(No Model.)

A. NOBLE & R. T. BRANKSTON. ANCHOR FOR FIELD GUN CARRIAGES.

No. 517,476.

Patented Apr. 3, 1894.





THE NATIONAL LITHOGRAPHING COMPANY, WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

ANDREW NOBLE AND RALPH THEW BRANKSTON, OF NEWCASTLE-ON-TYNE, ENGLAND, ASSIGNORS TO SIR W. G. ARMSTRONG, MITCHELL & CO., LIM-ITED, OF SAME PLACE.

ANCHOR FOR FIELD-GUN CARRIAGES.

SPECIFICATION forming part of Letters Patent No. 517,476, dated April 3, 1894.

Application filed August 19, 1893. Serial No. 483, 553. (No model.)

To all whom it may concern:

Be it known that we, ANDREW NOBLE, K. C. B., F. R. S., residing at Jesmond Dene House, and RALPH THEW BRANKSTON, en-

- 5 gineer, residing at Elswick Works, Newcastleon-Tyne, England, subjects of the Queen of Great Britain, have invented a certain new and useful Anchor for Gun-Carriages, of which the following is a specification.
- The object of this invention is to provide a non-recoiling field gun carriage with an anchor which automatically enters the ground and prevents the carriage from moving backward but yet allows it to be trained.
- 15 Figure 1 is a front elevation and Fig. 2 a side elevation of the carriage and anchor. The automatic anchor consists of a V shaped lever A having a plain or forked fluke B pivoted to the apex of the V so as to allow the
- 20 carriage to be trained when the fluke is in the ground and the lever A stands in an approximately vertical position. The upper ends of the V are pivoted at A' on or near the axle of the carriage. The fluke B is con-
- 25 nected by a chain C to the trail so that the lever cannot move forward beyond the vertical. When the anchor is housed in position for traveling it lies under the trail as shown in dotted lines in Fig. 2. When the carriage
- 30 is run up for firing the anchor is let go from the trail and rests on the ground. When the first round is fired the fluke automatically enters the ground and the carriage recoils until the chain attached to the fluke and the
- 35 trail is tight as shown in full lines in Fig. 2. The carriage is then held fast by the anchor, and in this position can be trained through a considerable angle by pivoting about the fluke without removing it from the ground.

40 The attachment of the chain to the fluke is

specially arranged to the rear of the pivot in order that the fluke may always retain its position at right angles to the trail.

What we claim is—

1. The combination of a gun carriage, an an- 45 chor arranged centrally between the wheels, a vertically arranged lever connecting the carriage with the anchor and arranged on a vertical pivot, and devices connecting the lever and anchor with the gun carriage to main- 50 tain the lever in a vertical position.

2. The combination of a gun carriage, an anchor arranged centrally between the wheels of the carriage, a lever connecting the anchor with the gun carriage, hinged connec-55 tions between the upper ends of the lever and the carriage to permit it to swing longitudinally of the carriage, a vertical pivot connecting the lever with the anchor, and devices connecting the anchor with the gun carriage 6c to prevent the lever from moving from a vertical position when the gun recoils. 3. The combination of a gun carriage, a le-

3. The combination of a gun carriage, a lever mounted on a vertical pivot beneath the carriage, a central anchor at the end of the 65 pivot, and means for preventing the lever from turning from an approximately vertical position.

4. The combination of a gun carriage, a lever A, an anchor B, a vertical pivot connect- 70 ing the anchor with the lever, and devices connecting the lever and anchor with the gun carriage to maintain the lever in a vertical position.

A. NOBLE.

RALPH THEW BRANKSTON.

Witnesses: T. PURVIS, L. W. WOODS.