



## UNITED STATES PATENT OFFICE.

FRANK H. SAVAGE, OF GAINESVILLE, TEXAS.

## OIL TESTER FOR FORD AUTOMOBILES.

Application filed June 26, 1923. Serial No. 647,932.

*To all whom it may concern:*

Be it known that I, FRANK H. SAVAGE, a citizen of the United States, residing at Gainesville, in the county of Cook and State of Texas, have invented certain new and useful Improvements in Oil Testers for Ford Automobiles, of which the following is a specification.

My invention relates to oil testing devices and more particularly to oil testing devices for Ford automobiles; and the object is to provide a simple mechanism for testing the amount of lubricating oil in the crank cases without having to go under the automobile to turn the cocks and which is adapted to turn one of the cocks or both of the cocks simultaneously. Other objects and advantages will be fully explained in the following description and the invention will be more particularly pointed out in the claims.

Reference is had to the accompanying drawings which form a part of this application.

Fig. 1 is a diagrammatic side elevation of the testing devices, showing the relative positions of the upper and lower cocks. Fig. 2 is a plan view of one of the cocks. Fig. 3 illustrates a variation in the devices for turning the cocks. Fig. 4 is another variation in the operating devices. Fig. 5 illustrates a variation in the devices for mounting the operating rods.

Similar characters of reference are used to indicate the same parts throughout the several views.

The upper cock 1 and the lower cock 2 are shown in their relative positions as to locations on the crank case. The cocks are of ordinary type and provided with handles 3 and 4 and discharge nozzles 5. Levers 6 are clamped on the handles 3 and 4 by bending an extension of the piece of metal which forms the levers 6 about the handles 3 and 4 and securing the same by nuts 7 and bolts 8. In this manner the levers are fixed on the handles of the cocks. The levers 6 are operated by pull-rods 9 and 10. The pull-rod 10 is rigidly connected with a sleeve 11. The sleeve 11 is slidable through the housing 12 at the front of the engine or automobile, and is provided with a knob or handle 13. The pull-rod 9 is slidable in the sleeve 11 and in a bracket 14 which is at-

tached to some part of the frame of the motor. The bracket 14 is braced by a brace 15 which is attached thereto and caught on the automobile frame member 16'. A spring 16 normally holds both cocks closed. This spring is mounted on the rod 9 between the bracket 14 and a collar 17 rigid on the rod 9. The rod 9 is provided with a handle or knob 18 and may be operated independently of the rod 10 to open the upper cock 1 because the rod 9 will slide freely through the sleeve 11. The cocks 3 and 4 are provided with the usual springs 19. When the knob 18 is released, springs 16 automatically close the cock 1. A pull on the knob 13 will open both cocks 1 and 2 because the knob 13 will abut against the shank of the knob 18 which is rigid with rod 9.

A locking or closing member 20 is rigid with the lever 6 and is adapted to close the mouth of the nozzle 5 in case of leaking of the valve in the cock. The member 20 is thus a safety device and in addition to the closing feature of the mouth of the nozzle, this member carries a catch 21 for engaging the side of the nozzle. The object of the catch 21 is to prevent the levers from turning the handles 3 and 4 too far.

The variations shown in Figs. 3 and 4 show the safety member 20 provided with the catch 21 engaging the side of the nozzle, but not adapted to close the mouth of the nozzle. The catch 21 serves the same purpose of preventing the turning of the handles 3 and 4 too far. On account of the close proximity to the engine, the levers cannot extend further towards the engine when the levers are operated than the handles are turned. For this reason, the levers are cut away as shown in Figs. 2 and 3 or the handles are cut away, as shown in Fig. 4.

Fig. 5 shows a variation in the supporting bracket 22.

What I claim is:

1. An oil testing device for motor-vehicles comprising a lever engaging the upper cock-handle and a lever engaging the lower cock-handle, pull-rods connected to said levers, a portion of one of said rods being a cylindrical sleeve and constituting one support for the other rod, a bracket for supporting both of said rods and a spring for automatically actuating said rods to close said cocks.

2. In a motor-vehicle having upper and lower drain cocks provided with handles and discharge nozzles; levers operatively connected to said handles and provided with locking lugs to engage said nozzles to limit the turning of said cocks, pull-rods for operating said levers simultaneously or independently of each other, and means for automatically returning said levers to closed position. 10

In testimony whereof, I set my hand, this 18th day of May, 1923.

FRANK H. SAVAGE.