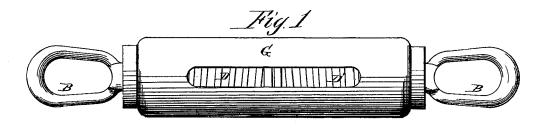
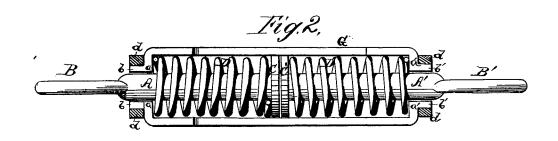
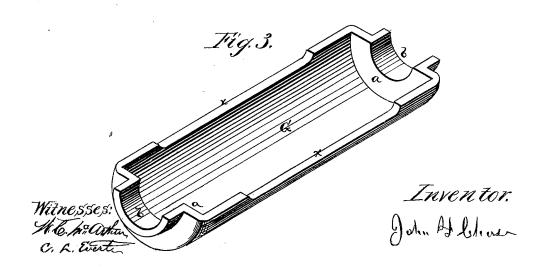
J. F. CHASE. Spring Plow-Clevis.

No. 198,275.

Patented Dec. 18, 1877.







## UNITED STATES PATENT OFFICE.

JOHN F. CHASE, OF DEEP RIVER, CONNECTICUT.

## IMPROVEMENT IN SPRING PLOW-CLEVISES.

Specification forming part of Letters Patent No. 198,275, dated December 18, 1877; application filed October 13, 1877.

To all whom it may concern:

Be it known that I, JOHN F. CHASE, of Deep River, in the county of Middlesex and State of Connecticut, have invented certain new and useful Improvements in Spring Plow-Clevises; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form part of this specification.

The nature of my invention consists in the construction and arrangement of a springclevis for plows, harrows, &c., as will be here-

inafter more fully set forth.

In order to enable others skilled in the art to which my invention appertains to make and use the same, I will now proceed to describe its construction and operation, referring to the annexed drawing, in which-

Figure 1 is a side elevation of my improved spring-clevis. Fig. 2 is a longitudinal section of the same, and Fig. 3 is a per-

spective view of a part of the casing.

My improved spring-clevis is composed of two rods or stems, AA', having eyes or loops B B' formed on their outer ends, and disks or buttons C C' on their inner ends, two spiral springs, D D', surrounding the rods or stems, and a bisected sleeve or casing, G G, surrounding the whole.

The exterior sleeve or casing is made of two semi-tubular or semi-cylindrical parts, G G, the ends of which are contracted to form interior shoulders a a; and when the two parts are together a circular orifice will be formed at each end of the casing of sufficient size to allow the free passage of the rods or stems

A A'.

Around the orifice, at each end of the casing, is formed an outwardly-projecting flange, b, and around such flange, at each end, when the two parts are put together, is forced a collar, d, for holding the two parts together.

The collars d may be fastened to the flanges b by pins, rivets, small set-screws, or any other suitable means; but in many cases such

extra fastenings are superfluous.

The rods or stems A A' pass through opposite ends of the casing, with the loops or eyes B B' at their outer ends, and the disks C C', at their inner ends, butting against each other in the center of the casing. The springs D D' are placed around their respective stems

within the casing, between the disks C C' and

the interior shoulders a a of the casing.

The springs D D' are made of different thickness, so as to be of different strength that is to say, one spring is light and the other heavy—whereby the clevis becomes adapted to be used for all kinds of work, whether light or heavy.

It will readily be seen that the light spring D' is first contracted, and then, if the resistance is great, the stronger or heavier spring

D is afterward brought into play.

This clevis is used in the same manner and for the same purpose as any of the springclevises now in use, and in operation it will be seen the two rods or stems separate from the center, the springs compressing from the center toward both ends.

By the construction of the exterior casing G G as described, in case of any breakage of the inside parts, the casing can be easily separated for repairing the parts, and then put

together again.

The two parts of the casing are constructed at their adjacent edges so as to form longitudinal slots x at their junction. This is done so as to see the interior of the mechanism, and also to allow any sand and dirt to work out that might have entered in any way.

Having thus fully described my invention, what I claim as new, and desire to secure by

Letters Patent, is-

1. In a spring-clevis, the combination of the two stems A A' with eyes or loops B B' and disks C C', and the springs D D', of different thickness and strength, all constructed and arranged within an exterior casing, substantially as and for the purposes herein set forth.

2. In a spring-clevis, the exterior casing made of two semi-tubular or semi-cylindrical parts, G G, having contracted ends to form interior shoulders  $\bar{a}$  and provided with outwardly-projecting flanges b, the two parts being connected together by means of collars d d, placed around said flanges, substantially as herein set forth.

In testimony that I claim the foregoing as my own I affix my signature in presence of

two witnesses.

JOHN F. CHASE.

Witnesses:

FRANK GALT, W. C. McARTHUR.