

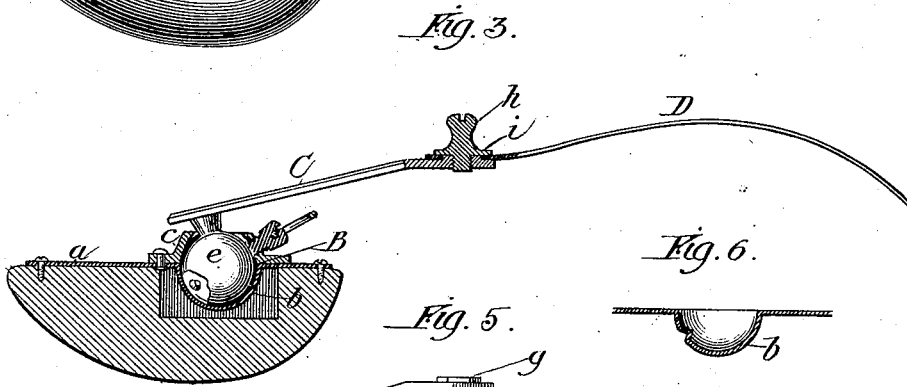
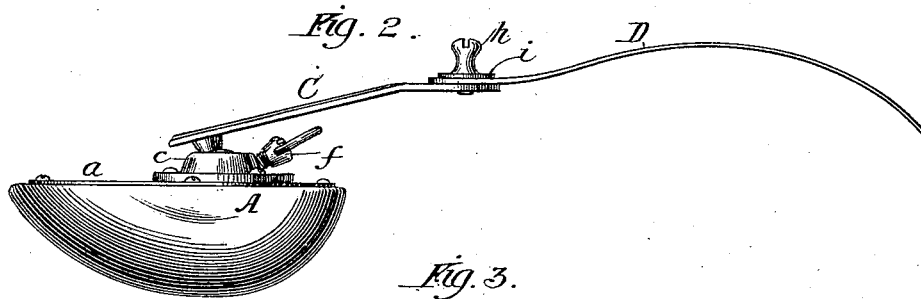
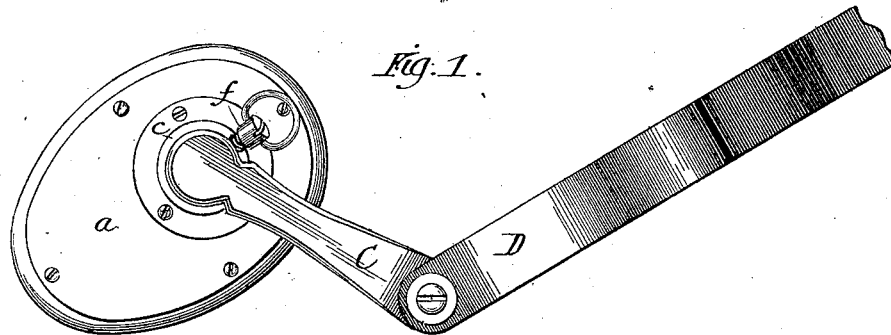
(No Model.)

T. G. OWEN.

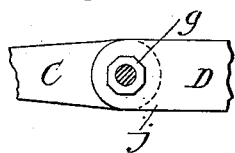
TRUSS.

No. 345,170.

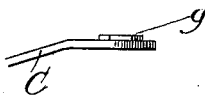
Patented July 6, 1886.



*Fig. 4.*



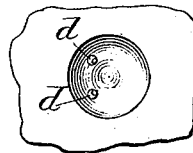
*Fig. 5.*



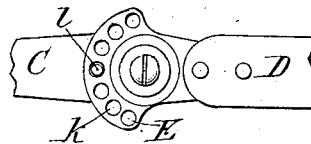
*Fig. 6.*



*Fig. 7.*



*Fig. 8.*



Witnesses:  
Albert H. Adams.  
Harry S. Jones.

Inventor:  
Thomas G. Owen

# UNITED STATES PATENT OFFICE.

THOMAS G. OWEN, OF CHICAGO, ILLINOIS, ASSIGNOR TO ANDREW H. PARKER, OF SAME PLACE.

## TRUSS.

SPECIFICATION forming part of Letters Patent No. 345,170, dated July 6, 1886.

Application filed January 26, 1886. Serial No. 189,784. (No model.)

*To all whom it may concern:*

Be it known that I, THOMAS G. OWEN, residing at Chicago, in the county of Cook and State of Illinois, and a citizen of the United States, have invented a new and useful Improvement in Trusses, of which the following is a full description, reference being had to the accompanying drawings, in which—

Figure 1 is a plan. Fig. 2 is a side elevation. Fig. 3 is a central section. Fig. 4 is a detail, being a plan view of the arm and spring at their point of junction, the holding-screw being removed. Fig. 5 is a detail, being a side elevation of the end of the arm which receives the spring. Fig. 6 is a detail, being a section through the lower part of the socket which receives the ball upon the end of the arm. Fig. 7 is a detail, being a top view of the lower part of the socket, and showing the two projections therein. Fig. 8 is an illustrative figure showing the common devices used for adjusting the arm and the spring in different positions relatively to each other.

It is necessary to adjust trusses to many different positions, and it has been common to provide a ball and-socket joint between the arm and ball of the truss, and also to provide two screws for the purpose of holding the ball in any desired position. It also has been common to make a joint between the arm which carries the ball and the spring of the truss, and means at such joint for adjusting the parts in different positions.

The objects of my invention are to provide improved devices for holding the ball in any desired position in its socket, and for readily adjusting and holding the arm which carries the ball and the spring in different positions, which I accomplish as illustrated in the drawings, and as hereinafter described.

In the drawings, A represents the pad of the truss, which is provided, as shown, with a plate, *a*, secured to its upper surface, which plate is provided with a socket, B, consisting of a depression, *b*, in the plate, and a piece, *c*, secured to such plate, the depression *b* entering a recess or hole made in the pad A.

*d* are two pins or points extending through the wall of the part *b* and a very short distance into the socket B.

C is the arm, having a ball, *e*, upon one end, adapted to fit the socket B.

*f* is a set-screw fitting a screw-threaded hole in the wall of the part *c* and projecting through the same, so that its end comes in contact with the ball *e*. By means of this screw *f* and the two points or projections *d* the ball, when adjusted to any desired position, can be firmly held in place. To reach just these parts, it is only necessary to loosen the one screw *f*. It will be observed that there are three holding-points, *d d*, and the end of the screw *f*, all of which come in contact with the ball *e*. The points *d* are located below the plate *a*, and are entirely out of the way. The outer end of the arm C is provided with a raised projection, *g*, which, as shown, is eight-sided. The projection and arm are provided with a screw-threaded hole.

D is the truss-spring, one end of which is provided with a many-sided hole adapted to fit over the projection *g*.

*h* is a screw, having a broad shoulder, *i*, by means of which the spring D can be held upon the end of the arm C in any desired position.

To adjust the spring D relatively to the arm C, it is only necessary to loosen the screw *h*, so that the end of the spring can be lifted off from the projection *g*. Then the position of the two parts can be changed as may be required, and when they have again been brought together they can be secured by means of the screw *h*.

In Fig. 8 I have illustrated the device in common use for adjusting the spring and arm relatively to each other. In this figure, D represents a spring; E, a button provided with a number of holes, *k*, arranged in the arc of a circle, the button being riveted at the spring D. C is the arm, which is provided with a pin, *l*, adapted to enter one of the holes *k*.

In order to get the proper adjustments, it is necessary to make the button E of considerable width, as shown in Fig. 8, which is not a desirable feature.

By means of the projection *g* and the many-sided hole in the spring D, I dispense with the button E, and make a very much more compact device, which is less likely to be annoy-

ing in use, and at the same time furnish a very strong, secure, and easily-adjusted joint between the two parts C and D.

In Fig. 6, instead of two pins *d*, I have shown  
5 two indentations in the wall of the socket.

What I claim as new, and desire to secure by Letters Patent, is—

In a truss, the combination of the pad-arm C, provided at one end with a lateral many-

sided projection, *g*, the spring D, having at one end a hole corresponding with and fitting said projection, and a holding-screw, *h*, having a broad flange or shoulder, *i*, substantially as described.

THOMAS G. OWEN.

Witnesses:

ALBERT H. ADAMS,

HARRY T. JONES.