

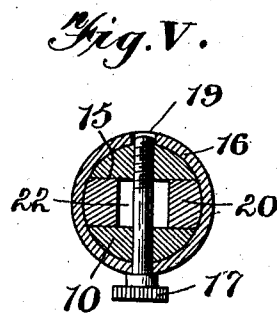
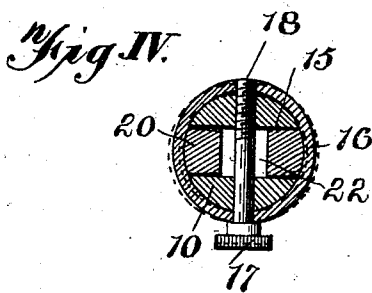
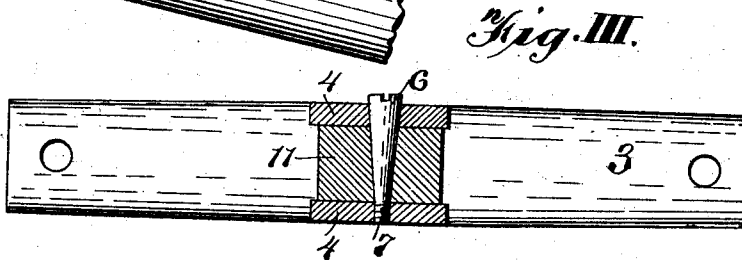
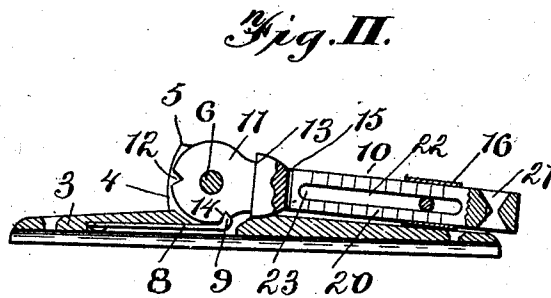
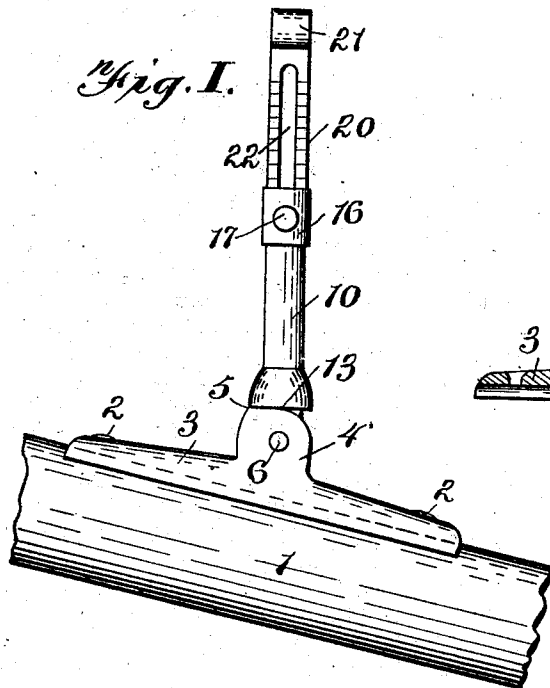
No. 696,942.

Patented Apr. 8, 1902.

R. CHESNUT.
GUN SIGHT.

(Application filed Nov. 20, 1901.)

(No Model.)



Witnesses:

Geo. E. Puck;

J. P. Patton.

Inventor:

Robert Chesnut;

By Collamer & Co.,
Attorneys.

UNITED STATES PATENT OFFICE.

ROBERT CHESNUT, OF BURNING SPRINGS, KENTUCKY.

GUN-SIGHT.

SPECIFICATION forming part of Letters Patent No. 696,942, dated April 8, 1902.

Application filed November 29, 1901. Serial No. 84,034. (No model.)

To all whom it may concern:

Be it known that I, ROBERT CHESNUT, a citizen of the United States, and a resident of Burning Springs, Clay county, State of Kentucky, have invented certain new and useful Improvements in Gun-Sights; and my preferred manner of carrying out the invention is set forth in the following full, clear, and exact description, terminating with claims particularly specifying the novelty.

This invention relates to firearms, and more especially to the rear sights used on small-arms; and the object of the same is to improve the construction of a sight of this type which is adjustable in order to adapt the gun or rifle to various ranges. Sights of this character must be mounted and adjusted with the greatest nicety, because inaccuracy of the fraction of an inch will destroy the aim by many yards or rods. These sights are commonly pivoted to a base-plate mounted upon the gun-stock and are brought into use only when the range is long, at which time they are raised on their pivots and the two members adjusted telescopically upon each other, so as to elevate or depress the sight proper.

My present invention contemplates the employment of a pivot of great nicety, so as to prevent lateral looseness of the sight, means for holding the latter rigidly upright when in use, and a peculiar form of clamp for holding the members adjustable, which clamp also necessitates certain peculiarities in the construction of the members themselves, all as hereinafter more fully described and claimed and as illustrated in the drawings, wherein—

Figure I is a left-side elevation of this gun-sight raised and with its members distended. Fig. II is a longitudinal section through the sight lowered and with its members considerably telescoped into each other. Fig. III is an enlarged transverse section through the pivot. Figs. IV and V are cross-sections through the ferrule and set-screw.

1 designates in outline the gun-stock, whereon is mounted, as by set-screws 2, a base-plate 3, having rising therefrom two ears 4, each provided with an angular front upper corner 5. Between these ears is fitted as closely as possible, and yet with some degree of looseness, a rounded head 11, formed upon the lower end of the standard 10 and having

a notch 12 in its lower edge, and the standard is provided with two side shoulders 13, as shown.

6 is a pivot which has a tapering body passing through one ear 4, then through the head 11, and screwed, as at 7, through the other ear 4, the construction being such that the pivot 6 can be screwed inward to tighten these parts and prevent lateral looseness.

8 is a spring secured in a recess in the bottom of the base-plate 3 and having at its free end a catch 9, which engages the notch 12 in the head 11 when the standard 10 is raised. When in this position, the shoulders 13 abut squarely upon the corners 5 and very firmly hold the standard upright, preferably at a slight angle longitudinally forward of a line perpendicular to the base-plate, as seen in Fig. I, and the shoulders by resting on the corners 5 also at this time assist in preventing any lateral movement of the standard. The head 11 may be provided with an additional notch 14, if desired, to hold the sight in folded or depressed position by its engagement with the catch 9.

The standard 10 is of any approved configuration, though it is necessarily provided with a longitudinal slot 15, struck in a plane parallel with the length of the base-plate. Surrounding its upper end is a ferrule 16, (see Figs. IV and V,) transversely through which passes a set-screw 17, whose shank also necessarily passes across the slot 15, and the tip or smaller end of this screw is threaded through that side or arm of the standard. In Fig. IV it is also threaded through the ferrule, as seen at 18, while in Fig. V it is loose through this ferrule, as seen at 19, these variations effecting a wide difference in the operation, as explained below.

20 is the shank of the sight proper, the latter being a small ring 21 at the upper end of the shank and pierced longitudinally with a fine peep-hole of any desired shape, although preferably being round in contour, with a very fine nick at its bottom. While the general contour of the standard 10 is approximately round, square, octagonal, or of some configuration whereby it is of substantially equal diameter in all directions, the shank in cross-section is preferably flat, though not sufficiently thin at its smallest diameter to permit vibration. Its greatest diameter stands par-

allel with the base-plate 3 and is about the same as the diameter of the standard, and its lesser diameter or thickness is about that of the width of the slot in said standard. The shank itself is slotted transversely, as at 22, the slot being sufficiently wide to pass astride the set-screw 17. The length of the shank is such that when its lower end rests at the bottom of the slot within the standard the ring or sight proper, 21, stands just above the upper end of the standard, which is flush with the upper end of the ferrule, and when these members are distended, so that the lower end of the slot 22 (which is closed, as at 23) is drawn up to or nearly to the set-screw, the sight is raised to the extreme elevation at which the gun is capable of doing accurate work.

In use the base is screwed upon the gun-stock with the corners 5 preferably forward, and when the sight is not to be employed it is folded down, as seen in Fig. II, the catch 9 then engaging the notch 14. When it is to be employed, the sight is raised until the shoulders 13 rest upon the corners 5 and the catch 9 engages the notch 12, at which time the standard is held rigidly upward against any movement longitudinally of or transverse to the gun-stock. The shank is then drawn upward to the desired point, which can readily be ascertained by graduations which are marked upon the shank or standard, or both, and the set-screw 17 is tightened. If the construction be that shown in Fig. V, this last movement draws the two arms of the bifurcated standard tightly against the opposite faces or flat sides of the shank, which latter is thereby tightly held not only against vertical movement, but also against lateral blow. If the construction be that shown in Fig. IV, such tightening of the set-screw 17 draws the laterally opposite walls of the ferrule toward each other until it assumes a slightly-elliptical shape, and as the arms of the bifurcated standard are inclosed within this ferrule they are necessarily clamped against the opposite faces of the shank. The resulting effect is the same with respect to the shank and the standard, but widely different with respect to the ferrule. In the first case the ferrule always remains cylindrical, while in the last case it is sprung out of this shape when the set-screw is tightened and resumes this shape when it is loosened. The latter movement obviously releases the grip upon the shank, which can then be housed within the standard either to readjust the sight or to completely telescope the parts, as when they are again to be folded down upon the gun-stock.

The parts are of the desired sizes, shapes, proportions, and materials, though preferably of the finest tempered steel, and neatly ground and fitted, so as to avoid any unnecessary looseness. It may also be wise to nickel-plate the parts before assembling them in order to avoid rust as far as possible.

What is claimed as new is—

1. In a gun-sight, a base-plate, and ears rising from the opposite sides thereof; combined with a standard carrying the sight proper, a head at the lower end of the standard fitting closely between said ears, means for holding the standard in an elevated or depressed position, and a pivot comprising a tapering unthreaded body passing through one ear and through the head and a threaded tip engaging the other ear, as and for the purpose set forth.

2. A gun-sight comprising two main members longitudinally slotted in planes at right angles to each other and the smaller member of a shape to telescope within the larger, and an adjusting-screw connecting the arms of the larger member and passing across the slot in the larger and intermediately loosely through the slot of the smaller member; combined with a base on which one member is pivotally supported, and a sight proper carried by the other member.

3. A gun-sight comprising two main members longitudinally slotted in planes at right angles to each other and the smaller member of a shape to telescope within the larger; combined with a support for the lower end of the larger member, a sight proper at the upper end of the smaller member, a ferrule surrounding the upper end of the larger member, and a set-screw passing transversely through said ferrule and the arms of the larger member, across the slot in the latter, and through the slot in the smaller member.

4. A gun-sight comprising two main members longitudinally slotted in planes at right angles to each other and the smaller member of a shape to telescope within the larger; combined with a support for the lower end of the larger member, a sight proper at the upper end of the smaller member, a ferrule surrounding the upper end of the larger member, and a set-screw passing transversely through said ferrule and the arms of the larger member, across the slot in the latter, and loosely through the slot in the smaller member, the tip of said screw engaging a threaded hole in the ferrule, as and for the purpose set forth.

5. A gun-sight comprising two main members one of which is slotted longitudinally and the other of which is of a size and shape to telescope into said slot, and means for approximating the arms of the larger member against the side faces of the smaller member for the purpose set forth; combined with a base-plate on which the lower end of the larger member is pivotally supported, and a sight proper at the upper end of the smaller member.

In testimony whereof I have hereunto subscribed my signature this the 6th day of November, A. D. 1901.

ROBERT CHESNUT.

Witnesses:

WILLIAM PARKER,
ISAAC CHESNUT.