

## BRAKES WEAR TIRES IN MOUNTAIN TRIPS

There is one feature of tire waste which has apparently escaped the attention of those who have been urging all possible economy in the use of tires, and that is the great construction of the tread due to excessive use of brakes in mountain driving.

It is possible to make these beautiful mountain trips north without excessive tire wear providing one uses his engine as a brake but, either through lack of knowledge as to how this is done or through carelessness, a great many motorists depend entirely upon their brakes to hold them even on the longest and steepest grades.

Using second speed on the easy grades and low on the steep ones, a motorist can negotiate almost any mountain grade with only a slight brake pressure where he would otherwise have his wheels locked, fairly scraping the tread off his tires, a fact which makes these trips so expensive for many people.

This probably would effect fully 50 per cent of those who go into the mountains, says C. K. Hughes of Smith-Hughes company, and would mean a saving of at least one-third in the wear of tires on any such trips as these.

## STUDEBAKER OFFERS NEW SEDAN SERIES

As its peculiar usefulness becomes more widely known, the Sedan type of motor car is growing in popularity among motorists. It readily adapts itself to the immediate use of which it is required, and the field that it covers is perhaps broader than that of any other type of car.

To meet the ever-growing demand for this type of motor car, Studebaker has designed a Sedan body of unusual beauty and elegance for its new series 19 light-four and light-six chassis. And if individuality is the truest key to automobile excellence, as some people claim that it is, the new Studebaker sedan is splendidly prepared to meet every demand of the most discriminating buyer.

The dominant impression of the new Studebaker sedan is the uniform beauty of its lines, the extreme care with which it has been designed and built, and the quality of materials and workmanship that enter into every part of its construction," says Robert C. Greth, Studebaker distributor for Phoenix and surrounding territory where the newest Studebaker creation is on exhibition.

"Staunchness is featured throughout the construction of the new Studebaker sedan," continued Mr. Greth, "and with eight solid upright posts, extending from floor to roof, there is a solidity to this car that makes it particularly free from annoying rattles. All parts are made to fit the particular construction. It is entirely possible for a purchaser four or five years hence to obtain a window or some other part that will fit perfectly.

"The sweeping lines of the series 19 Studebaker touring cars have been carried over into the new sedan. The long, harmonious top lines, the delicate angle of the rear quarter, the shape of the doors, and the curve of the fenders reveal the rare good taste of the body artisan.

"As an additional preventative against rattling, the slides in which the glass windows operate are provided with small rubber rollers which press against the edges of the glass and absorb the shocks and thrusts. This particular feature is to be found for the first time on the Studebaker sedan. The glass is of one thickness throughout, making replacement easy.

"A mechanical window-lifting device is a convenience sure to be appreciated by all motorists. Another satisfaction point about the Studebaker sedan is its watertight, windproof odor construction and leakproof windshield. The rain visor outside of the windshield, at the top, protects the upper shield and the verticle sections, both adjustable to any angle.

"The upholstery of the new sedan is of high grade cloth laid in parallel plait and finished with whipcord binding. It is conservatively elegant, trim and attractive. A cut glass dome light, operated by convenient switch at side of right rear door, and silk roller curtains at the windows are features of the interior. Doors are wide and fitted with coach handles of special design; conveniently placed handles on inside enable driver or passengers to close doors without the long reach to the usual latch handles. The two rear doors and left front door lock from inside; right front door from outside."

## Practical Paragraphs

### Speedometer Drive

The average owner never gives the slightest heed to the speedometer drive and yet this part needs periodic inspection and lubrication. The driving gears ought to be lubricated once a week. If this is done they will operate very much more quietly and also they will last for a considerably longer time.

### Silent Chains

The tendency toward the use of silent chains seems to be increasing. It may not be amiss then, to remind the car owner that these parts should be cleaned frequently, especially when they run in an exposed position as in some starter and generator installations. The proper method of procedure is to remove the chain from its place, submerge it in kerosene oil for fifteen minutes. Then dry it thoroughly and next submerge it in a medium grade of lubricating oil, permitting it to remain in the bath until the oil has reached every bearing surface. Hard grease never should be employed as a chain lubricant.

### Summer Battery Troubles

During the warm weather, when night driving is common, the battery will need double attentive care. The most frequent trouble will be under-charging. This is due to the fact that the lamps are burned for long periods and the drain upon the battery is heavy. The stock instructions should be carefully followed. The cells must be kept filled up with water and to do this distilled water should be added every week. The solution on each of the cells should be tested every week and the specific gravity should be kept up to around 1.25, never allow the gravity to drop below 1.25. If the gravity does get too low, have it brought up to full strength by recharging. If the generator is not serving to keep the battery adequately charged, after the charging rate as the need shows, or have it done by the service station.

### Gear Changing

It is often found that gear changes from low or high into intermediate in the new cars are difficult. This is often due to the new clutch, which drags slightly, but more often it is caused by the operator's being new to the car and not thoroughly familiar with the speed of the motor at which shifting is easily accomplished. In this case a little practice is all that is needed. If the rasping of the second gear cannot be avoided and it is feared that the gears may be damaged, avoid shifting from first into second. Accelerate a little more and shift from first to high and then consult the service station, which will instruct as to the proper method of changing.

### Wire Wheels

The driver of a car having wire wheels should give this equipment an occasional detailed inspection for the purpose of locating possible loose spokes. While the wire wheel is so resilient that it usually suffers no dam-

age from an ordinary bump, at the same time, it occasionally happens that a spoke is loosened. In cases where the enamel has been cracked off, a little paint should be applied to forestall rust.

**Emergency Grease**  
When a grease cup supplying a bearing runs dry on the road, it is a simple matter to carry on by filling the cup with cotton waste, which has been saturated with lubricating oil. This takes the place of the grease very acceptably until a fresh supply of the heavier lubricant can be secured.

### Adjusting Brakes

After adjusting brakes it should be ascertained that the wheels run freely. This is done by jacking up the rear wheels and turning them by hand. If resistance is encountered and a scraping sound issues from the wheel as it revolves, the chances are that the brakes are dragging. In the case of fabric linings this trouble may be cured by prying the band with a screw-driver or similar tool. It is wise then on a tour to put the hand on the brakes during halts, as dragging will be indicated by heating of the drums.

### Number Please

Because of the great variety of windings necessary for service under varying conditions, starting motors and generators are given serial numbers and are usually fitted with a plate containing this and other data. In writing the makers for information in regard to their equipment, these numbers and data from the plates should be given, in order to insure intelligent replies.

## ONE CYLINDER CAR HELPS OUT STALLED MONSTERS ON ROAD

Although the Cadillac Motor Car Company has not built one-cylinder automobiles since the early days—1903 and 1904—this is not at all unusual for it to hear from owners who are still running these old cars.

One of the most interesting of such letters lately received comes from a man in Washington, D. C., who says he uses his single-cylinder Cadillac in his sales work among the grocery jobbers in Washington and Alexandria, Va. The car is a 1903 model A—one of the first Cadillacs built. The owner writes:

"I am not a mechanic, but I am a 'Jack-of-all-trades,' and I keep the old box so it will run up hill and down hill and drag anybody out of a rut that I meet in one, and there have been some of them.

"Some time ago I met a party on

Capitol Hill with an automobile carrying four men, and they had broken their crankshaft. I weigh 220 pounds, and I had my brother with me, who weighs 265 pounds. I pulled this automobile with four men in it, while my brother and I were in my old single-cylinder machine, and I pulled the whole business over to Anacostia with no trouble whatever.

"I took these people out over Pennsylvania avenue, and while people cheered the old Cadillac, they joshed the fellows sitting in the big machine. 'I make it a point to help any fellow who may be broken down on the road.'"

### TO OPPOSE CHAMP CLARK

MONTGOMERY, MO., Aug. 16.—Call was issued today for a meeting of the Republican congressional committee of the Ninth Missouri district next Tuesday to select a candidate to run against Speaker Champ Clark.

Use The Republican Classified Ads for Results—Read for Profit.

## FORESEE LONG TIRE SHORTAGE AND TELLS WHY

T. E. Rich, of the Rich Hardware Company, factory representative for Arizona for the Mighty Amazon Super tires and tubes, in the matter of government curtailment, said yesterday: "The government has requested tire manufacturers to curtail their tire output one-half. This means that very soon there will be a shortage in tires, which will become more stringent with time. There will also undoubtedly be

sharp advances in prices. It is therefore very important that tire users should immediately arrange for their supply, not only by taking care of their present demands, but by specifying at this time for future delivery of sizes they know now they will need later.

"By doing this you will secure your supply at present prices. You will ensure getting what you will need. And you will be doing your part in the general work of conservation of supplies and man-power, by enabling the factories to concentrate their work on known specified demands, rather than having to work in the dark producing unknown sizes to meet possible demands not specified in advance.

"This is simply introducing foresight and organization in a line of necessary supplies and will effect an immense saving in every way in the manufacture and distribution of tires. There is no possible objection or criticism to offer, and there is everything to gain. It is our belief that the entire output of the factories, as restricted, will be taken to supply orders placed in advance, leaving no supply on hand for filling orders for tires as needed later, out not ordered in advance.

"We are direct factory representatives for Arizona for the Mighty Amazon Super tires and tubes, which we are offering at the very highest grade made, at a moderate price. We solicit your trade and believe we have the best tire value on the market to offer you.

"But whether you use the Amazon or some other good tire, let us again urge you to at this time prepare for your coming requirements."

### CHILD ACCIDENTALLY KILLED

[Republican A. P. Leased Wire] FORT MORGAN, COLO., Aug. 16.—Merlin Dunne, 14 years old, was accidentally shot and killed today by Ellis Layton, a companion, while the two were dove hunting.

Use The Republican Classified Ads for Results—Read for Profit.

## THE BIG BROTHER TO THE RAILROADS KELLY-SPRINGFIELD MOTOR TRUCKS

HEAVY DUTY

# LISTEN!

## Here's Some Truck Sense

A motor truck is built primarily to haul goods in the most economical and efficient manner possible.

To accomplish this four things are necessary: Correct design, proper material, skilled and careful workmanship and rigid inspection.

A motor truck to be superior to other machines in its class must be better, part for part, than any other truck.

In the Kelly each unit operates in harmony with the other units. Consider our frame for example. It would be absolutely impossible to have the flexibility of this unit without a flexibly suspended motor and driving unit.

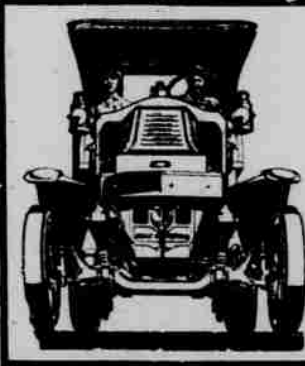
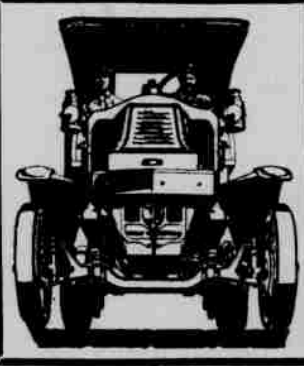
Our design, and the quality of material used, makes for economy, accessibility, simplicity and strength.

Our motors are of the long stroke, slow speed type, especially designed for motor truck work and automatically controlled against racing by a governor, driven by spiral gears from the camshaft. The location of our radiator and the accessibility of our motor is an advantage which cannot be over-estimated.

Come In and Investigate—You'll Be Convinced

## Tri-State Truck & Tire Co.

306 N. Central Ave.



**5000 MILES**

**THE MIGHTY AMAZON**

**ANNOUNCEMENT**

We have secured the exclusive agency for Amazon Super tires, the tire that has met with unprecedented favor throughout the entire country!

It is the tire that is "doing things". Outwearing all others, and averaging the highest uninterrupted mileage of any tire on the market!

Amazon's remarkable tread of live, velocity, virile rubber runs from four to five thousand miles without showing appreciable signs of wear!

Amazon's reinforced carcass protects against expensive blowouts with the resultant tube destruction. And Amazon's aristocratic appearance—a jet-black body with a circling snow-white stripe, adds class and character to any car.

Come in, and get acquainted with "Amazon, the Super tire!"

Distributors for Arizona, also agent for Swinehart solid truck tires  
**RICH HARDWARE CO.**  
Phone 1870 435 South Third Ave., Phoenix

## We Make a Specialty Of Vulcanizing Cord Tires

We have just secured an expert from Akron, Ohio, who makes a specialty of vulcanizing and repairing Cord Tires. He knows how and we guarantee his work, the same as all of our work.

## Used Tires---Used Tires

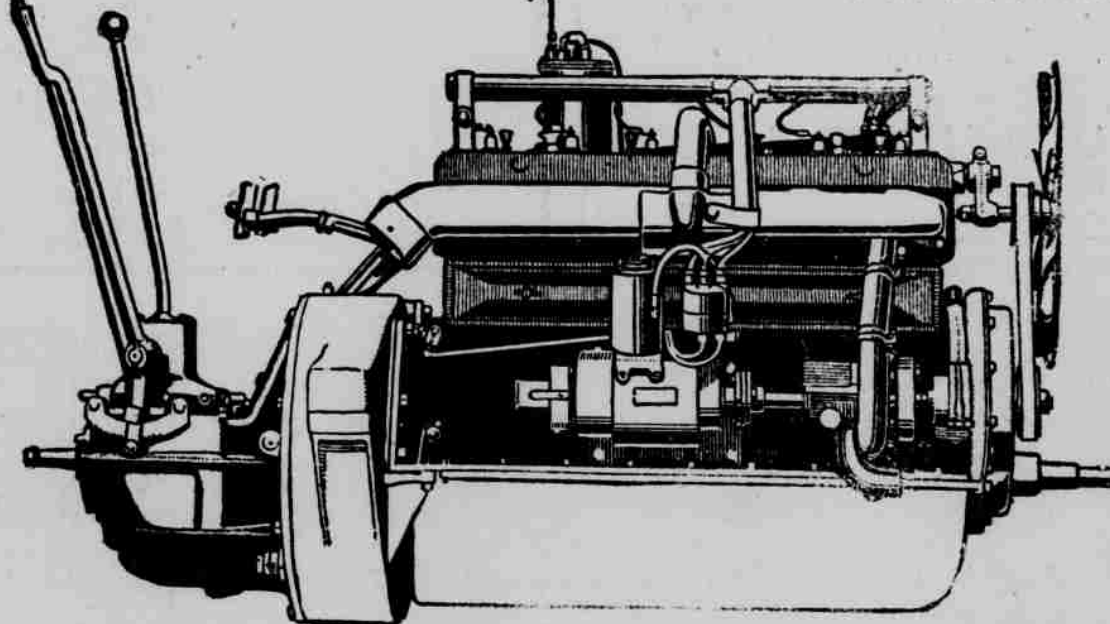
"Get next" to the economy of using used tires, also having your tires repaired to give you double service. Let us save you money on tires, our experts are at your service to show you. No charge for inspections and estimates.

## VAN'S TIRE HOUSE

Phone 793

31 South First Ave.

## 42 HORSE POWER KISSELKAR



Built in Kessel Shops

By Kessel Workmen

Under Kessel Supervision

## We Knew It Was Coming

Our keen foresight enabled us to see the auto situation as it really is. As you know there is a tremendous car shortage throughout the country and this is not all for soon a new car will be a thing of the past. We knew it was coming so we immediately contracted for many cars in advance and the result is that we can now make immediate delivery on Kessel pleasure cars. All we can say is buy now.

## KISSEL AUTO CO.

Distributors for Arizona

235 N. Central Avenue