## A. J. HOBBS.

### PRIMER FOR CARTRIDGES.

## No. 256,684.

(No Model.)

# Patented Apr. 18, 1882.

Fig. Ct ·





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Inventor

M.L. adams. M.G. Nalsey

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# UNITED STATES PATENT OFFICE.

ALFRED JAMES HOBBS, OF BRIDGEPORT, CONNECTICUT, ASSIGNOR TO THE UNION METALLIC CARTRIDGE COMPANY, OF SAME PLACE.

#### PRIMER FOR CARTRIDGES.

SPECIFICATION forming part of Letters Patent No. 256,684, dated April 18, 1882.

Application filed February 2, 1882. (No model.)

To all whom it may concern:

Be it known that I, ALFRED JAMES HOBBS, of Bridgeport, Connecticut, have invented a certain Improvement in Primers for Cartridges, 5 of which the following is a specification.

My invention is an improvement upon that class of primers for cartridges in which the anvil is a metallic plate placed flatwise in the cup and held in position by the friction of a 10 portion of its periphery upon the inner concentric surface of the cup.

My improvement consists in providing the inner face of such anvils with a central projection or boss, which, when the anvil is in-15 serted, bears upon the fulminate in the cup and insures the explosion of the fulminate by the blow of the firing-pin. The accompanying drawings, illustrating my invention, are as follows: 20 Figure 1 is a view of the inner face of the primer, showing the anvil in position. Fig. 2 is a section of the primer through the line x xon Fig. 1. Fig. 3 is a view of the anvil detached from the cup. Fig. 4 is a section of 25 the anvil through the line y y on Fig. 3. On reference to the drawings, it will be seen that the anvil A, which is inserted in the cup B, has its opposite ends each formed in sev-> eral planes, and thereby presents upon its pe-30 liphery a number of corners, which bear upon the inner surface of the cup with such friction as to hold the anvil firmly in place. The fulminate C is placed within the cup and covered with tin-foil D in the usual manner. 35 The anvil is provided upon its inner face with the central projection or boss, a, which, as will be seen, bears upon the mass of fulmi-

nate in the middle of the cup. Anvils of this character are stamped out of a brass plate of suitable thickness by means of a punch and die. 40 To produce the boss a, I form a projecting nipple upon the central portion of the punch, so that the anvil is stamped out and the boss formed upon it in one operation.

I am aware that annularly-corrugated anvils 45 for primers have been made from thin sheet metal. Such anvils, however, were provided with concentric flanges, and were held in place by the bearing of the flanges upon the interior of the cup. 50

The anvil which I employ is made of brass plate, and has no flanges, and is fastened in the cup by the bearing of portions of its periphery upon the interior of the cup.

I preferably form those portions of the periphery of the anvil-plate which bear upon the interior of the cup in planes, so as to present sharp corners, as and for the purpose described in Letters Patent of the United States No. 183,925, dated October 31, 1876, granted to A. 60 C. Hobbs for improvement in primers.

I do not claim broadly a primer-anvil having upon its inner face a central projection for bearing upon the fulminate; but

What I claim as my invention is— The metallic plate or anvil A, provided upon its inner face with the central boss, *a*, and presenting upon its periphery a number of sharp corners for engagement with the interior of the cup B, substantially as shown and described. 70 ALFRED JAMES HOBBS.

Witnesses:

A. C. HOBBS, HENRY C. RYLANDS.