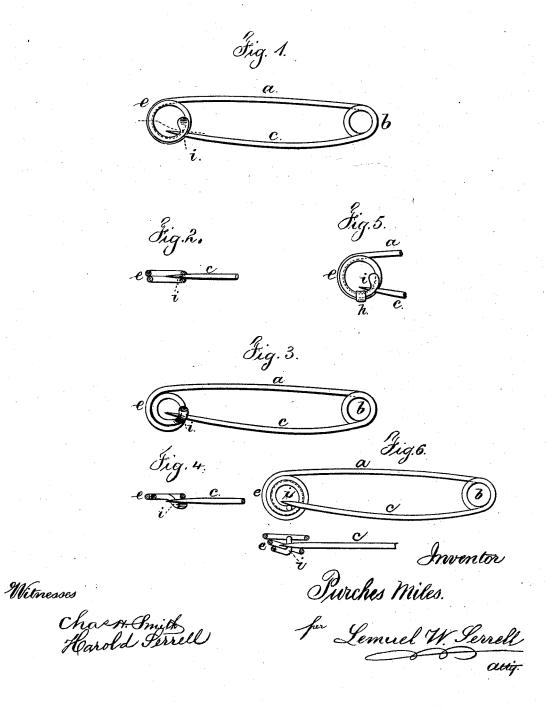
P. MILES. Safety-Pin.

No. 216,337.

Patented June 10, 1879.



## UNITED STATES PATENT OFFICE.

PURCHES MILES, OF NEW YORK, N. Y.

## IMPROVEMENT IN SAFETY-PINS.

Specification forming part of Letters Patent No. 216,337, dated June 10, 1879; application filed November 12, 1877.

To all whom it may concern:

Be it known that I, PURCHES MILES, of the city and State of New York, have invented an Improvement in Safety-Pins, of which the fol-

lowing is a specification.

Safety-pins have been made wholly and partially of wire, the pin-point having been received between and shielded by portions of the wire bent up to receive the point in a coil that is made at both sides of the end of the pin, as seen in Letters Patent No. 21,966.

My invention relates to a peculiar coil of wire, made at one side of the body of the pin, so that the pin-point lies between the two convolutions in the wire, and the pin-point is moved at one side of the body, and hence cannot come against the body itself when being hooked or unhooked.

In the drawings, Figure 1 is a side view of the pin, and Fig. 2 is a sectional plan of the coil, the parts in both figures being shown in

enlarged size.

The body of the pin, a, spring-coil b, and pin c are of usual size and character. The wire body a is terminated by the coil e, bent in the form of a circle, or nearly so, with a bearing at i for the pin to lie upon near the point thereof, the point itself of the pin lying within the circle of the coil, and in the same plane, or nearly so, but entirely at one side of the body a, so as not to come into contact with such body when the point is entered into or removed from such coil.

When the convolutions of the coil are one within the other, as in Figs. 3 and 4, the end of the wire is bent outwardly for the pin to rest upon, and upwardly to prevent the pin sliding off, thereby holding the same in a reliable manner against the side of the coil.

If the coil is made with the wires side by side, or partially so, as in Figs. 1 and 2, then the point of the pin is received between the first coil and the next, and by preference upon a shoulder or offset formed by flattening the wires sufficiently to allow the pin near the point to enter and lie upon its bearing, as aforesaid.

By this construction of pin there are not any short bends in the wire; hence steel and similar hard wire can be used without risk of breaking in manufacture, and the pins will be more durable and retain a sharper point than

the pins heretofore made.

It will generally be unnecessary, but a small band of wire, h, might surround the wires of the coil to hold them together where the pin bears upon such coil, as shown in Fig. 5; or the coils might be soldered at the said point; or the extreme end of the wire may pass into the coil, as shown in Fig. 6, for the point of the pint to rest upon.

I claim as my invention—

In a safety-pin composed of one piece of wire, a bearing at one end to receive and shield the point, such bearing being made of a flat coil at one side of the body of the pin, with a space between the first coil and the end part of the wire for the point, substantially as set forth.

Signed by me this 2d day of November, A. D. 1877.

PURCHES MILES.

Witnesses: GEO. T. PINCKNEY, CHAS. H. SMITH.