S. CUNNINGHAM.
CRANK LOCK FOR AUTOMOBILES.
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Inventor
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Witness
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To all whom it may concern:

Be it known that I, Samuel Cunningham, a citizen of the United States, residing at Watertown, in the County of Codington, and State of South Dakota, have invented certain new and useful Improvements in Crank-Locks for Automobiles; and I do declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention has for its object to provide an extremely simple and inexpensive, yet a highly efficient and durable device for preventing the starting cranks of automobiles from being shifted inwardly sufficiently to crank the machine; and with this general object in view the invention resides in the novel features of construction and unique combinations of parts to be hereinafter fully described and claimed, the descriptive matter being supplemented by the accompanying drawings which form a part of this specification and in which:

Figure 1 is a side elevation partly in section showing the application of my invention to the motor of a Ford automobile;

Fig. 2 is a transverse section on the plane of the line 2-2 of Fig. 1;

Fig. 3 is a perspective view of the lock shown in Figs. 1 and 2; and

Fig. 4 is a perspective view illustrating a slightly different form of construction.

In the drawings above briefly described, the numeral 1 designates the crank case of a Ford automobile engine, 2 the channel shaped arm extending forwardly from said crank case, 3 the usual crank mounted rotatably and slidably in the bearing 4 at the front end of arm 2, 5 the fan pulley on the front end of the engine shaft and 6 the clutch member on the crank for engagement with the radial pins 7 of the pulley 5.

When cranking the motor, it is necessary to force the crank 3 inwardly to engage the clutch member 6 with the pins 7, but my invention prevents this movement of the crank and consequently will not permit starting of the motor by unauthorized persons.

A suitably shaped plate 8 is provided for location between the pulley 5 and the clutch member 6 to prevent inward movement of the latter, said plate having a lateral flange 9 which may extend in either direction therefrom for reception beneath the clutch member 6 (Figs. 1, 2 and 3) or beneath the pulley 5 as shown in Fig. 4. Either arrangement will prevent vertical movement of the plate and in order to prevent it from being shifted laterally by any one but the legitimate operator of the car, an arm 10 is provided, said arm preferably forming a continuation of the flange 9 and being shaped at its outer end for passage over the water pipe 11 which leads from the radiator to the engine jacket. A clamp member 12 is pivoted at 13 to the arm 10 and the free ends of said member and arm are formed with openings 14 adapted to receive a pad lock 15.

I prefer to secure the device to the motor by the means above described, but I wish it understood that any other preferred construction could well be employed for this purpose, it being essential in all cases however to provide the plate 8 with a lateral flange such as 9 or with other preferred means for preventing vertical movement thereof until the locking means is released.

From the foregoing, taken in connection with the accompanying drawing, it will be obvious that although my invention is of extremely simple and inexpensive nature, it will be highly efficient and durable. Since probably the best results are obtained from the several details shown and described, these details will in most cases be employed, but I wish it understood that within the scope of the invention as claimed, numerous minor changes may well be made.

I claim:

1. An automobile lock comprising a plate adapted to be interposed between the engaging clutch members of the engine shaft and the cranking shaft, and means for securing said plate in place, said means including a releasable lock.

2. A lock for automobiles comprising a plate to be interposed between the engaging clutch members on the engine shaft and the cranking shaft, a lateral flange on said plate to underlie one of said clutch members to prevent movement of the plate in one direction, and means including a lock for preventing other movement of said plate.

3. A lock for automobiles comprising a plate to be interposed between the engaging clutch members on the engine shaft and the cranking shaft, a lateral flange on said plate to underlie one of said clutch members to prevent movement of the plate in
one direction, an arm extending from said plate, and a clamping member pivoted to said arm for gripping a fixed part of the motor therebetween, the ends of said arm and clamping member having openings to receive a lock.

In testimony whereof I have hereunto set my hand in the presence of two subscribing witnesses.

SAMUEL CUNNINGHAM.

Witnesses:

F. R. MEADOWS,
M. A. PRYBERGER.

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."