SERVICE MANAGER'S
PERSONAL COPY

VOL. 16, NO. 24 DECEMBER 15, 1942

MORE HELP!

The condition we are facing today is one where there is more service work available than can be handled with the number of mechanics available.

We are like the farmer who today has more acres and more crops than he can handle with the help he has left. He has the choice of turning down business by discontinuing the use of productive land or of training new help. If the country is going to eat, the farmer will have to get used to a new kind of help and he is going to have to take time to train this new help.

If this country is to keep in use its vital automotive transportation system, service stations are going to have to get used to the idea of getting and training new help. We can hardly hope to get along if automobiles, busses and trucks are taken off the roads because of lack of help, due to prejudices against hiring and training women. Women in repair shops will very soon be a matter not of choice but of staying in business.

It is a shortsighted policy to sit around and make up long lists of things women can't do and reasons why women will never be of value in repair shops. The automobile business was never built and cannot be maintained on the basis of impossibilities.

There are many kinds of work women can do around a service station to save time. They can move cars, work on the parts counter and in fact run the parts department, wash and polish cars, help mechanics with such jobs as remove carburetors, dissemble and clean them, remove carbon, change light bulbs and fuses and lubricate cars.

We must first overcome the prejudice against hiring women and admit that if we are to hold enough service business to more than cover operating expenses, we must have more help.

The next problem is how do you go about getting them and how do you train them. The answer to the first part is—you get them the way you get men — advertise, check vocational schools and word of mouth. Women are not hard to employ. The hard part is to make up your mind to do it. You will find they adapt themselves quickly and pleasantly. It has been pointed out that you should avoid the glamor type. Check for mechanical liking or ability and watch for "a ready smile and neatness of appearance." Women in a shop must be able to inspire respect and courtesy both from other employees and customers. When the manner of her conduct and that of those she works with is clearly defined and backed up by the management, the customers will follow suit. If we go into this as a wartime necessity measure to help our customers in maintaining a vital part of our war effort, we will find that it does work.

You can sit back and wait for factory schools or trade schools to do the training job but it never worked for men mechanics and our opinion is it won't work for women either. It's a matter of individual old style "helper" type of training plus some classroom work on general principles and the sooner we get at it, the better.

We need work to stay in business and we need help to do the work in sufficient volume to make it profitable so let's get and train the help.

FRAME SPLASHER
20th Series Clipper

The Service Letter of January 15, 1942, contained an article describing the installation of a splasher on the frame of the 20th series Clipper.

The purpose of the splasher is to prevent water and mud from reaching the clutch and transmission linkage, because in cold weather it may freeze on the linkage and prevent the proper operation of the clutch pedal and the gearshift.

Only an unusual combination of weather conditions can cause trouble, but the condition can make driving very difficult if it does occur.

We suggest that you review the Service Letter mentioned above, and that the splasher be installed if it is found that mud and water are preventing the proper operation of the linkage.

PACKARD—HARRISBURG

The December 1 issue of the Service Letter contained a picture of a very fine display and work space for Packard Blue Coral. Credit for the display was given to Joseph Canis. This was a matter of poor checking on our part. The correct name is Joseph Louis. We regret the error.

WATERPROOFING OVERDRIVE SOLENOID

If it is found necessary to replace the solenoid assembly in a car equipped with an overdrive, the unit should be examined to determine the cause of the failure.

When a car is subject to an unusual amount of road splash, you may find that the unit has been put out of commission by water entering the cover. This will be an unusual condition.

It will be well, however, to see that the solenoid which you install is protected against water. The joint between the housing and the cover can be coated with Permatex. The nuts holding the cover and the screws, which act as binding posts for the wires, can be similarly coated after the wires are attached.

This is an operation which we cannot perform at the factory because the wires must be in place before the screws are waterproofed.

ELECTROMATIC CLUTCH FAILURE TO RELEASE

In a car equipped with an electromatic clutch, the clutch should automatically disengage before the car comes to a stop.

Occasionally you may find a case in which the clutch does not release, so that the motor stalls as the car stops. It will be much easier to correct the condition if you know how it is supposed to work.

In normal direct drive operation, the electromatic does not work. This is because the solenoid shut-off valve (also called the direct speed solenoid) is closed. This valve is No. 3 on the diagram. When it is closed, there is no vacuum in the operating cylinder.

When the car slows down below 20 m.p.h., however, we want the electromatic to go to work. This is accomplished by the governor switch. When you take your foot off the accelerator and the car drops below the governed speed, the governor points close. This completes the circuit through the shut-off valve. The valve opens and the clutch operates.

You can see that if the points do not close the shut-off can't open and the clutch will remain engaged.

There is another switch in this same circuit which can cause trouble. If you will follow the EC wire from the governor, you will see that it goes through the accelerator switch on the dash (No. 10) on its way to the shut-off valve.

This accelerator switch is not absolutely necessary—it is simply a refinement to give smoother high gear operation. It is connected with the accelerator, so that as the throttle opens, the points separate. This is so that you can drive in high gear below the governed speed without having the clutch disengage. As long as the throttle is even slightly opened, the circuit will be broken, so that the shut-off valve cannot be energized and cannot put the electromatic to work. (Maybe you had better read this paragraph again, slowly).

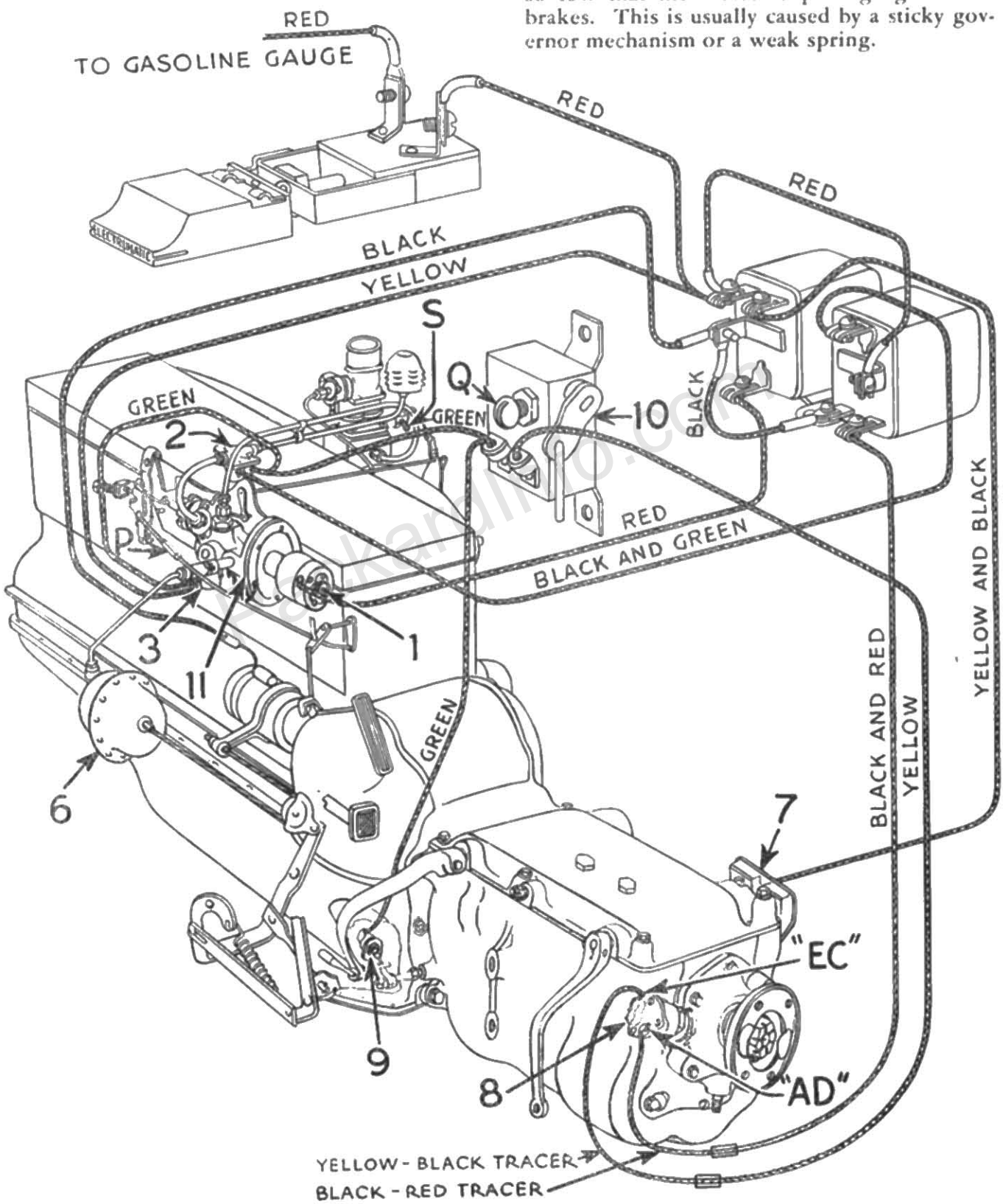
As you slow down to a stop, both the governor points and accelerator switch points close, so that the circuit is completed—the shut-off valve opens and the clutch is released.

If the clutch *doesn't* release, it means that the valve hasn't opened, and the circuit should be checked. The break is most apt to be found at the accelerator switch. Perhaps the throttle linkage does not close completely, or perhaps the switch adjustment is incorrect.

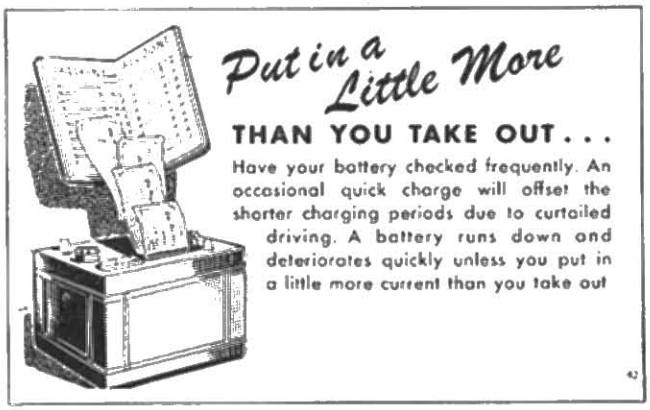
The adjustment of the switch is fully covered in the electromatic instructions. It can be quickly checked from the driver's seat. Depress the accelerator slowly with the ignition turned on; the ammeter should move slightly—showing that the circuit is completed—while the pedal is going through its free travel.

A poor contact anywhere in the circuit can either break the circuit or reduce the flow of current to such a point that the shut-off valve solenoid is unable to operate.

Sometimes the governor simply "hangs on" too long, failing to break at the normal governed speed. It may hang on until the car speed is so low that the motor is pulling against the brakes. This is usually caused by a sticky governor mechanism or a weak spring.



4 GALLONS OF GAS WON'T KEEP A BATTERY CHARGED



This Reminder Postal Card, No. 42, will bring in some added business and help a lot of your customers this winter. . .

Re-read the articles on "Run Down Batteries" in volume 16, No. 22 of Nov. 15, 1942. Tell your customers you can help them with their battery problem.

PACKARD IN SOUTH AMERICA

This picture comes from Lima, Peru and shows the personnel of the "LaCommercial Importadora S. A." It handles distribution and service on Packard cars under the able supervision of V. A. Mortellra, formerly factory and Export service supervisor. A note on the picture reads—"*El personal de la casa Packard con todo carino al Sr. Vans Mortellra.*"

We are glad to welcome our South American friends to the columns of the Service Letter.

ANTI-FREEZE SOLUTION

We are frequently asked whether a certain anti-freeze solution is familiar to us, and whether we recommend it.

There are so many preparations on the market that even in normal times we cannot keep track of them, and the name and description seldom give any clue as to the character of the product.

There are only two types of anti-freeze mixtures which can be considered satisfactory.

1. Ethylene glycol solution
2. Alcohol solution

For many years, efforts have been made to develop anti-freeze mixtures from other materials. These efforts have recently been intensified because of the scarcity of alcohol and ethylene glycol, but no satisfactory substitutes have been found.

Ethylene glycol mixtures such as Prestone and Zerex are usually preferred. These mixtures have so high a boiling point that they do not lose their strength. They permit the use of a high temperature thermostat in the water system, so that the engine runs better and the heater is more effective.

The various alcohol solutions are quite similar in their characteristics. Different types of alcohol differ slightly in their boiling points, but in no case is it safe to use a high temperature thermostat in the water system. It is necessary to watch for evaporation when an alcohol mixture is used.

It is not safe to sell or to recommend an anti-freeze of a type other than the two described above. Calcium chloride mixtures, even though they contain inhibitors, are corrosive in their action and tend to form a scale deposit. Their use is not advised. Kerosene has no ill effects on metal parts, but its heat capacity is low and its action upon rubber objectionable. It has a pronounced seepage tendency and a noticeable odor.

If you are considering the sale of a new anti-freeze, the first thing to do is to determine its *type*. The different types are clearly defined and this information will be given if you insist on it. You can then be governed accordingly.

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