No. 830,868. PATENTED SEPT. 11, 1906.

T. A. WATSON.

FRONT SIGHT FOR RIFLES.

APPLICATION FILED JULY 31, 1905.

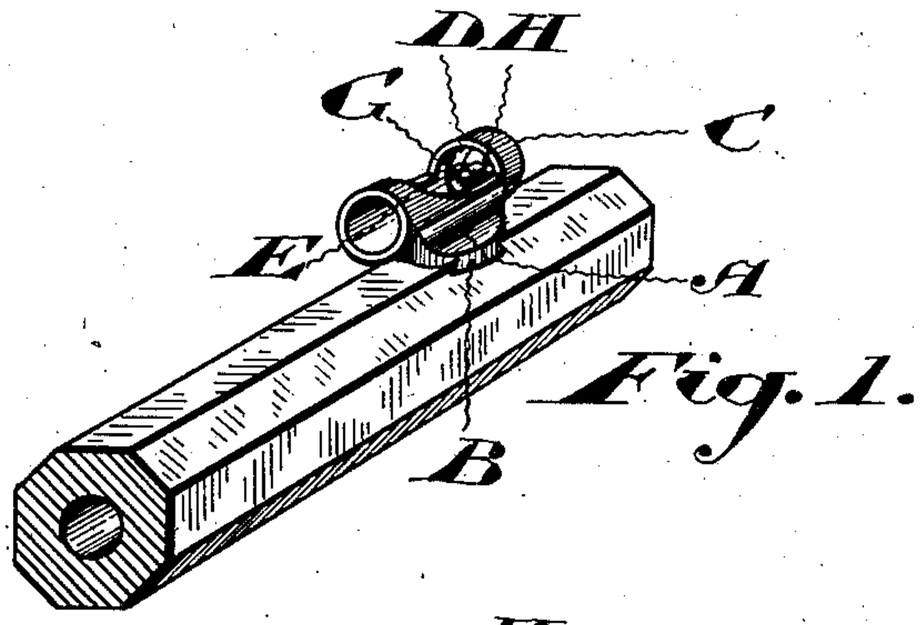


Fig. 1.

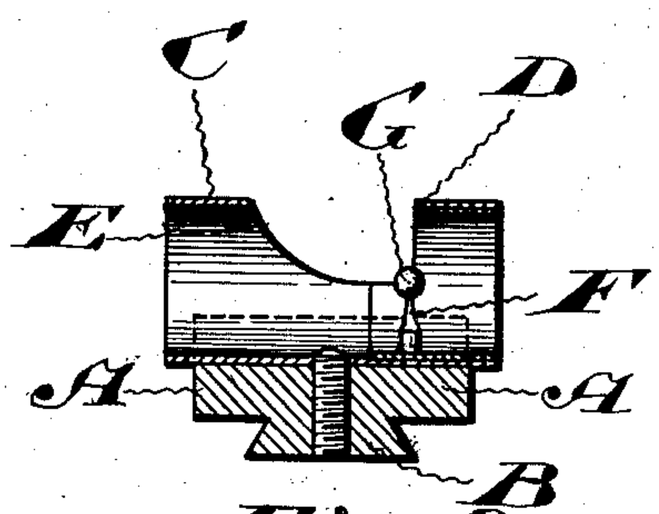


Fig. 2.

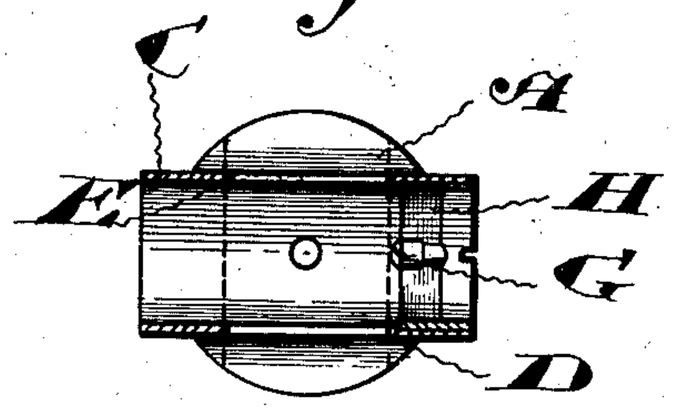


Fig. 3.

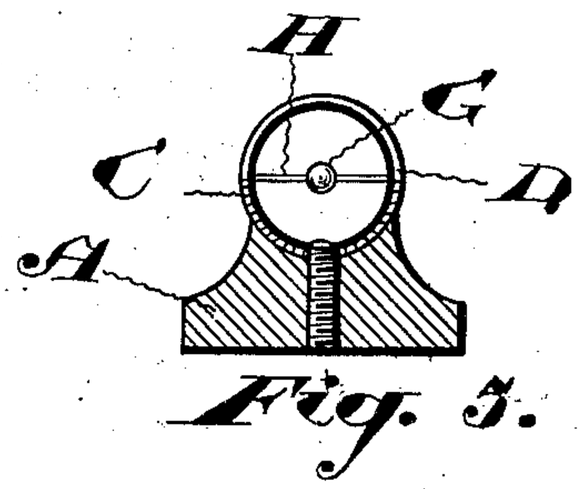


Fig. 5.

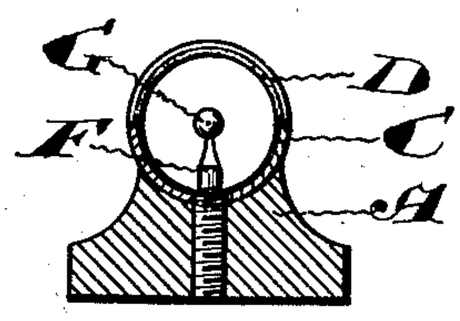


Fig. 4.

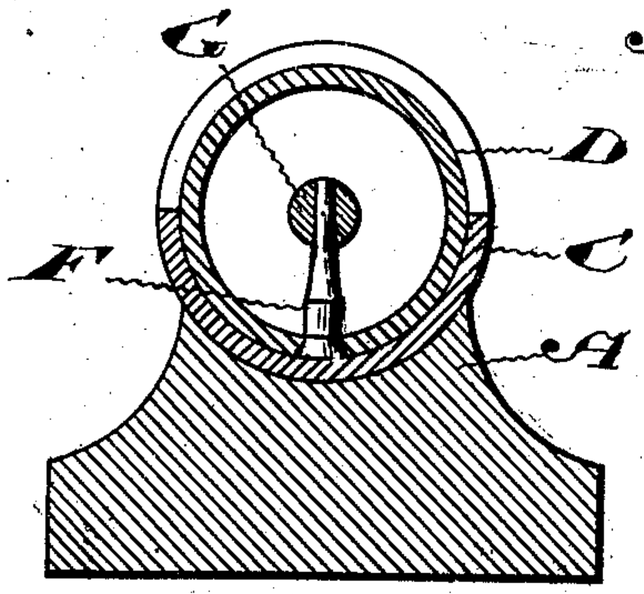


Fig. 7.

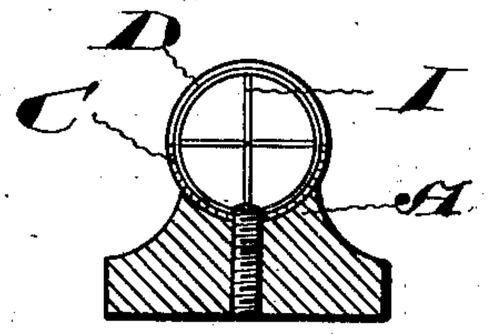


Fig. 6.

WITNESSES:

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# UNITED STATES PATENT OFFICE.

THOMAS ARCHER WATSON, OF CREEMORE, ONTARIO, CANADA.

## FRONT SIGHT FOR RIFLES.

No. 830,868. Specification of Letters Patent. Patented Sept. 11, 1906.

Application filed July 31, 1905. Serial No. 272,023.

*To all whom it may concern:*

Be it known that I, THOMAS ARCHER WATSON, of the village of Creemore, in the county of Simcoe and Province of Ontario, Canada, have invented certain new and useful Improvements in Front Sights for Rifles, of which the following is a specification.

The object of my invention is to devise a globe front sight for rifles which is effectively protected from injury, while the illumination of the globe is entirely unobstructed; and it consists, essentially, of a cylinder within which is supported the globe or sighting-bead, the middle or upper part of the cylinder immediately behind the globe being cut out in such a manner as to permit of light striking the globe from each side and from above, substantially as hereinafter more specifically described and then definitely claimed.

Figure 1 is a perspective view showing my improved sight applied to a rifle. Fig. 2 is a longitudinal section of the sight, on an enlarged scale. Fig. 3 is a sectional plan view of the sight. Fig. 4 is a cross-section of the sight. Fig. 5 is a cross-section of the sight, showing a different method of carrying the bead. Fig. 6 is a cross-section showing cross-hairs instead of a bead.

In the drawings like letters of reference indicate corresponding parts in the different figures.

The sight comprises a base A, provided with the usual dovetailed slide B, adapted to fit the usual barrel-slot.

On the base is mounted a hollow cylinder C. In the middle of the upper part of the cylinder is cut a substantially V-shaped notch. The forward side D of the notch is substantially vertical and extends substantially half-way down the cylinder toward the bottom. The other side E of the notch slants rearwardly, preferably on a concave curve, as shown.

Just at the forward end of the notch is set a stem F, carrying at its upper end a globe or bead G, preferably of some light-reflecting material. For this purpose I usually employ twenty-two-carat gold. It will be seen that this globe is in the axis of the cylinder and on a line joining the lower corners of the notch. Thus the rear half of the globe will be completely illuminated by light coming through the notch, the shape of the notch being such that the globe receives light from each side and above back of the plane of the forward side of the notch; but while the cylinder thus admits plenty of light for the illumination of the globe the latter is fully protected from damage by contact with branches or other obstructions. In an ordinary globe-sight the globe must be set within the protecting-ring, so that the proper illumination of the globe is interfered with.

In order to utilize light coming at as wide a variety of angles as possible, so as to adapt my sight to practically every kind of illumination, I cut down the aperture in the cylinder substantially half-way from the top, set the sighting means of light-reflecting material substantially at the forward side of this aperture, and cut back each part of the notch in V shape, so that when the rifleman is shooting with the light behind him the sight will still be thoroughly illuminated. Thus my sight is adapted to all kinds of illumination, except, of course, when the light is in front, when the sight will show dark.

Instead of the globe supported on the stem I may employ a bead of turquoise, ivory, or other desired material, supported by a cross-bar H in substantially the same position as the globe G. For certain purposes gold or silver cross-hairs I may also be employed, such as shown in Fig. 6. These cross-hairs being of reflecting material properly illuminated, effectively contrast with the object aimed at and are useful for fine shooting. I deem, however, the gold bead or globe and a blackened steel stem a preferable construction. This globe is held in position as follows: The upper end of the stem F is slightly tapered, and a smaller hole is formed in the gold globe, which is driven onto the end of the stem, and thereby securely held in place. The stem has previously been passed through a beveled hole in the ring J, which is made a tight fit within the cylinder or tube C. The lower end of the stem is beveled to fit the hole in the ring J. Thus when the ring is in position within the cylinder the stem will be seecurely held in place. Of course it could be brazed or soldered in the hole, if desired.

In the above description it will be seen that I have devised a front rifle-sight which would be very effective and yet perfectly safe from accidents.

What I claim as my invention is—

1. A front sight for rifles and the like comprising a hollow cylinder having a V-shaped light-aperture formed in the middle of its upper side, the forward side of the V being sub-

stantially vertical and extending substantially half-way down the cylinder; and sighting means of light-reflecting material set within the cylinder just at the forward side of the light-aperture, substantially as described.

2. A front sight for rifles and the like comprising a hollow cylinder having a V-shaped light-aperture formed in the middle of its upper side, the forward side of the V being substantially vertical and extending substantially half-way down the cylinder, the other side of the notch being a concave curve; and sighting means of light-reflecting material set within the cylinder just at the forward side of the light-aperture, substantially as described.

3. A front sight for rifles and the like comprising a hollow cylinder having a V-shaped light-aperture formed in the middle of its upper side, the forward side of the V being substantially vertical and extending substantially half-way down the cylinder; and a globe or bead of reflecting material supported in the axis of the cylinder and on a line joining the lower corners of the notch, substantially as described.

4. A front sight for rifles and the like comprising a hollow cylinder having a light-aperture formed in its upper side, the forward side of the aperture being substantially vertical and extending substantially half-way down the cylinder; and sighting means of light-reflecting material just at the forward side of the light-aperture, substantially as described.

Creemore, Ontario, 24th July, 1905.

THOS. ARCHER WATSON.

In presence of—
GEO. E. J. BROWN,
C. W. BRADLEY.