B. J. GREELY.

Safety-Pin.

No. 212,216. Patented Feb. 11, 1879.

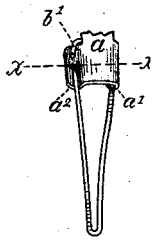

Fig. 1.

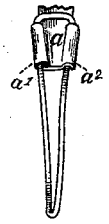

Fig. 2.

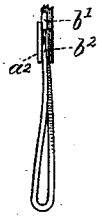

Fig. 3.

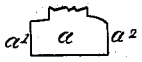

Fig. 4.

Fig. 5.

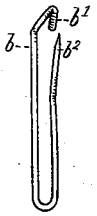

Fig. 6.

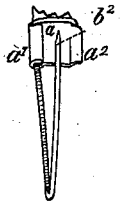

Fig. 7.

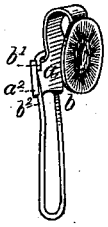

Fig. 8.

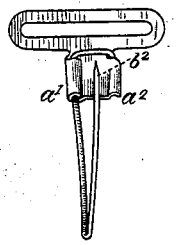

Fig. 9.

Witnesses

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UNITED STATES PATENT OFFICE.

BENJAMIN J. GREELY, OF BOSTON, MASSACHUSETTS.

IMPROVEMENT IN SAFETY-PINS.

Specification forming part of Letters Patent No. **212,216**, dated February 11, 1879; application filed April 6, 1878.

To all whom it may concern:

Be it known that I, BENJAMIN J. GREELY, of Boston, in the county of Suffolk and State of Massachusetts, have invented an Improved Safety-Pin, of which the following is a full, clear, concise, and exact description, reference being had to the accompanying drawings, making a part hereof.

Figure 1 is a rear view of one of my improved safety-pins, the head-piece being broken away, and the pin being hooked. Fig. 2 is a front view of Fig. 1, and Fig. 3 is a side view thereof. Fig. 4 represents the blank to form the shield; Fig. 5, a section on the line *x y*, Fig. 1; Fig. 6, a perspective view of the legs of the pin, bent into shape and detached from the shield. Fig. 7 represents a back view of the shield with the pin unhooked. Fig. 8 is a perspective view of one of my safety-pins, showing one form of head-piece; and Fig. 9 is a modification thereof.

The safety-pin is composed, essentially, of a pin portion made from spring-wire, bent to form the legs b b^2, and a shield portion, a a^1 a^2, to which is preferably added a head-piece, *c*, which, as shown in Figs. 8 and 9, forms an integral part with the shield.

The blank to form the shield, shaped substantially as shown in Fig. 4, has the ear a^2 curved to form a hook, and its ear a^1 bent to form an eye, as shown in Fig. 5.

The wire for the pin is bent to form two legs, b b^2. The end of b, made longer than b^2, is bent at 2, and then again at 3, to form a finger, b^1, and the end of b^2 is pointed. The bends 2 3 in the leg b are made at such an angular direction with relation to the bend 4 that the end of b, bent as at 2 3, when permanently applied and affixed to the shield a, as shown in the drawings, will cause the pointed leg b^2, when disengaged from the hook formed from the ear a^2, to spring backward to the rear of the shield, as shown in Figs. 7 and 9. In such unhooked position a straight horizontal line drawn to intersect each leg would intersect a straight horizontal line parallel with that portion of the leg b between the bends 2 3 at an angle of about forty-five degrees.

When the device is to be used, the leg b^2 is first inserted through the article to be held by it—as, for instance, a waistband of a garment, a stocking, or other portion of a garment—and then the free end of b^2, the leg b being held fast by the bent portion attached to the shield, is bent or sprung from its position with relation to the leg b, as in Figs. 7 and 9, so that the end of leg b^2 is brought to the front of the shield, as in Figs. 1 and 8, and then the said end is permitted to spring into the concavity formed by bending the ear a^2. This being done, and the leg b^2 being held or caught, as in Figs. 1, 2, 3, and 8, it will be noticed that the pin portion, composed of legs b b^2, when viewed at the edge of the head, shows a twisted eye between the legs b and b^2, as shown in Fig. 3.

By this construction it will be obvious the safety-pin, when its leg b^2 is inserted through a garment and fastened as in Figs. 1, 2, 3, and 8, by reason of the twist put into the legs of the pin below the point of attachment of the legs with the shield, will permit the shield to rest flat against the body of the wearer, and the garment engaged by the pin will have no tendency to tip or turn the shield edgewise, as would be the case if both legs of the pin when confined to the shield were parallel, as in some safety-pins heretofore made.

For gentlemen's use the shield will preferably have a hooked head-piece, *c*, as represented in Fig. 8; but for ladies' use the head-piece, instead of being made as a hook, will be made flat and provided with a slot, *d*.

The safety-pin is suspended or supported by its head-piece connected with a strap or otherwise.

I am aware that it is not new to swivel the leg of a pin upon a head-piece.

In this my invention, the pin and shield are so shaped and attached to each other that the point of the pin when unfastened will be upon one side of the shield, and when fastened will be at the opposite side thereof.

The manner of connecting the pin and shield may be varied without departing from my invention.

I claim—

1. A safety-pin composed of a shield and a spring-pin, one leg of which is rigidly connected or affixed to the shield, while the free

or pointed leg is adapted, when unhooked, to rest at one side of the shield, and when hooked is sprung to occupy a position at the opposite side of the shield, to operate as and for the purpose set forth.

2. As an improved article of manufacture, a safety-pin composed of a shield and a head-piece, by which the pin may be supported, and a spring-pin, rigidly connected with the shield, so that when both legs of the pin are held by the shield the legs of the pin will occupy such position with relation to each other and the shield as to form a twisted eye, to operate as and for the purpose described.

3. In a safety-pin, a head-piece combined with a rigidly-attached spring-pin, the lower bent portion, 4, of which is made to assume an angular position with relation to the head-piece, as described, to permit the safety-pin to support and hold a garment without twisting or turning the head-piece, as set forth.

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