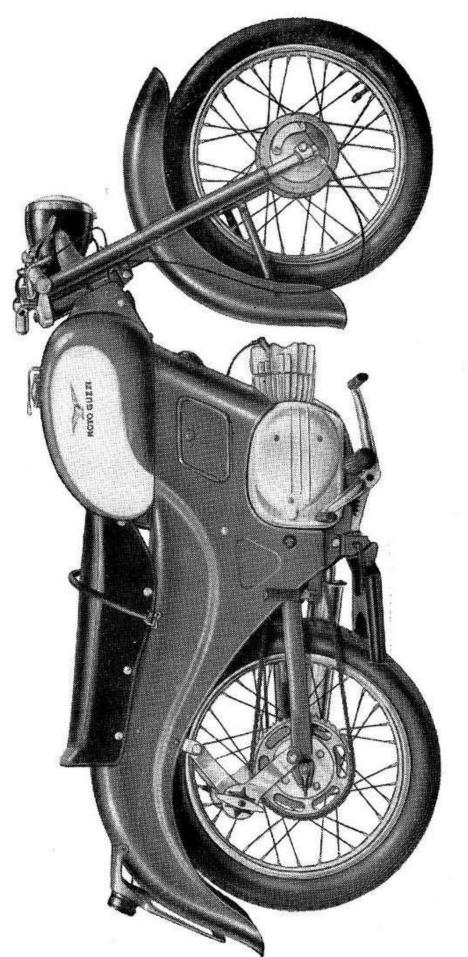


Fig. 2 - Zigolo, right hand view

STATE OF STEP OF STEP

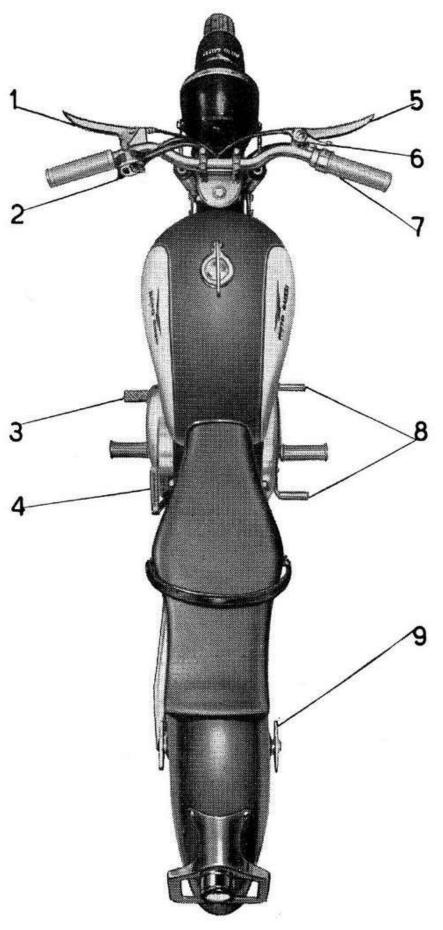


Fig. 3

STANDARD STEP STORE OF THE POSITION OF THE POS

# CONTROLS AND ACCESSORIES

(see fig. 3)

- 1. Clutch lever
- 2. Light switch and horn button.
- 3. Rear brake pedal.
- 4. Kickstarter
- 5. Front brake lever.
- 6. Air lever.
- 7. Twist grip throttle.
- 8. Gear lever.
- 9. Rear damper adjusters.

NOTICE - In the text the terms « right » and « left » are used in the sense they would appear to one sitting on the saddle.

9

#### GENERAL ENGINE CHARACTERISTICS

Two stroke with rotary inlet valve. Light alloy cylinder head. Single light alloy horizontal cylinder. 50 Stroke mm. 50 Bore . mm. 98 Cubic capacity CC. HP 2 R.A.C. Rating Maximum B.H.P. 4,6 HP at 5200 Compression ratio . r.p.m. 7.5 to 1

#### **FUEL SUPPLY**

By gravity. Tank capacity obout 3 gallons inclusive of a 2 pints reserve. Dell'Orto carburettor MAF 18 B 1 with air filter.

#### LUBRICATION

The engine is lubricated by the petroil system, the entire lubrication being cared for by the oil in the mixture.

The gear box is lubricated by oil in the crankcase.

#### COOLING

By air. Both cylinder and cylinder head are radially finned.

#### CLUTCH

Multiplate discs in oil bath. The clutch is to be found enclosed in the crankcase housing - left side.

#### IGNITION

By flywheel alternator and remote high tension coil.

#### SPARKING PLUG

Marelli C W 225 F

#### GEAR BOX

Thre	ee sp	eed u	nit (	con	structio	on.	Con	stant	me	sh	gears.	Ped	al con-
trol	led o	n right	har	nd s	side of	the	ma	chine	by	а	rocker	type	lever.
													: 2,627
2nd													: 1,542
3rd	>>	9248										1	: 1

#### **TRANSMISSION**

By helical gear from engine to gear box. By roller chain from gear box to rear sprocket.

#### **GEAR RATIOS**

From	eng	ine	to	gear	box							2,171:1
From	engi	ne t	to re	ear w	heel	٠	•	•	•		•	3,64 : 1
OVE	RALL	GE.	AR	RAT	IOS	(from	eng	gine	to re	ar w	heel)	
lst a	gear	.(*)	*:		30003	•					*	20,75 : 1
2nd	<b>&gt;&gt;</b>											12,18:1
3rd	>>	80									•	7.9:1

# GENERAL CHARACTERISTICS OF FRAME

The main member of the frame is a single solid central down tube integrated with a steel pressing having both bearing and protective functions.

Wheelbase					49 inches
Whoolbaco				about	44 Inches
VVIICCIDASC				about	17 1110103

#### **OVERALL DIMENSIONS**

Length										75,354"
Width				•	•				•	24,409"
Height			•			٠	•		•	34,645"
Minimum	gro	ound	clea	rance		•				5,315"
Weight				•			•	٠		170 lbs.

#### REAR DAMPERS

Adjustable friction type.

#### WHEELS

Light alloy rims  $17 \times 2\frac{1}{4}$ .

#### TYRES

Front 2,50  $\times$  17, ribbed Rear 2,75  $\times$  17 R, studded.

#### BRAKES

Light alloy expanding type. Two brakes, the front hand operated by a lever on the right handlebar, and the rear by a pedal on the left side of the machine.

#### LIGHTING EQUIPMENT

The flywheel alternator serves both the engine and lighting equipment whilst the engine is running. Front light with antidazzle bulb and pilot bulb. Tail light with reflector.

#### PERFORMANCE

The machine can easily climb gradients of about 1 in 4 riding solo.

#### **FUEL CONSUMPTION**

2,2 liters per 100 Kms. (127 m. p. g.)

(measured according to CUNA specification on a straight road at 2/3rd of maximum speed).

Maximum speed in each gear:

1 st	gear			•		•	about	30	Kms.	(18	m. p. h.)
2nd	gear		•		٠		about	50	Kms.	(31	m. p. h.)
3rd	gear	20				*	about	80	Kms.	(50	m. p. h.)

# INSTRUCTIONS FOR THE USE OF THE MACHINE

#### MIXTURE

With every gallon of petrol oil should be mixed in the ratio of 1 to 50 (2%). Only good quality oil should be used and our recommendation is Shell X-100 SAE 30. Important: In the running in period (first 1000 Kms. - 600 miles) use mixture in the ratio of 1 to 20 (5%).

#### FUEL TAP

It is closed when the lever is turned towards the pipe leading to the carburettor and open in the opposite position. To bring reserve fuel into use the lever should point downwards.

#### STARTING THE ENGINE

Make sure there is enough fuel in the tank, open the tap and depress the tickler on top of the carburettor, inside the right hand door. Close the air lever and slightly turn the twist grip control. Make sure the gear lever is in neutral. Depress the kickstarter sharply and as soon as the engine begins to fire, open the air lever halfway and regulate the engine speed by means of the throttle control.

#### ACCELERATING THE ENGINE

When starting from cold, and especially in cold weather, the engine should be driven on a light load until it has had time to get thoroughly warm.

#### STARTING A HOT ENGINE

It is advisable to open completely the air lever but not to flood the carburettor.

NB. Particular care should be taken never to flood the carburettor when the engine is hot. This will make re-starting very difficult and in such conditions it is necessary to push the machine along SHAMAN QUE GOOD in second gear with the clutch withdrawn and the air control fully open.

#### STARTING OFF

After starting the engine the machine can be pushed forward off its stand.

Then, after sitting on the saddle, the clutch lever should be fully withdrawn, bottom gear engaged, and finally the clutch lever slowly released, accelerating at the same time as the clutch « bites ».

When riding, the air lever should always be in the fully open position. If you are faced with a long hill climb, the air lever should be conveniently manipulated to avoid overheating of the engine.

Under no circumstances should hills be climbed — even for very short distances — by slipping the clutch instead of changing gear, nor should hills be descended with the machine in neutral or with the clutch disengaged. It is far better to utilize the braking effect of the engine with the throttle control at minimum opening. Descending steep hills, a lower gear should be engaged, as this will reduce wear of the brake linings and save overheating the drums.

On wet or slippery roads proceed with utmost care, avoiding violent acceleration and braking. Consider decreasing the tyre pressure slightly.

#### NORMAL USE

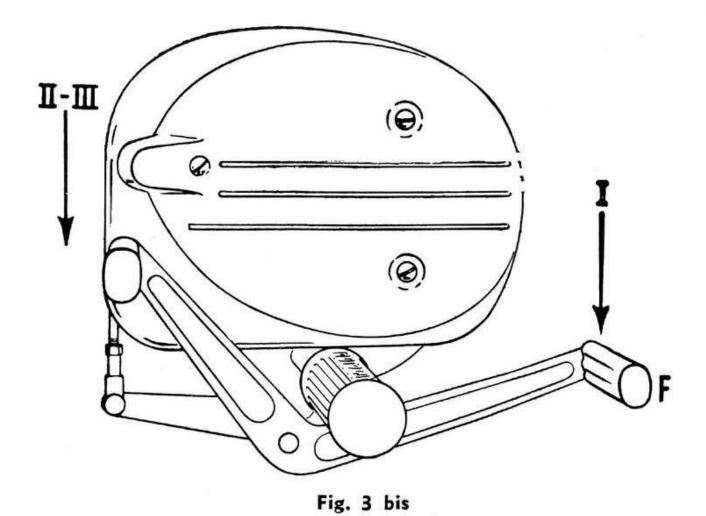
Particular care should be taken never to exceed the maximum revs permissible, especially in the lower gears. This can easily be checked by strictly complying with the table of maximum speeds in the different gears in section « Performance ».

## USE OF GEAR BOX

(see fig. 3 bis)

To change up: withdraw the clutch, closing at the same time the throttle control. The gear lever should then be shifted into the next position, slowly releasing the clutch and re-opening the throttle. To change down: follow the same procedure, except that the throttle should not be fully closed.

Change up rather than let the engine « race ». Change down rather than let it « slog ». Both these are bad for it-!



#### STOPPING THE MACHINE

Close the throttle and withdraw the clutch, using both brakes together, and not releasing the clutch until the machine is nearly to a standstill. Select neutral as soon as the machine stops. In the case of an emergency stop whilst going in a straight line, more effect can be had from the front than the rear brake, which could lock the wheel and so lead to the danger of a fall.

#### INSPECTION

After a difficult journey, especially one over bad roads or in wet weather, it is advisable to clean the machine at once and to check it over externally.

#### STORING THE MACHINE

If the machine is going to be put away for a fairly long period :

- clean it thoroughly (see « General Maintenance »)
- raise the machine so that the tyres do not touch the ground, especially if the floor is greasy or wet. It is advisable to keep the tyres slightly inflated
- with an antirust compound or vaseline, cover all those metal parts which are not enamelled.

#### GOOD USE OF THE MACHINE

Treat your machine well and do not ill-use it by violent acceleration and braking. If possible, ride at fairly constant speed. Harsh riding leads to greatly increased consumption of fuel, and generally shortens the life of every engine component.

#### RUNNING-IN

Too much emphasis cannot be laid on the advantages of a careful running-in. In order that the machine may be gradually run-in, for the first 600 miles it should never be allowed to go very fast or run under a heavy load.

#### IMPORTANT NOTICE

After the running in period all nuts and screws should be checked for tightness, especially the cylinder head nuts.

This is a precaution which it is well to follow periodically, since one loose nut may lead to an accident or serious engine trouble.

JUNE 17

# TABLE FOR PERIODICAL MAINTENANCE

#### PERIODICALLY OR EVERY 300 Kms. (200 miles)

1) Check tyre pressures which should be 24 lbs solo and 25 lbs with passenger for the front wheel and 26 and 35 lbs solc and with passenger respectively for the rear wheel.

#### AFTER THE FIRST 1000 Kms. (600 miles)

- 2) Change the oil in the gear box, using oil of the same quality as used for the mixture (this operation should be done with the engine hot)...
- 3) Make certain all nuts and screws are tight, especially the cylinder head nuts (Check these with the engine cold).

#### EVERY 1000 Kms. (600 miles)

- 4) Check oil level in the gear box and if necessary add oil of the same quality used for the mixture.
- 5) Using a grease gun inject some Shell Retinax A grease through the nipples on the front fork.
- 6) Inject a small quantity of Shell Retinax A grease through the nipples by the rear swinging fork.
- 7) Wash the chain down thoroughly with petrol and when dry lubricate it with Shell Retinax A oil. Check length and if necessary adjust. See « Chain Adjustment ».

#### EVERY 2000 Kms. (1200 miles)

8) Clean out carburettor air filter, washing it down in petrol and dipping it in Shell Donax F oil, making sure it is well drained before re-fitting. Clean out the air vent in the tank filler cap.

#### EVERY 5000 Kms. (3000 miles)

SHERRING THE GOD OFFE 9) Remove fuel tap and clean filter. Make sure the air vent in the tank filler cap is not obstructed.

- 10) Take off cylinder head and remove all carbon deposits on the piston crown, cylinder head and exhaust port and pipe.
- 11) Remove silencer and clean it. See section « Cleaning the silencer ».
- 12) Lightly lubricate the cam felt pad on the contact breaker. Do not use too much oil as it may get on to the contacts.
- 13) Make certain the contact breaker gap is 0,35 0,45 mm. (.013-.017'') To adjust, see section « Ajustment of contact breaker ». If necessary, the points should be cleaned using a very fine Swiss file.

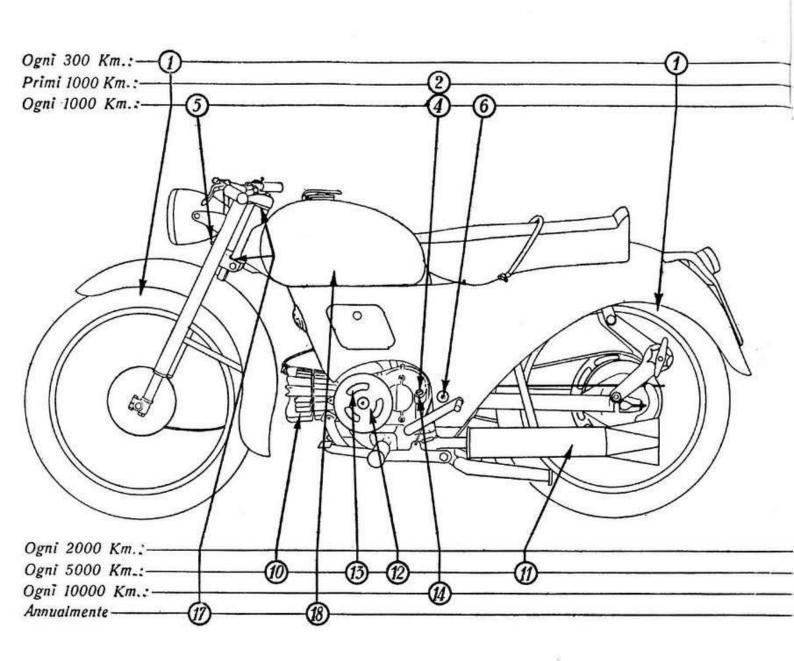
#### EVERY 10.000 Kms. (6000 miles)

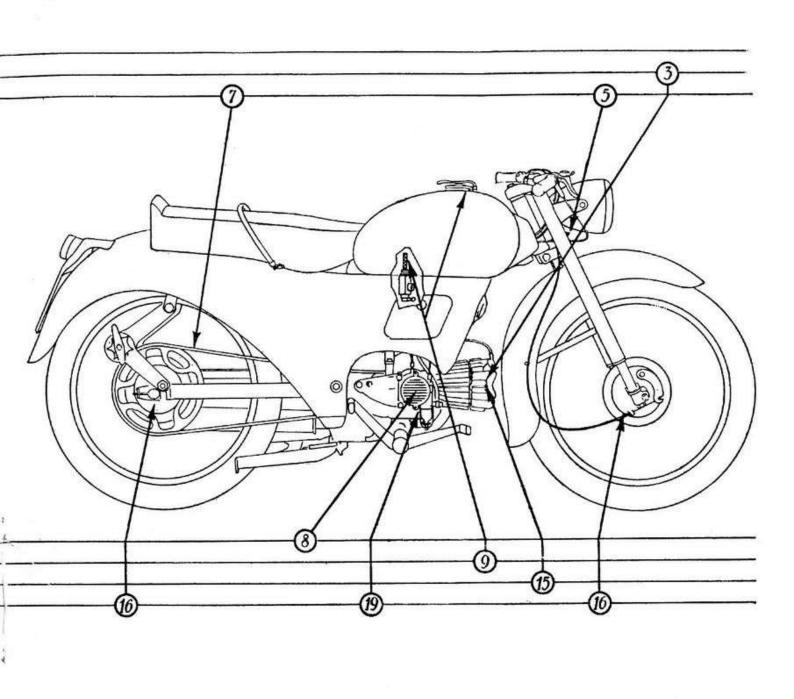
- 14) Change oil in gear box (hot engine). Use same oil as for the mixture.
- 15) Make sure all nuts and screws are tight, especially the cylinder head nuts.

#### **EVERY YEAR**

- 16) Dismantle, clean, and grease the wheel hubs.
- 17) Dismantle, clean, and grease the steering head cups.
- 18) Remove and wash out petrol tank. See « Cleaning the fuel tank ».
- 19) Dismantle carburettor and check all parts.

STANDARD OF 19





CE DIAGRAM

21

#### MAINTENANCE INSTRUCTIONS

#### LUBRICATION OF THE ENGINE-GEARBOX UNIT

The engine itself is automatically lubricated by the presence of oil in the mixture. To replenish the gear box and transmission, take off the left hand crankcase cover and through the filler plug (fig. 4) introduce a fresh supply of oil of the same quality as used for the mixture. Its level should not exceed the mark on the dipstick fitted to the oil filler plug. This oil should be changed after the first 600 miles and annually or after about every 6000 miles. This operation should be done when the engine is hot. Every 600 miles it is advisable to check the oil level and if necessary fill up to level. To change the oil, take off the rear brake lever and remove the drain plug (fig. 5). Lean the machine over to the left and allow the oil to drain away.

#### LUBRICATION OF CYCLE PARTS

Using Shell Retinax A grease, the following parts should be greased every 600 miles by means of a pressure gun to force the grease through the nipples which are fitted where necessary.

- Front fork. The nipples will be found on the front legs. (See fig. 16,1).
- Swinging arm spindle. The nipples will be found on the left bottom side of the machine (see fig. 5, 1).

The wheel and steering head bearings should also be lubricated once a year when they should be dismatled and packed with grease To lubricate the wheel bearings remove wheel spindle and brake block.

#### LUBRICATION OF THE CONTACT BREAKER

Every 3000 miles it is necessary to lubricate the felt rubbing on the flywheel cam. Apply only a few drops of oil, as excessive lubrication may result in oil getting on to the breaker points (see fig. 6, 1). This operation can easily be carried out by removing STATES OF STATES

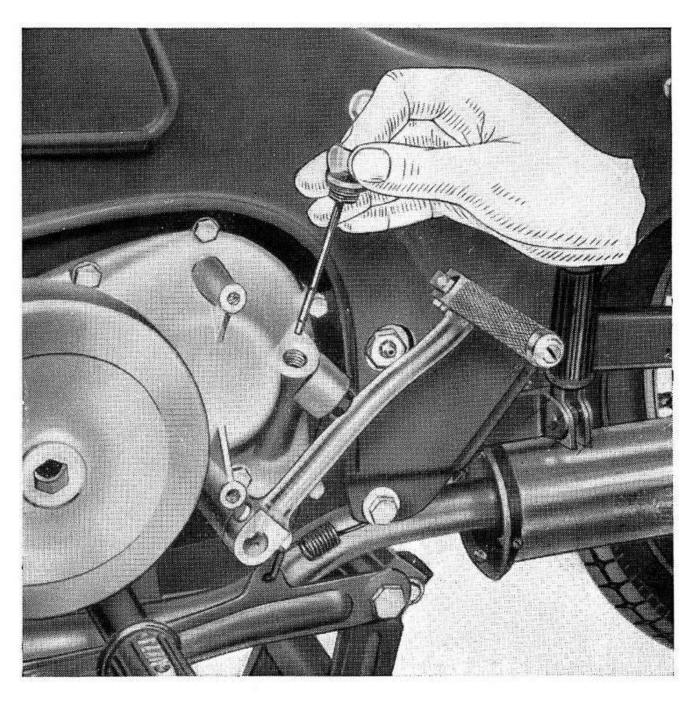


Fig. 4

the left hand crankcase cover and the flywheel cap when the cam can be lubricated through the webs of the flywheel.

In fig. 6 the flywheel itself is shown removed but this is only done for the sake of clarity: it is neither necessary nor advisable.

## LUBRICATION OF CHAIN

Smear it slightly with grease every time it appears dry, which is

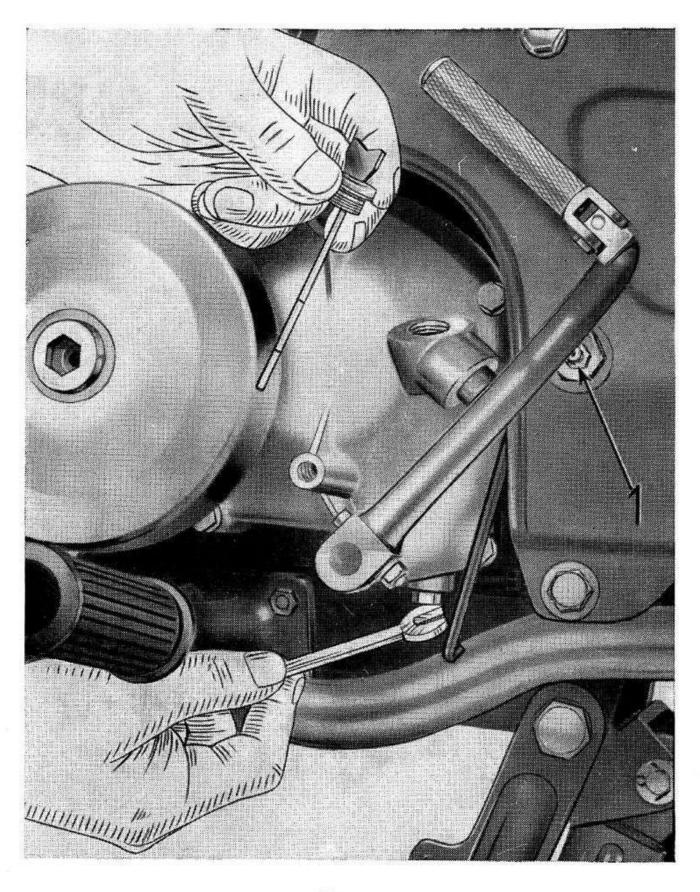


Fig. 5

often the case after a wet ride. Periodically, every 600 miles, it is well to wash it in petrol and allow it to dry before it is smeared with Shell Retinax A grease. This will get into the rollers and make lubrication unnecessary for long periods.

#### TIMING OF FLYWHEEL ALTERNATOR

Proceed as follows:

1) Remove crankcase cover on the left hand side of the ma-

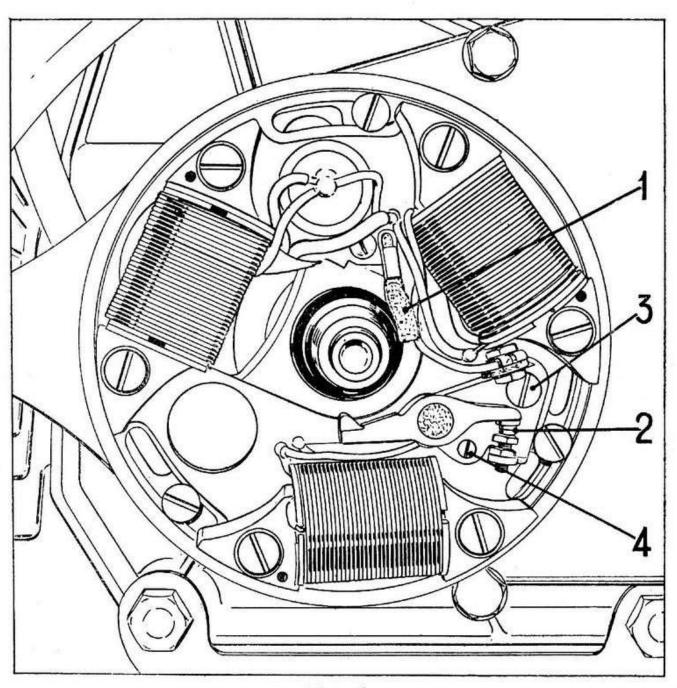


Fig. 6

chine and the centre lock nut.

- 2) Make sure the contact points are correctly set.
- 3) Time ignition so the breaker points begin to open when the mark on the rim of the flywheel is about 40 mm. (1.57") away from the mark on the crankcase (see fig. 7). If this distance, which should be measured on the rim of the flywheel with a flexible ruler, is not correct, proceed as follows:
- 4) Using a screwdriver through the webs of the flywheel slacken the 3 screws holding the back plate and introduce a piece of very thin paper in betveen the points. Then turn the flywheel anticlockwise until the points just grip the paper. Exerting a slight pressure (see fig. 8), turn the flywheel clockwise until the paper is released. Check now the distance obtained on the flywheel and if more or less than 40 mm. (1.57") turn the plate to the right to decrease or to the left to increase the distance. Finally, tighten the 3 screws to lock the plate in position.

#### ADJUSTING THE CONTACT BREAKER (see fig. 6)

The contact breaker points should be checked every 3000 miles, see fig. 6, 2. Make sure the gap when fully open is about .014/ .017 inches and if not, proceed as follows. Slacken screw 3 by half a turn (the screw which holds the block carrying the fixed points). Then turn the eccentric screw 4 slowly until the correct gap is obtained. Relock the block with the screw 3.

The above adjustment applies to CEV an dFILSO equipment. II your machine is fitted with a Marelli flywheel, this adjustment is made without the aid of the eccentric screw.

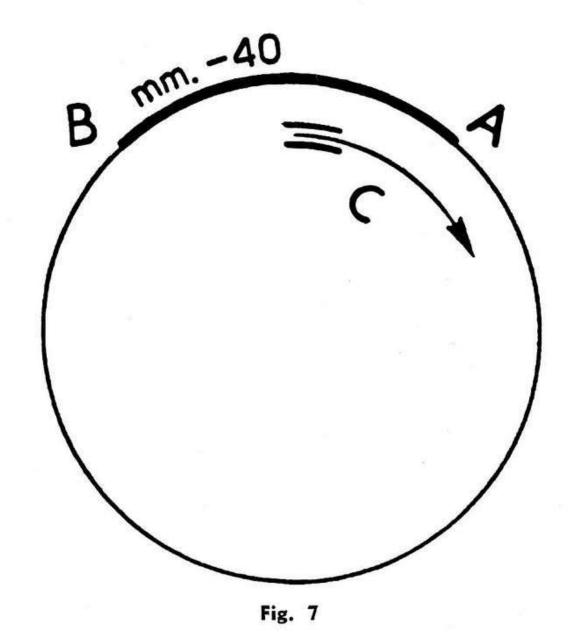
If the points have become pitted or dirty they should be carefully dressed with a dead smooth Swiss file.

This job, however, is best left to the expert and it can be conveniently carried out through the webs of the flywheel in the same way as when lubricating the cam felt pad.

#### SPARKING PLUG

SHAMAN CHENCHES Examine the insulation and if cracked change the plug.

- A Position of the mark on the crankcase.
- B Position of the mark on the flywheel.
- C Direction of rotation of flywheel.



The gap between the points should be .025". To clean use petrol and a wire brush. In fitting the plug into the cylinder make sure to start it by hand for a few turns, so as not to strip the thread. The fitting may then be completed with the plug spanner, using it not too tightly as to strain the thread.

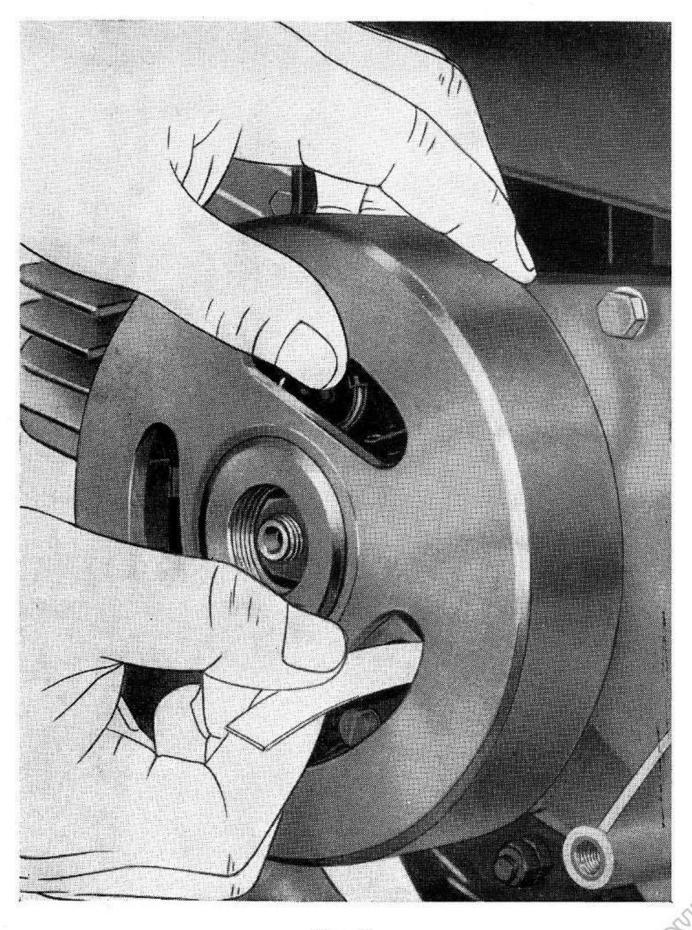


Fig. 8

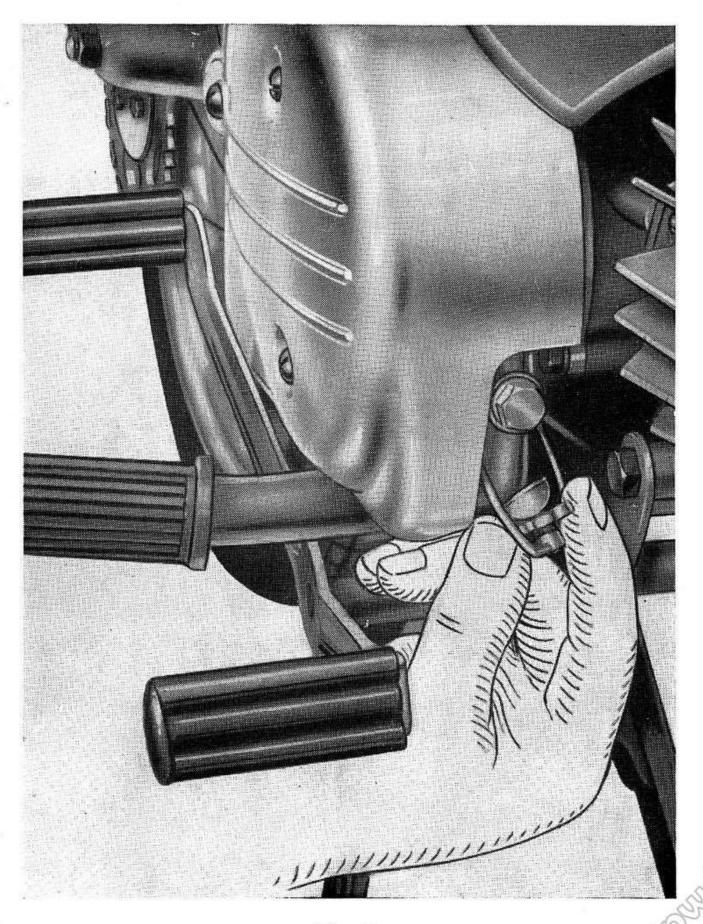


Fig. 9

Examine the condition of the high tension cable from magneto pick-up to plug.

#### CARBURETTOR

The engine is fitted with a specially designed carburettor, incorporating a metallic element air filter.

The float chamber incorporates a bowl-cum-filter element which is quite accessible. To remove this, undo the knurled screw under the carburettor (fig. 9) and withdraw the bowl. Use petrol to clean away all sediment which may have accumulated in the glass bowl and the filter (handle this with care).

#### NORMAL SETTING

Choke					¥	¥	300	100	*	194	740	mm. 18
Atomi	zer	8		•		٠	•	•	•	§ <del>*</del>		<b>26</b> 0 B
Main	jet			19.53				2.53			•	72/100
Pilot	jet							7. <b>*</b> )	•0		•	40/100
Thrott	le sli	de	P.	*		· ·	•		*			N. 55
Needle	D 1	6, s	econo	po:	sition	fro	m to	op.				

#### SETTING FOR MAXIMUM SPEED AND ACCELERATION

The regulation of maximum power and speed is effected by changing the size of the main jet.

Acceleration is regulated by the position of the needle, lowering it weakens the mixture and viceversa.

It will be well to remember that in cold weather the mixture should be richened and viceversa in the summer.

#### SETTING FOR IDLING SPEED

Should be done on a hot engine. Two screws behind the choke control the slow running of the engine. One of these screws is lying horizontally and is a needle valve. Screwing it in richens the mixture and viceversa. The other screw is inclined at an angle to the mixing chamber and can be adjusted to prevent the throttle valve.

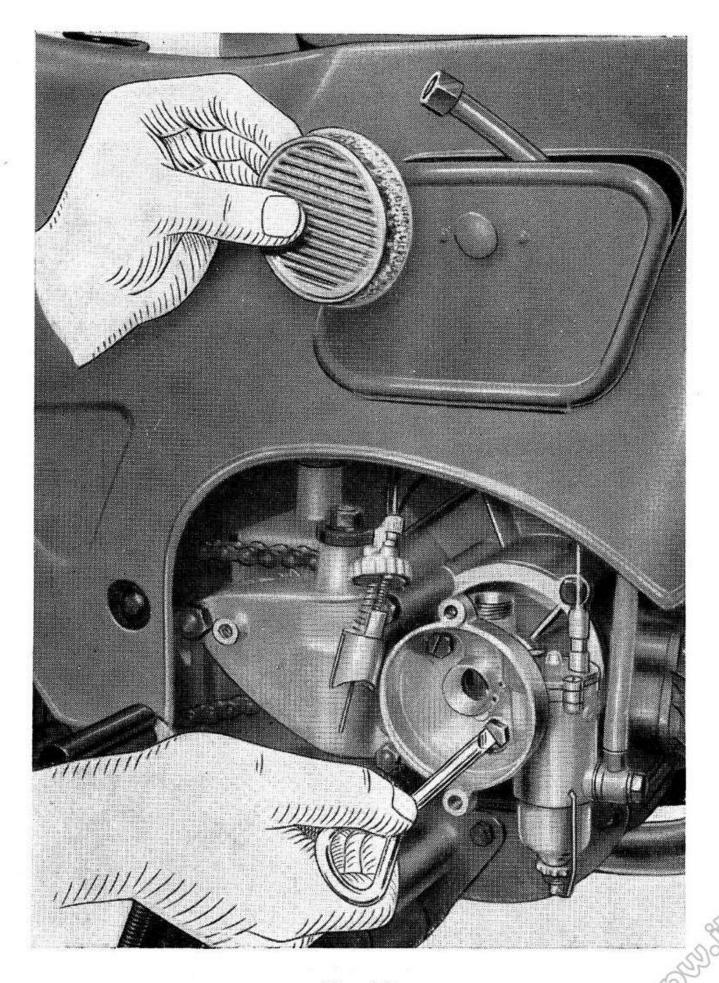


Fig. 10

from closing entirely. First adjust the inclined screw so that the engine will just keep running with the twist grip in the fully closed position. Then screw out the horizontal screw until the desired idling is obtained.

#### REMOVING CARBURETTOR FROM THE ENGINE

Take off the right hand crankcase cover, close the fuel tap and unscrew the petrol pipe from the tap. Remove the spring retaining the air filter and detach this. Next free it from the control cables and unscrew the two carburettor fixing screws shown in fig. 10.

In re-assembling make sure the gasket is in good condition and correctly fitted.

Be sure also the fixing bolts are tightened firmly to prevent any air leak which may have harmful effects on the carburation.

#### DISMANTLING THE CARBURETTOR (see fig. 11)

Every year it is advisable to strip the carburettor and to check and clean its parts.

#### REMOVE :

- fuel line connection and bolt (10);
- bowl (1), spring and filter, and if necessary washer (1 bis);
- float chamber cover (2). To do this unscrew the two top screws and remove the float (3) by withdrawing the needle (4) through the float;
- plug and washer (5) and jet holder (6);
- pilot jet (7);
- slow running set screw (8);
- throttle adjusting screw (9).

To clean the above parts it is preferable to use compressed air. Beware of using other cleaning agents (wires, needles etc.) which may distort or alter the size of the jets and so upset the carburation.

SHERREN STEPHEN STEP The air filter (11) and fixing screws (12) are removed when detaching the carburettor from the engine.

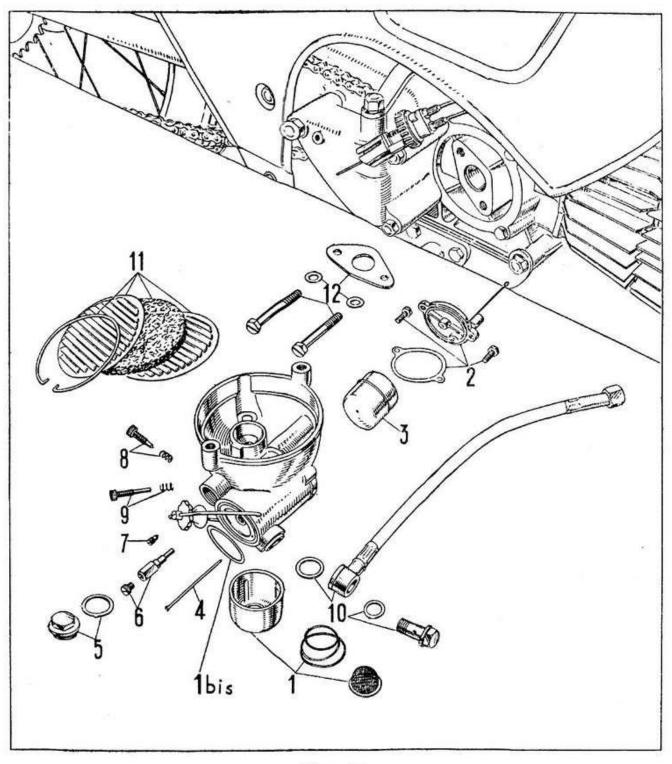


Fig. 11

#### AIR FILTER

Should be cleaned every 1200 miles or even more frequently if the machine is used on very dry or dusty roads. Unscrew it rom the carburettor, lever out the retaining spring ring, remove the disc and the metallic filtering agent, and swill everything in petrol. Thoroughly dry each part and then soak them in very thin oil (Shell Donax A). Allow them to dry before refitting. Do not forget that the filter is your greatest protection against engine wear and that if allowed to get dirty it restricts the supply of oil and increases also fuel consumption.

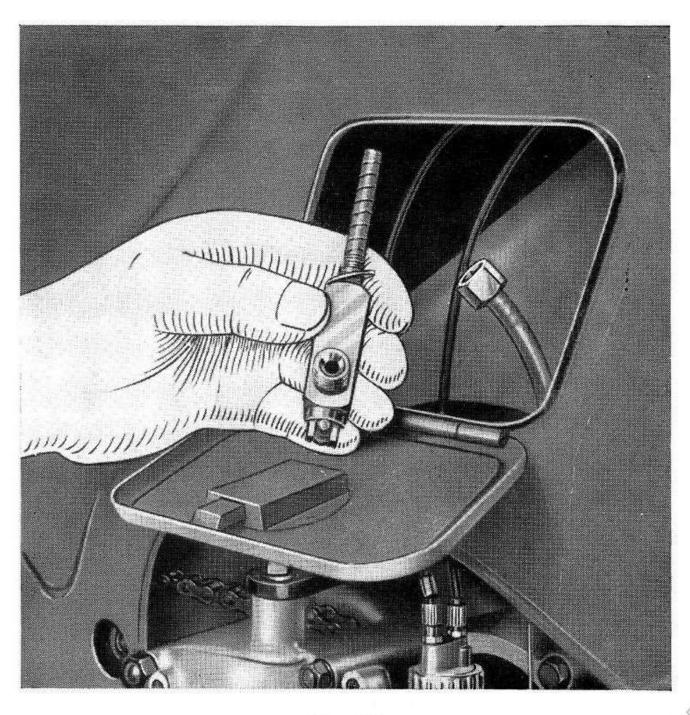


Fig. 12

#### CLEANING THE FUEL TANK

Every year the tank should be cleaned out. Pour some petrol in it and shake it well. Drain out all deposits from the tap hole.

#### CLEANING THE FILTER

Every 3000 miles it is advisable to clean the filter just above the fuel tap. Remove pipe and tap (see fig. 12) and clean it in petrol. When re-assembling make sure the filter is in good condition and the hole in the tank filler cap is not obstructed.

#### DECARBONISING

As the engine begins to get a deposit of carbon on the cylinder head, piston and exhaust port, its efficiency will gradually diminish and in this case it will be necessary to dismantle these parts (fig. 13). This is done by removing the four retaining bolts on the cylinder head and detaching the exhaust pipe. When all parts have been thoroughly cleaned and scraped re-assemble them, taking care the cylinder head nuts are tightened evenly.

Provided good quality oil is used, this operation does not need to be carried out oftener than every 3000 miles, but a good motto is « better too often than not often enough ».

#### CLEANING THE SILENCER

Every 3000 miles the exhaust pipe and silencer should be detached, dismantled and cleaned. This is best done by scouring it by using a length of wire to draw a pot scrubber through it. In reassembling the silencer take care that the end plate is seating properly so that there are no gas leaks.

#### ADJUSTING THE CLUTCH

It will be necessary to adjust the clutch when the play at the end of the handlebar lever is more or less than about 1/8 of an inch.

If there is less than this amount there is danger that the clutch will slip and the plates distort and wear.

If the play is more there may be incomplete disengagement of the clutch with consequent difficulty in changing gears. For adjustment see section « Adjustment of handlebar controls ». It is well to lubricate the plate thrust rod periodically.

## ADJUSTING THE CHAIN

With the machine on the stand there should be a little slackness—about 1 and 3/16th of an inch up and down movement. This is necessary to ensure that the chain is not too tight when the rear frame is in the middle position of its travel.

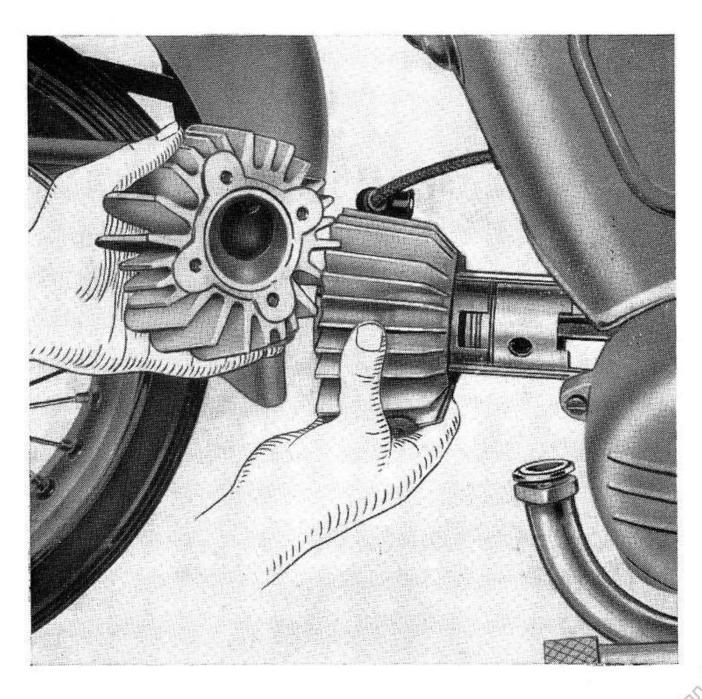


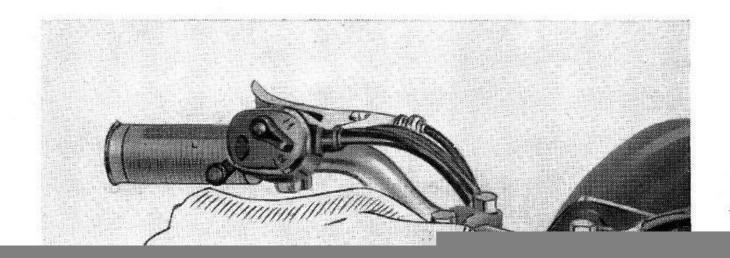
Fig. 13

To adjust, slacken off the nuts of the rear wheel spindle and regulate by the same amount the two chain adjusters on the wheel splindle.

After adjusting the chain always check also the rear brake adjustment.

# ADJUSTING THE STEERING HEAD

If the steering head is too loose there will be movements which



are harmful to the balls and races. To adjust: unscrew the central top nut and slacken off the lateral pinch bolt. Remove all but a minimum of play and refit bolt and nut as follows:

- a) screw on the central top nut and washer until it is flush with the steering cap, but not too tight;
- b) screw on lateral bolt;
- c) loosen the central top nut again, and finally lock nut and cap in position (see fig. 14).

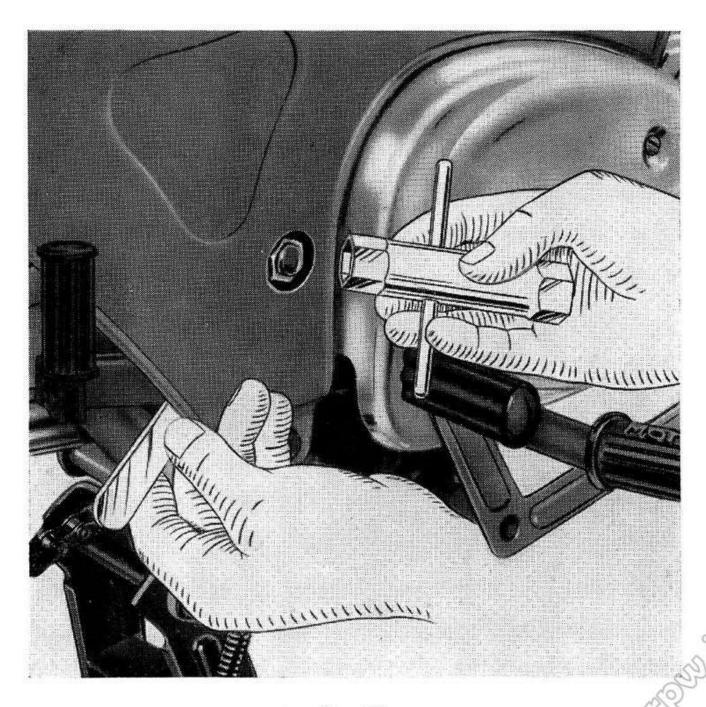


Fig. 15

## ADJUSTING THE REAR SWINGING FORK

It is done by slackening the lock-nut on the right hand side and screwing on the nut until all excessive play is removed. Re-fit lock nut keeping a hold on the main nut (see fig. 15).

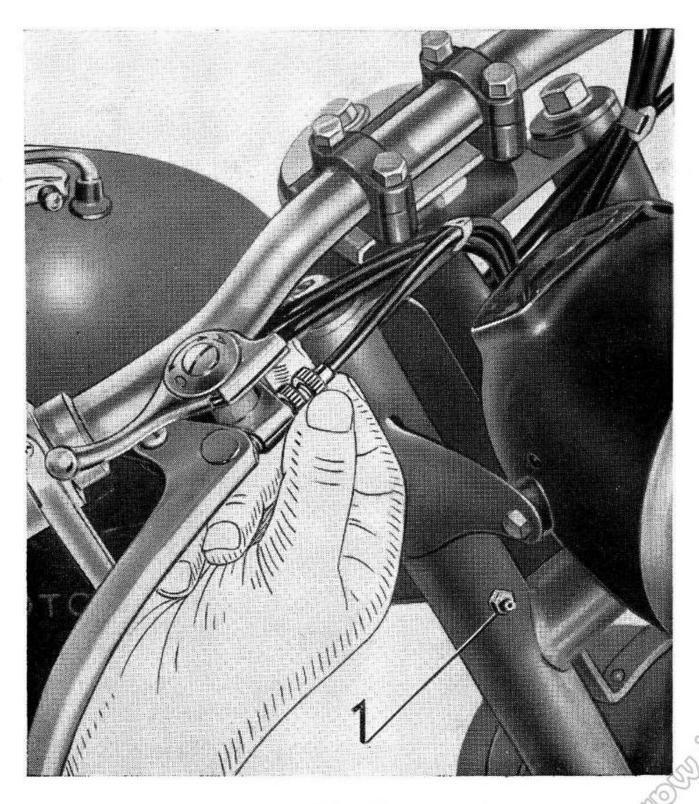


Fig. 16

## ADJUSTING THE REAR SUSPENSION

The rear springing is taken care of by a rubber block which is fitted at the factory and should never be tampered with. If for any special reason it is necessary to adjust the springing, this can be done by slackening the lock nut and regulating the adjusting square head bolt on the frame member. Access to this is through the right hand door in the steel frame pressing.

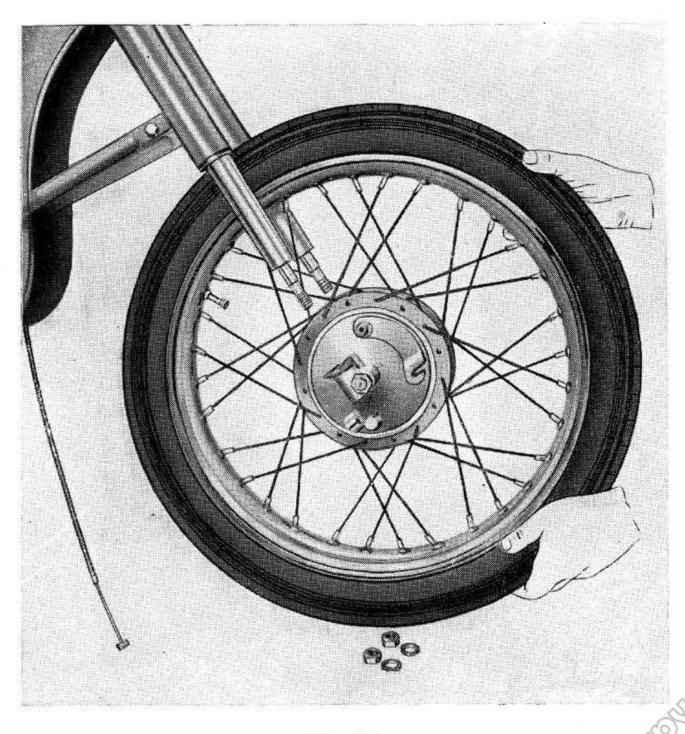


Fig. 17

# ADJUSTMENT OF HANDLEBAR CONTROLS

For the adjustment of the front brake and clutch levers on the handlebars a knurled adjuster and locking thimble is provided.

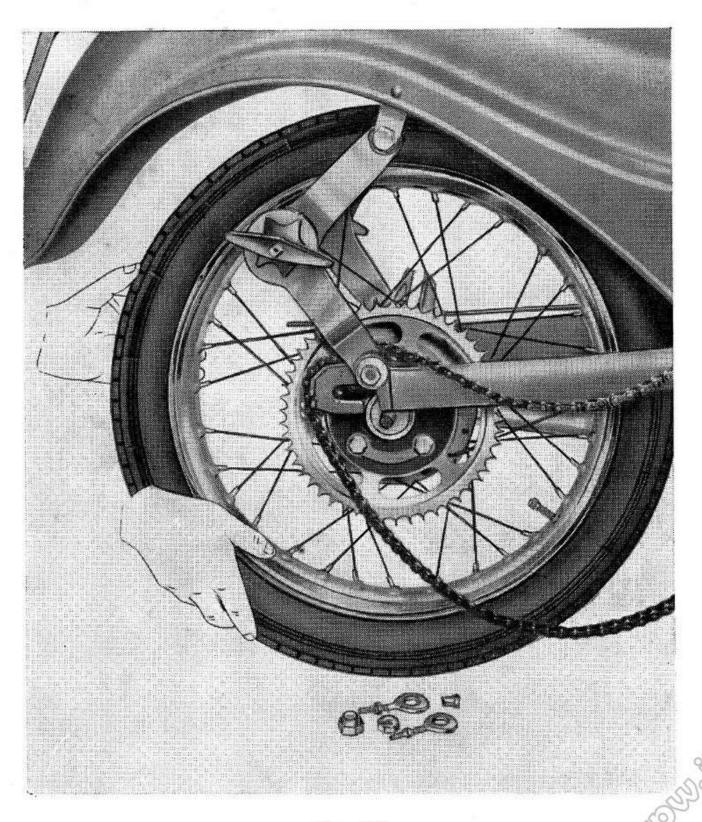


Fig. 18

These make the adjustment of these controls an easy matter, (see fig. 16).

## ADJUSTING THE BRAKES

Both brakes should be adjusted so that there is 3/8 - 5/8" play at the pedal and lever respectively, before the linings come into contact with the drums.

For the adjustment of the front brake, see « adjustment of handlebar controls ».

The rear brake is adjusted by means of the nut at the rear end of the brake rod.

#### REMOVAL OF FRONT WHEEL

Detach the front cable and unscrew the two nuts which fix the wheel to the front fork links (one on each side). The wheel can now be slipped out (see fig. 17).

#### REMOVAL OF REAR WHEEL

This is done by taking off the nut on the brake rod, the nut on the centre wheel bearing and the chain tensioner nuts, after which the wheel can be readily removed (see fig. 18).

In re-assembling, do not forget to see that the rear brake anchorplate is put in the same relative position.

## **ELECTRICAL EQUIPMENT**

The flywheel generator provides low tension current to the H.T. coil, the lighting system and the electric horn.

Wiring diagram, fig. 19:

- 1 Horn button and lamp switch.
- 2 Headlamp.
- 3 Electric horn.
- 4 Sparking plug.
- 5 Flywheel alternator
- 6 Rear lamp.
- 7 High tension coil.
- 8 Terminal plate.

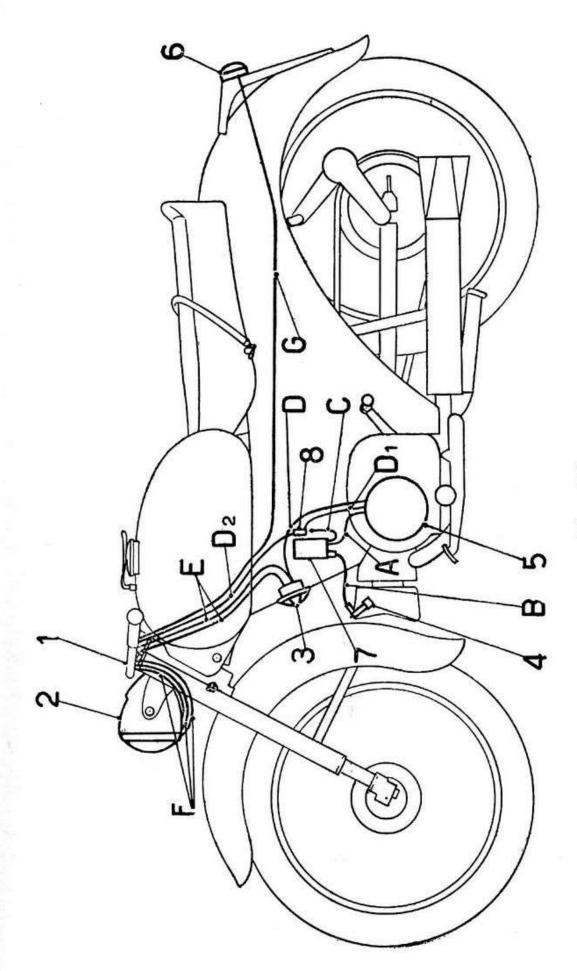


Fig. 19

coil to hearth - D) Red cable from flywheel to horn - D1) Green cable from flywheel to A) Yellow lead from flywheel to coil - B) Lead from earth to flywheel - C) Lead from (one red) - F) Leads (one green) from switch to headlamp -Green cable from terminal to switch - E) Leads from switch to tail light. rom horn to switch terminal plate - D<sub>2</sub>)

Take care of the electric wiring. Renew if there are any signs of wear or short circuits.

#### **HEADLAMP**

It is absolutely water tight and internal inspection is therefore unnecessary. The surface of the reflector should be treated with great care: do not polish it or it might easily lose its lustre.

To change the bulb loosen the small screw at the base of the lamp and the glass and reflector can be removed and the bulb taken out (fig. 20).

The small parking light bulb is easily removed by releasing it from its spring retainers.

The glass is changed by removing the springs which retain it

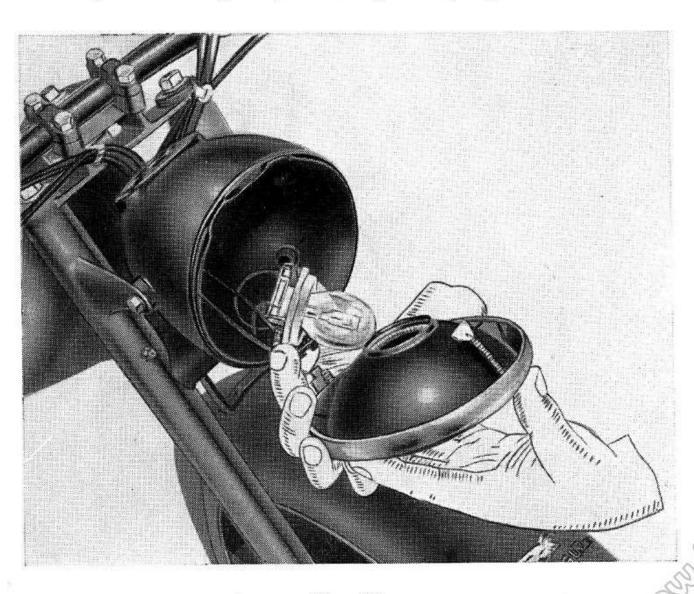


Fig. 20

against the headlamp rim. The small plate on top of the headlamp can easily be removed to provide room for a speedometer, il required.

#### **BULBS**

Bulbs of the following specification should be used:

- Headlamp: main bulb  $6 \ V \ 25 \times 25 \ W$  (main and dipped),  $6 \ V \ 5 \ W$  bulb (pilot light).
  - Rear lamp: 6 V 3 W.

#### HORN AND DIPPER SWITCH

Do not require any adjustment but if it is found that the rear light frequently fails, examine the dipper switch and make sure that all wires are making proper contact, and all screws are tight.

#### GENERAL MAINTENANCE

To keep the machine in good condition one should pay attention to the following points:

**Cleaning:** the engine is best cleaned with parafin and a brush and dried off with a rag. All the enamelled parts should never be cleaned dry but wetted with a sponge or washed off with a hose and a sponge. Make sure all traces of dust or dirt are removed before finally drying off with a chamois leather.

To keep the enamel in good conditions it should be lightly polished with a cotton cloth and a good car polish.

Do not use petrol or parafin on the enamelled parts as it may render them opaque and ultimately destroy the paint.

#### RETOUCHING PAINT WORK

The finish on the Zigolo is synthetic enamel dried off in an infra red oven. In the case of small parts it is best to re-enamel the part completely.

**Transfers** - The transfer with the eagle and wording « Moto Guzzi » is fixed on to each side of the tank, also on the mudguards. Moisten the transfer with varnish and after about 5 mig

nutes set in position, then soak the paper back with a sponge and peel it off. Any trace of varnish around the transfer can be removed with kerosene and it can then be polished off to give it a good lustre.

STATES OF STEEL ST

# SUMMARY OF ENGINE TROUBLES. THEIR PROBABLE CAUSE, AND CURE

SHUMEN STORES

TROUBLE	PROBABLE CAUSE	CURE
DIFFICULT STARTING DUE TO CARBURATION	Petrol not getting to carburettor (see A - B C - D - E)	Depress tickler just enough to see if there is flooding of the carburettor
	A - No fuel in tank	Re-fill
	B - Petrol tap closed	Turn tap to « open »
	C - Necessity to turn on reserve fuel	Turn tap to « reserve » position
	D - Obstruction in fuel tank filter	Dismantle and clean
	E - Broken or obstructed fuel line	Replace or blow through with air
	Dirty carburettor filter or bowl	Dismantle and clean
	Float needle blocked in its seat	Shift it, acting on the tickler
	Obstructed jet	Dismantle and clean with air
	Carburettor ducts obstructed	Dismantle and clean with petro, or air

	TROUBLE	PROBABLE CAUSE	CURE
		Water in fuel or bad quality oil in mixture .	Dismantle carburettor and clean it. Replace fuel with suitable mixture
•		Excessive flooding (see F - G)	Close petrol tap and turn engine till excessive petroil is absorbed
		F - Deposits in needle seat	Remove needle and clean
		G - Punctured float	Replace float
		Air getting through manifold	Remove right hand crankcase cover and air filter. Check tightness of fixing screws, and replace gasket, if necessary
		Dirty air filter	Dismantle and clean
9	IGNITION	No spark (see H-I-L-M)	Remove plug and holding it against the cy- linder check if there is any spark
	Ω.	H - Fouled spark plug	Clean
br	,19)ST	l - Wet plug	Dry it
	947)3E		_
0	2		

TROUBLE	BLE	PROBABLE CAUSE	CURE
		L - Cracked insulation	Replace plug
		M - Incorrect points gap	Set to .6 mm. (.23")
		Broken or dameged leads	Replace
		Plug or coil connections damaged or not pro- perly screwed in :	Replace or screw in
		Fouled or incorrectly set contact points	Dress or clean them. (see "adjusting of contact breaker") Set to .1517 inches
		Contact breaker arm:	
			Replace
		·	Lubricate lightly
S		Faulty HT coil or condensor	Replace it or have it repaired by a competent mechanic
KIGKSTARTER	£	If not working properly, due to slipping clutch	Adjust clutch (See « Clutch adjustment »)
3001	No.		

TROUBLE	PROBABLE CAUSE	CURE
LOSS OF POWER	Mixture too rich	Reset carburettor (see "Carburettor"
	Mixture too lean	Ditto as above
	Clogged exhaust pipe and silencer	Scrape off all carbon deposits, by scouring out
	Carbon deposits on ezhaust port, cylinder head and piston	Scrape off all carbon deposits
	Defective head gasket	Replace
	Loosely screwed in plug or plug fitted with no washer	Screw in plug and/or fit washer
	Pitted plug, or points worn or incorrectly set	Clean, change plug or adjust gap
	Loose cylinder head bolts	Screw in tight (cold engine)
	Worn, broken, or stuck piston rings	Replace rings and clean out piston grooves
	Cylinder worn oval	Replace
17 PU		

OUBLE PROBABLE CAUSE CURE	RING   Plug (see N - O - P)	N - Incorrectly set points Adjust to .6 mm (.23")	O - Fouled points	P - Faulty ignition	Loose exhaust pipe joint Screw in pipe retaining bolts	Condensor:	— loose Tighten	— defective Replace	Slipping due to not enough clearance at the handlebar lever	Incomplete disengagement due to excessive play at the handlebar lever Adjust as above
TROUBLE	BACKFIRING								FAULTY CLUTCH OPERATION	NUD STE

TROUBLE	PROBABLE CAUSE	CURE
HIGH CONSUMPTION	Float needle stuck	Free needle
	Punctured float	Replace float
	Distorted float needle	Replace needle
	Dirty air filter	Dismantle and clean
	Main jet distorted or altered	Change jet
	Retarded ignition	Check timing
Y2	Worn, broken, or stuck piston rings	Replace rings
DEFECTIVE STEERING	If too hard or too loose	Loosen central bolt and lateral nut and adjust by means of knurled cap
WHEELS TOUT OF ALIGNMENT	Wheel offset	True up and change any broken or damaged spokes
96H9V	Poose hubs	Check wheel bearings

	PRUBABLE CAUSE	CURE
FADING OF BRAKES	Pedal or hand lever with too much free move ment	Adjust distance to about 10 - 15 mm (.39 - 59"), before linings contact drum
	Worn or oily brake linings	Replace linings
SUSPENSION	Improper functioning of telescopic fork	Grease through nipples
	Inefficient working of rear dampers	Check
ELECTRICAL EQUIPMENT	Loose, broken, or damaged leads	Repair or replace
	Terminals loose, broken or disconnected	Tighten or repair, as necessary
	Horn:	
	Terminals disconnected	Tighten fixing screws
	Irregular tone	Adjust as recommended
	Coil lead loose or broken	Tighten or replace
	Faulty coll	Replace
-1	Head or tail lamps burnt out	Replace with similar bulb
	Reflector opaque	Replace
DOTT!	Faulty switch	Check contacts and tighten screwes. If bro- ken, replace

# LIST OF HOME CONCESSIONAIRES LIST OF OVERSEAS CONCESSIONAIRES

## ELENCO CONCESSIONARI NAZIONALI

#### SUCCURSALI

```
ABBIATEGRASSO (Milano) - Nai Franco - v.le Mazzini, 84 - tel. 2197.
  ACQUI TERME (Alessandria) - Corzino Pietro - v. Alessandria, 6 -
    telefono 2557.
  ADRIA (Rovigo) - Marotto Giovanni - c.so Mazzini, 34 - tel. 20286.
 AGRIGENTO - Cascino Angelo - p.za Municipio, 302 \ \ (off.) - tel. 1160. \ (off.) - tel. 1267.
  ALBA (Cuneo) - Vasquez Fernando - v. Michele Coppino, 17.
  ALBENGA (Savona) - Rossi Armando - v. Piave « Pal. al Sole » - tel. 2474.
                                      p.za Garibaldi, 1 (neg.) - tel. 3030.v. Vochieri, 23 (off.) - tel. 5196.
  ALESSANDRIA - Ricagni Giovanni
  ANCONA - Montanari N. Valentino - c.so C. Alberto, 60 - tel. 28311.
  AOSTA - Mototecnica di Ozino E. - v. Hotel des Etats, 3 - tel. 3250.
  AREZZO - Mori Dante - v.le Michelangelo, 16/20 - tel. 2722.
  ARIANO IRPINO (Avellino) - Savino Emilio - v. Nazionale, 130
    (neg.) tel. 67 - (off.) tel. 68.
  ASCOLI PICENO - F.lli Norcini Pala - v. Palestro, 14-18 - tel. 3089.
  ASTI - Perosino Giuseppe - c.so Dante, 8 E - tel. 3034.

    AVELLINO - Savino Emilio - v. F.lli De Sanctis, 24.

  BARI - Feroni Costantino fu Sabino - v. Manzoni, 141-147 - tel. 12349.
  BARLETTA (Bari) - Feroni Costantino fu Sabino - v. Baccarini, 13 - t. 1468.

    BASSANO DEL GRAPPA (Vicenza) - Berton Rino - v. Verci, 46 - tel. 23321.

  BELLUNO - Zoppè Giuseppe - v. Vittorio Veneto, 58 - tel. 4281.
  BENEVENTO - Messina Giulio - c.so Garibaldi, 41.
  BERGAMO - Bonaldi Lorenzo - v. A. Maj, 7 b - tel. 25337.
  BERGAMO - Raccagni Ugo - v. G. B. Moroni, 167 - tel. 24235.
  BIELLA (Vercelli) - Coda Paolo Armando - v. Piave, 7 - tel. 22015.
                                       v. Candelo, 40 - tel. 24084.v. Bertodano 5/7 (neg.) - t. 21180.
  BIELLA (Vercelli) - Mello Giuseppe

    BOARIO TERME (Brescia) - Mandolini Adelmo - v. Nazionale, 130 -

    tel. 234.
  BOLOGNA - Cesari Leopoldo di C. A. Cesari e E. Cesari in Roversi
                                     v. Altabella, 7 (neg.) - tel. 28733.v. Massarenti, 76 A (off.) - tel. 42862.
  BOLZANO - Casa del Pneumatico di F. Bassetti
                                        ∫ p.za Verdi, 16 (neg.) - tel. 26321.
                                        v. Renon, 21 (off.) - tel. 27.142.

    BORGOMANERO (Novara) - Mototecnica Porino - p.za Garibaldi, 1 tel. 81978.

56
```

BORGO S. DALMAZZO (Cuneo) - Varrone F.lli - v. Bergia, 8 - tel. 6052.
 BORGOSESIA (Vercelli) - Mello Albino - c.so Vercelli, 60 C.P. 5 - tel. 2164.

BRESCIA - F.lli M. R. Lombardi - v. Dante, 7 r \ \ \ \ (off.) tel. 26420.

BRESCIA - Mandolini Adelmo - c.so Cavour, 31 - tel. 25708.

BRINDISI - Antelmi Andrea - c.so Umberto I, 142 - tel. 13/62.

BUSTO ARSIZIO (Varese) - Binda & Castellanza - v. General Fanti, 12 - tel. 31624.

CAGLIARI - Off. Cossu Celestino - v. P. Paoli, 28-30 - tel. 3683.

 CALDARO (Bolzano) - Casa del Pneumatico di F. Bassetti - v. Roma, 33 tel. 53110.

CARATE BRIANZA (Milano) - Manzoni Vito - v. Rezzonico, 2 - tel. 9268. CASALE MONFERRATO (Alessandria) - Romano Bruno - v. Manacorda, 71 - tel. 3967.

CASALPUSTERLENGO - Perondi Silvio - piazzetta Cavour, 29 - tel. 3326.
 CASERTA - Baino Elvira in Vicendomini - c.so Trieste, 64 - tel. 21290.
 CASTELLUCCHIO (Mantova) - Leoni Guido di Leoni V. - v. Roma, 56 - tel. 8.

CATANIA - Branciforti Giuseppe - v. Conte di Torino, 3 - tel. 13983.

CATANZARO - Filastò Domenico - c.so Mazzini, 85 - tel. 1813.

CATTOLICA (Forli) - Molari Silvio - v. Garibaldi, 12 - tel. 61011.

CECINA (Livorno) - Galoppini Armando fu Cesare - v. Aurelia, 155.

CENTO (Ferrara) - Casanova Bonando - v. Donati, 3 - tel. 2477.

- CERIGNOLA (Foggia) Testa Francesco v. Morosini, 29.
   CESENA (Forlì) Battistini Cesare c.so Cavour, 25 tel. 21156.
- CHIAVARI (Genova) Sola Agostino p.za Cavour, 2 tel. 2633.
   CHIAVENNA (Sondrio) Garage Maloia di U. Mezzera p.za Verdi tel. 2141.

CHIUSI SCALO (Siena) - Rosati Roberto - v. Cassia Aurelia, 7 - tel. 2031. CITTA' DI CASTELLO (Perugia) - Marinelli Umberto

CIVITAVECCHIA (Roma) - Cassese e D'Angelantonio - v. G. Baccelli, 88 - tel. 3551.

CODOGNO (Milano) - Perondi Silvio - v. Alberici, 20-22 - tel. 2408.

COMO - Cappelletti & Pedraglio - v. Milano, 44 - tel. 28723.

CONEGLIANO V. (Treviso) - Zoppè Giuseppe - v.le Spellanzon, 36 - tel. 22624.

COSENZA - Altomare Mario v. Pasubio, 9-11-13 - tel. 1843 - 2455.

CREMA (Cremona) - G. B. Cremascoli - v. L. Cadorna, 6 - tel. 3395.

CREMONA - Motogarage Venezia di Magni, Galelli e Parolini - v. Trento e Trieste, 69 - tel. 2654. CUNEO - Varrone F.lli - c.so Gesso, 10 - tel. 2764. CUORGNE (Torino) - Ozino Ermanno - v. Torino, 27 - tel. 6343.

DESIO (Milano) - Galli Riccardo - v. Garibaldi, 110 - tel. 6303. DOMODOSSOLA (Novara) - Casarotti Stefano - v. Sempione, 2 bis tel. 2540.

ENNA - Grillo e Virlinzi - v. S. Agata, 39 - tel. 1314.

ERBA (Como) - Beretta Vittorio - v. Lecco, 4 - tel. 61114.

FABRIANO (Ancona) - Neri Elio - v.le A. Zonchi, 15 - tel. 2550.

FAENZA (Ravenna) - Casadei Edel - c.so Mazzini, 88 - ang. v. Cà Pirota, 4 - tel. 1100.

FERRARA - Sambri Romeo di Maini Matilde - v. Borgoleoni, 24-26 tel. 35493 - 6950.

• FIDENZA - F.Ili Sacchetti - v. Cavour, 89.

v. Pietrapiana, 16 R - tel. 26815.FIRENZE - Norchi Luigi di Giuseppe ⟨ v. di Mezzo, 7. p.za S. Ambrogio, 5 r - tel. 675082.

FOGGIA - Testa Francesco - c.so Roma, 2 - tel. 1187.

FORLI' - Casadei Telemaco - c.so della Repubblica, 39 - ang. v. Fortis, 1 tel. 23062.

FORMIA (Latina) - Annibale Mesolella - v. Vitruvio - tel. 21625.

FROSINONE - Soc. Celletti Sisto & Figlio - v. Marittima, 94-98 - tel. 3284.

GALLARATE - Magnoli Francesco - v. G. Mazzini, 2/c - tel. 24427.

GENOVA - Morelli Luigi - p.za Rossetti, 38/39 r - tel. 55063.

GENOVA - Risso & Poli - v. Bobbio, 16-A-Fr - tel. 81941.

GENOVA PONTEDECIMO - Eredi Marconi Arnolfo - v. Gallino, 3-5 R tel. 499261.

GENOVA SAMPIERDARENA - Boggia Arturo - v. S. Dondero, 8-10 R tel. 43393.

GORIZIA - Cusulin Antonio - v.le XXIV Maggio, 4 - tel. 2642.

GROSSETO - Mancini Andrea & F. p.za della Palma, 3 (neg.) - tel. 22592 v. Palestro, 3 (off.).

JESI (Ancona) - Giuliani Silvio - v. Mura Occid., 5-C - tel. 2538.

IMOLA (Bologna) - Suzzi Dante - p.za Codronchi, 11-12 - tel. 2239.

IMPERIA - Ferrari Ferruccio fu Pietro - v. Repubblica, 3 - tel. 8150.

ISERNIA (Campobasso) - Cimino Carmine - c.so Garibaldi, 176.

IVREA (Torino) Mototecnica di Ozino E.

c.so Nigra, 55 (neg.).
v. Dora Baltea, 10 (neg.). v. Dora Baltea, 6 (off.) - tel. 3371.

L'AQUILA - Rossi Ermanno - c.so Federico II, 58-60 - tel. 3252.

SHERRING THE PROPERTY. LA SPEZIA - Mazzoncini Gino - v.le S. Bartolomeo, 9-11 R - tel. 21802. LATINA - Tari Francesco - v. G. Matteotti, 54 - tel. 3733.

LAVENO MOMBELLO (Varese) - Lucchina Carlo - v. Labiena, 51.

```
LECCE - Tommasi Giovanni 
v. Leuca, 42 A-B-C (neg.) tel. 2396.
v. C. Casetti (off.).
```

LECCO (Como) - Meregalli Alessandro - Lungo Lario Isonzo, 10 - tel. 22359.

LECCO (Como) - Pirovano Giuseppe - v. L. da Vinci, 10 - tel. 22519.

LEGNAGO (Verona) - Scaravelli & Maestroni - c.so della Vittoria, 15 - tel. 20829.

LENDINARA (Rovigo) - Sala Tenna Giuseppe - v. Cavour, 33 - tel. 147. LIVORNO - F.lli Scardigli - v.le Carducci, 76 - tel. 21038.

LODI (Milano) - Cremascoli Giambattista - c.so Adda, 109 - tel. 2100. LUCCA - Ferrando Antonio - v. Catalani, 4 - tel. 6103.

LUCERA (Foggia) - Testa Francesco - p.za del Popolo.
 MACERATA - Moretti Primo - c.so Cavour, 15 - tel. 2962.
 MAGENTA (Milano) Viola Giuseppe & Riccardi Giancarlo - v. Mazzini, 9

- tel. 2226. MANTOVA - Bollini Alessandro - v. Scarsellini, 9 - tel. 1858.

MASSA CARRARA - Serafini Enrico & Figlio - v. E. Chiesa, 29 - tel. 7496. MATERA - Ponte Tommaso - v. Lucana, 99 - tel. 1211.

 MERANO (Bolzano) - Casa del Pneumatico di F. Bassetti - v. Mainardo, 70 a - tel. 3477.

MERATE (Como) - Casati Benvenuto - v. Statale, 44 - tel. 2364.

MESSINA - Arnò Paolina di Pietro - v. Ugo Bassi, 36-38 - tel. 10169.

 MESTRE (Venezia) - Tenni Omobono di Bruna & Giuseppe Tenni - v. Cappuccina, 47 F - tel. 52779.

MILANO - Co. R.E.M. di N. Mocarelli - c.so Concordia, 12 - tel. 799994.

MILANO - Fiorini Primo - v. Lepontina, 12 (ang. v. Farini) - tel. 690385.

MILANO - Micheli Pino - v.le Col di Lana (ang. v. Col Moschin, 1 - tel. 830075.

MILANO - Negrini Giovanni - v. Parmigianino, 11 - tel. 430873.

MILANO - Francone & C. v. Andrea Doria, 32 (neg.) tel. 203156. v. Pier della Francesca, 2 (off.) tel. 91494.

MODENA - Canepari Armando di Renato Franchi - c.so Adriano, 6 - tel. 23854.

MONDOVI' (Cuneo) - Candela Michele - c.so Statuto, 49 - tel. 2365.

MONTECATINI T. (Pistoia) - Arrigoni & Lorenzi - c.so Roma, 60 - t. 2543.

MONZA (Milano) - Fiorenzo Magni & C. - v. F. Cavallotti, 1 B - tel. 4625.

MORBEGNO (Sondrio) - Autorimessa Stella G. - v. Nazionale, 7 - t. 61231.

MORTARA (Pavia) - Guazzora Pierino - c.so Torino, 28 bis - tel. 333.

NAPOLI - De Luca Vittorio - Riviera di Chiaia, 266-270 - tel. 392933.

NAPOLI - Faraglia Fausto - v. Arcoleo, 23-27 - tel. 392457.

NAPOLI - Kutufà Piero - c.so Umberto I, 221 - tel. 325634.

NOCERA INFER. (Salerno) - Tortora Erminio

∫ p.za Municipio, 1-3 - tel. 1534 v. Matteotti, 26.

NOVARA - Mototecnica Porino - Baluardo Q. Sella, 34 - tel. 22075. NOVI LIGURE (Alessandria) - Zacco F.Ili - c.so R. Marenco, 19/A tel. 2146. ORISTANO (Cagliari) - Dore Francesco - v. Tirso, 74 - tel. 329. ORVIETO (Terni) - V.A.G.O. - v. al Duomo. PADOVA - Francar - Riviera dei Mugnai, 1 - tel. 25569. PADOVA - Giuriatti Giampaolo - v. S. Fermo, 15 - tel. 39425. PALERMO - Ribolla Francesco - v. R. Pilo, 6-10 - tel. 17654. PARMA - Motoforniture Sacchetti F.lli y. 22 luglio, 14 (neg.) - tel. 3433. | Borgo della Posta, 9 (off.) - tel. 8793. PAVIA - Fumagalli Carlo - v. Parco Vecchio, 1 (ang. strada Vigentina) tel. 22369. PERUGIA - Lucarelli Carlo & C. - v. G. Marconi, 61-63 - tel. 42178. PESARO - Brusi Riccardo - p.za Lazzarini, 7 (ang. v. Borgomozzo, 2-4) tel. 4403. PESCARA - Motogarage Marabelli di Marabelli G. ∫ v. C.te di Ruvo, 44 (neg.) - tel. 3585. v. Maruccini, 32 (off.).

PIACENZA - Cavanna Luigi 

v. Maruccini, 32 (off.).

Barr. Torino, 261 (neg.) - tel. 4606.

v. Emilia Pavese, 12 (off.) - tel. 2023. • PIEVE DI CADORE (Belluno) - Zoppè Giuseppe - v. Roma, 3 - tel. 2295. PINEROLO (Torino) - Botto Ernesto - p.za Roma, 7 - tel. 2096. PIOMBINO (Livorno) - Bilenchi Eredi - v. Fucini, 11 - tel. 2252. PISA - Cav. Palla Torello fu Primo - p.za Toniolo, 4 - tel. 23419. PISTOIA - Arrigoni & Lorenzi - c.so Gramsci, 16 - tel. 2697. PONTASERCHIO (Pisa) - Cav. Palla Torello. PORDENONE (Udine) - Nadali M. di Mario & Ettore Nadali - c.so Garibaldi, 59 - tel. 2691. PORTOFERRAIO (Livorno) - Braudi Renato - v. Carolucci, 169 - tel. 148. POTENZA - Pisati Luigi & Figlio - c.so Umberto I, 27-29 - tel. 1597. RAGUSA - Boncoraglio F.lli - v. Tenente Lena, 35. RAVENNA - Bandini Terzo - v. Maggiore, 1 - tel. 22685. REGGIO CALABRIA - Marcianò Carmelo - c.so Garibaldi, 469-471 - t. 2665. REGGIO EMILIA - Valli Umberto - v. Emilia S. Pietro, 63 - tel. 3243. RHO (Milano) - S.r.l. Casa dell'Auto - v. dei Martiri, 23 - tel. 2433. RIETI - Blasi Lionello - v. Garibaldi, 300 - tel. 2274. RIMINI (Forlì) - Molari Silvio - p.le G. Cesare - tel. 26706. ROMA - Agenzia Faraglia S.r.l. v. Velletri, 16-22 - tel. 863184 - 841324. v. Magna Grecia, 31 - tel. 754897. STATESTAND STEEN S 

ROVERETO (Trento) - Royal Garage - c.so Bettini, 33 - tel. 3192.

ROVIGO - Brajato Guido - v. F. Cavallotti, 8 - tel. 5804.

SALA CONSILINA (Salerno) - Alfisi Antonio & Rocco - v. Nazionale, 166-168 - tel. 46.

SALERNO - Tortora Augusto - v. G. Vicinanza, 22-24 - tel. 2581.

SALUZZO (Cuneo) - Parola Bruno - v. Spielberg, 106 - tel. 2523.

S. GIOVANNI VALDARNO (Arezzo) - Ermini L. & Ermini E. - c.so Italia, 225 - tel. 80165.

SAN SEVERO (Foggia) - Maggio Francesco - v. Soccorso (ang. v. Crogan - ang. v. Australe) - tel. 387.

SANREMO (Imperia) - Giordano Stefano - c.so Garibaldi, 37 - tel. 6891.

SARONNO (Varese) - Amodeo Giovanni - v. A. Diaz, 3 - tel. 2171.

- SARZANA (La Spezia) Mazzoncini Gino v. Sobborgo Emiliano, 7.
   SASSARI Rag. Sechi Nino v. Roma, 134-138 tel. 2636.
- SCHIO (Vicenza) Berton Rino v. S. Giovanni Bosco tel. 21158.
   SENIGALLIA (Ancona) Pupazzoni Lamberto

v. Fagnani, 2-1 (neg.) - tel. 2659. p.za Simoncelli, 1 (off.) - tel. 2454.

SESTO S. GIOVANNI (Milano) - Besana G. & Marcolini E. - v.le Gramsci, 81 - tel. 249461.

SESTRI LEVANTE (Genova) - Sola Agostino - Pila - tel. 41174.

SIRACUSA - Scalora Orazio - c.so Umberto, 120 - tel. 1357.

SOMMA LOMB. (Varese) - Magnoli Francesco - v. G. Mazzini, 73 - t. 23437.

SONDRIO - Sciaresa Silvio - v. C. Battisti, 1 - tel. 2808.

STRADELLA (Pavia) - Carena Pasquale - v. C. Battisti, 2 - tel. 229.

TARANTO - Feroni Costantino - v. Dante A., 26-28-30 (ang. v. Duca di Genova).

TERAMO - Ciarelli Mario - v.le Bovio, 4 - tel. 2139.

TERNI - SO. CO. MO - v. 1° Maggio, 55 (ang. v. Faustini) - tel. 23287.

THIENE (Vicenza) - Berton Rino - v. Trieste, 32 - tel. 31065 - 31197.

TIRANO (Sondrio) - Soltoggio Marco - p.za Marinoni, 2 - tel. 71144.

TIVOLI (Roma) - Rita De Santis - v.le Trieste, 16 G - tel. 4187.

TORINO - Botto Ernesto - c.so Mediterraneo, 66 - tel. 595233.

TORINO - Botto & Incisa - v. Cernaia, 31 - tel. 40983.

TORINO - Gamba & Dolza v. Palestrina, 2 - tel. 22750. v. Mazzini, 34 - tel. 86041.

TORTONA (Aless.) - Fossati Andrea - c.so Alessandria, 58-60 - t. 82009.

TRAPANI - Rag. Torrente Pietro - v. G. B. Fardella, 83 - tel. 1695.

TRENTO - Nocchi Biagio - v. Manzoni, 21 - tel. 23102.

TRENTO - Petrich Emilio - p.za Venezia, 1 - tel. 21759.

TREVIGLIO (Bergamo) - Bonaldi Lorenzo - p.za Cameroni, 3 - tel. 2814.

TREVISO - O. Tenni di Bruna & Giuseppe Tenni

v. S. Margherita, 5 - tel. 22667.
v. Castel Menardo - tel. 5521.

- TRIESTE Mototecnica Cremascoli G. v. Fabio Severo, 18 tel. 38903. UDINE - Nadali M. di Mario & Ettore Nadali - p.za 1º Maggio, 4 e 40 a - tel. 2471 - 3085.
- VADO LIGURE (Savona) Rossi Armando v. Aurelia (Pal. Ambra) tel. 85325.

VARESE - Cortelezzi Paolo - v. Bernascone, 16 - tel. 21161.

VELLETRI (Roma) - Tetti Irene - v. Lata, 53 - tel. 960826.

VERBANIA INTRA (Novara) - Cicognani Ferdinando - c.so Mameli, 53 tel. 41193.

VERCELLI - Brusa Domenico - v. S. Paolo, 6 - tel. 2172.

VERONA - Ruffo Bruno - v. Ghiaia, 2 - tel. 22271.

VERONA - Scaravelli & Maestroni - v. Tezone, 2 - tel. 24643.

- VIAREGGIO (Lucca) Ferrando Antonio v. Matteotti, 4 tel. 3435. VICENZA - Berton Rino - c.so S. Felice, 149 - tel. 22825.
- VIGEVANO (Pavia) Guazzora Pierino v. Madonna degli Angeli, 3. VITERBO - V.A.G.O. | p.za della Rocca, 6-12 - tel. 2220. v. Matteotti, 77-79 - tel. 3854.
- VITTORIO VENETO (Treviso) Zoppé Giuseppe v.le della Vittoria, 9 tel. 2200.

VOGHERA (Pavia) - Molinari & Versiglia - v. Emilia, 1 - tel. 3246.

# ELENCO CONCESSIONARI ESTERI

- ARGENTINA Giuseppe Vianini Sarmiento, 459 Buenos Aires tel. 32-6195/96 - telegr. Vianini Buenosaires.
- AUSTRALIA (Stato del Queensland) Bob Todd, The Local Cycle Works -1, Victoria Place - Brisbane - tel. J 2605 - J 6832 - telegr. Bobtodd -Brisbane.
- AUSTRALIA (Stato del Sud) Sven Kallin Motors Ltd. 140, Gawler Place - Adelaide - tel. W 2266-7 - telegr. Kallinmotor - Adelaide.
- AUSTRALIA (Stato di Victoria) S. R. Evans Motors 334, Elizabeth Street Melbourne, C. I. - tel. Central 1751/5594.
- BELGIO Ets. L. Vanderhulst 54, Rue d'Artois Bruxelles tel. 12.36.23
- 13.07.00.

  BRASILE Luiz Latorre Rua Gen. Osorio, 723 Sao Paulo tel. 35-5627 telegr. Motoguzzi Sao Paulo.

- CEYLON Foreign Trades e Agencies Ltd. 119 Union Place Colombo 2 (C.P. 798) tel. 7716 telegr. Forentraco Colombo.
- CILE Ori Limitada San Francisco 16 Santiago.
- CONGO BELGA Elve Congo Avenue Général Tombeur de Tabora Leopoldville (Résidence Baudouin) 10 Avenue de Kigali Elisabethville (Filiale).
- CUBA Ladra & Tijos Animas, 325 Habana tel. M 7573 telegr. Aldra Habana.
- ETIOPIA Aurelio Meucci Eden Street, 25 Cas. Post. 655 Addis Abeba tel. 1892 telegr.: Meucci Addis Abeba.
- FRANCIA Anc. Ets. Paul Maury 1 Place d'Estienne d'Orves Paris (9<sup>a</sup>) tel. Trinitè 56-77/56-78 telegr. Coq Maury Paris.
- GERMANIA K. H. Weidauer Fürstenstrasse, 5 München tel. 21.446.
- GIAPPONE Mikuni-Shoko Company, Ltd. 4, Kanda-Gokencho, Chiyoda-Ku - Tokyo - tel. 83.0517/0518/6650 - telegr. Xymas - Tokyo.
- GRECIA B. Aglamisis Ermou Str., 113 Atene tel. 27989.
- INGHILTERRA Motor Imports Co. Ltd. Ass. dalla Pride e Clarke Ltd. -154 Stockwell Road - LONDON S.W.9 - tel. Brixtom 6251 - telegr. Motim, Claproad, London.
- IRLANDA Stanley Woods & Burney, Ltd. 67 Pearse Street Dublino tel. 71749/40.
- NICARAGUA Reynaldo Tefel Apartado 24 Managua.
- OLANDA G.R.E.M.I. Oude Ebbingestraat, 32 Groningen tel. K 5900 27745.
- PERU' CO.NA.RES Jiron Arequipa, 120 Lima tel. 30953 30954 30955 telegr. Conares Lima.
- SPAGNA Motorhispania S. A. Av. Gen.mo Franco, 449 Barcelona tel. 397510 telegr. Mothispania Barcelona.
- SUD AFRICA (Transvaal) Rambler Motor & Cycle Agency 40-46 Elston Avenue Benoni tel. 54-4854.
- SVIZZERA Vicari Carlo (Canton Ticino) v. Serafino Balestra, 37 Lugano tel. 21026.
- SVIZZERA Christen Werner (Canton Ginevra) Rue de Carouge, 47 Ginevra tel. 252371.
- URUGUAY M.A.R.I.E.S.A. Agraciada, 3102 Montevideo tel. 23661 telegr. Mariesa Montevideo.
- U.S.A. Branch Motorcycle Sales 2019, West Pico Blvd. Los Angeles 6, California tel. Dunkirk 3-7243 telegr. Branchmo Los Angeles
- VIET-NAM Thanh Phu Ufficio: 10 Truong-minh-Ky Negozio di vendita: 89/c Lê-van-Duyêt - Saigon - telegr. Macove Saigon.

ARTE GRAFICA VALSECCHI LECCO - VIA ROMA N. 28 2.500 copie - LUGLIO 1958

SHERRED STEPRED SHE

