

(No Model.)

W. D. DICKSON.

GRAIN SPOUT.

No. 261,837.

Patented Aug. 1, 1882.

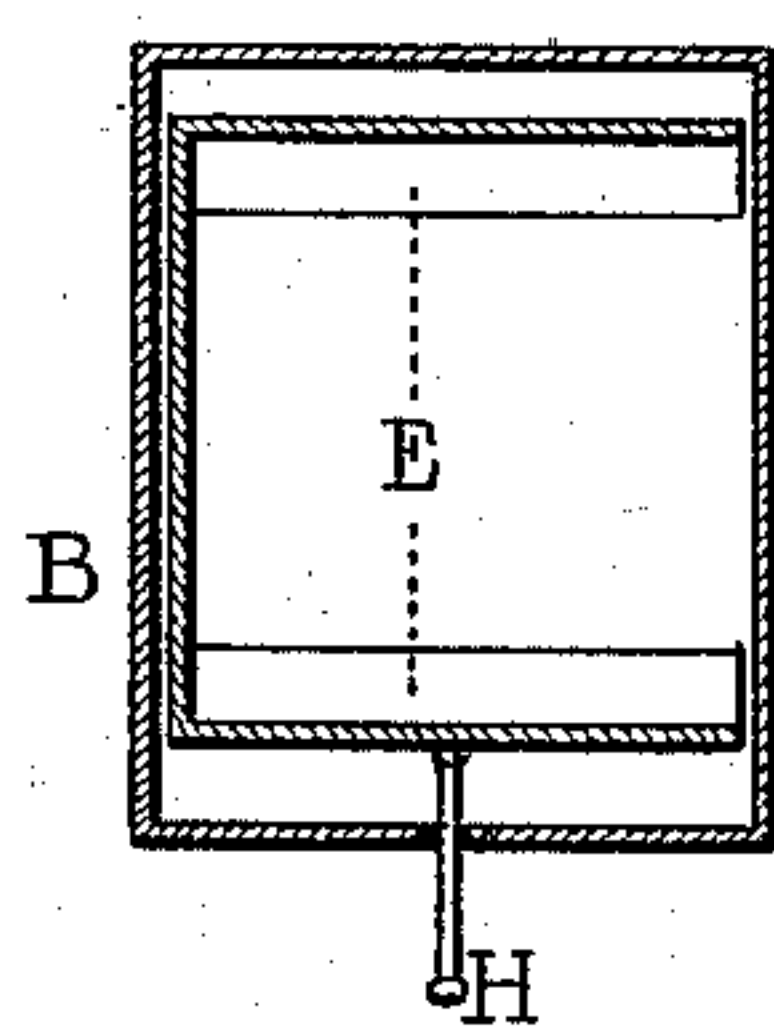


Fig. 2.

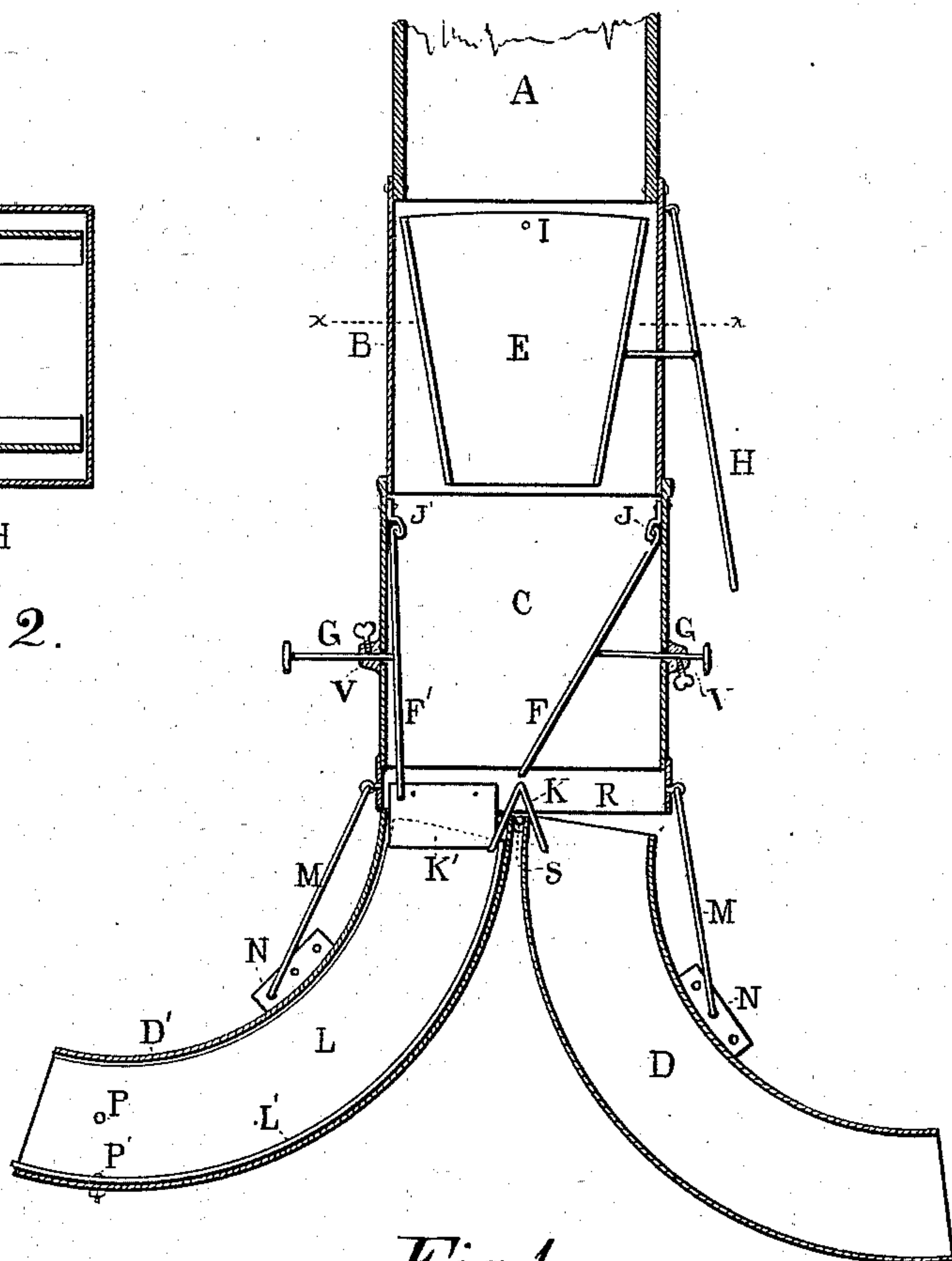


Fig. 1.

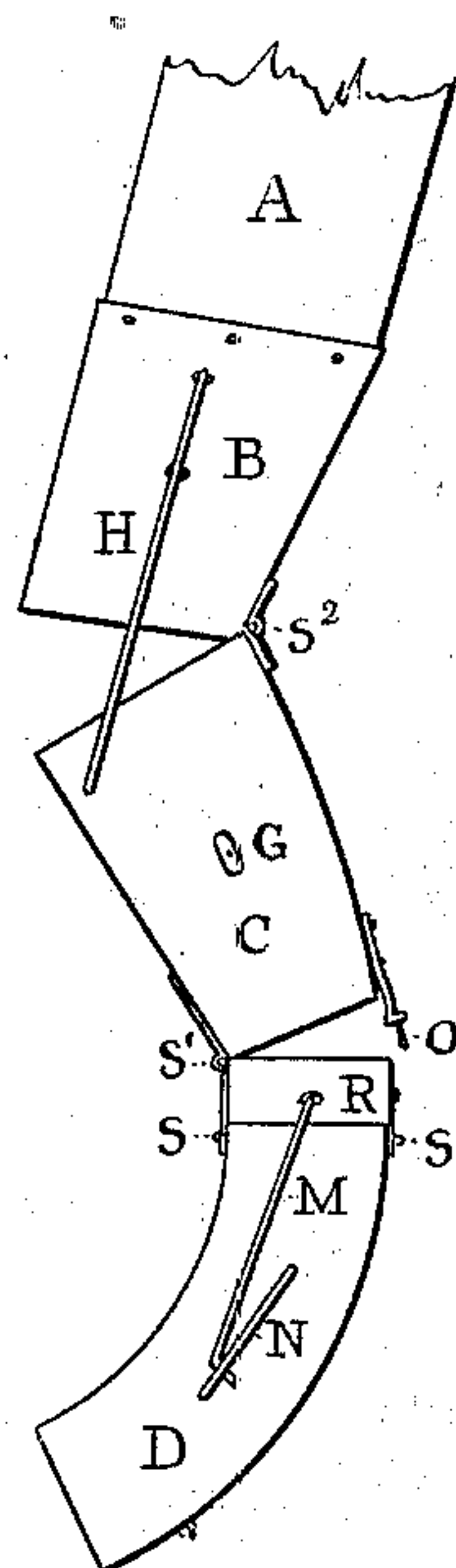


Fig. 3.

Witnesses:

H. W. Wells

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Inventor,

William D. Dickson

per A. B. Upham,
attorney in fact.

UNITED STATES PATENT OFFICE.

WILLIAM D. DICKSON, OF PEORIA, ILLINOIS.

GRAIN-SPOUT.

SPECIFICATION forming part of Letters Patent No. 261,837, dated August 1, 1882.

Application filed March 31, 1882. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM D. DICKSON, of Peoria, in the county of Peoria, in the State of Illinois, have invented an Improved Grain-Spout; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the annexed drawings, making a part of this specification, in which like letters of reference refer to like parts, and in which—

Figure 1 represents an elevation with entire front removed; Fig. 2, a cross-section at $x x$, Fig. 1; Fig. 3, a side elevation at a smaller scale.

The object of this invention is to effect the following improvements in bifurcated grain-spouts: first, to equalize the flow of grain through the two exits; second, to construct a lining for one of the sections, which can also be used for diverting the grain into one or the other of the exits; third, to make each of the two curved spouts $D D'$ angularly adjustable toward or from each other; fourth, to construct removable linings for said spouts $D D'$.

These improvements are embodied in the following construction.

The section B of the spout is fastened at its upper end to the wooden delivery-spout A. At its lower edge, S^2 , it is hinged to the corresponding rear upper edge of the section C. Said section C is in its turn hinged to the short section R at their front edges, S' . A spring-catch, O, holds them together in place.

The two curved spouts $D D'$ are hinged in such a way to the section R as to allow them to be moved angularly toward or from each other. To keep them at different desired angles, a plate, N, having two or more perforations, is firmly fastened to each of the spouts $D D'$, and a hooked rod, M, to catch into said plate, is attached to each side of said short section R. In Fig. 1 the spout D is shown as held partially turned downward by said hooked rod M and perforated plate N, while the spout D' is retained at its greatest upward throw.

The equalizer E, pivoted at the point I to the section B, consists simply of a back and two sides nearer together at the bottom than at the top. Fig. 2 shows its shape in cross-section. By means of the lever H and a connecting-bar the lower end of said equalizer is moved to either side, as desired.

The section C has for two of its opposite sides linings F and F', which can also be used for valves to turn the flow of grain entirely into one or the other of the spouts $D D'$. This is accomplished by having the upper edge of each bent over a short distance throughout its entire length and hooked into correspondingly-bent strips, J J', riveted to the inside of said section C. This device serves to give sufficient angular play to said valves F F', while at the same time entirely preventing any grain from getting behind them. These valves F F' are operated by means of the short rods and handles G, passing through the collars V. Said collars are fastened to the outside of the section C, and are provided with a set-screw each, by which the rods G, and therefore the valves F F', can be held at any desired point. Fig. 1 shows the valve F as secured in a position to throw all the grain into spout D'.

The removable linings for the two spouts $D D'$ are shown in Fig. 1 as furnished to the spout D' alone. I line only two sides of each spout $D D'$, as the force of the falling grain comes almost entirely upon those alone, which are the ones covered by the linings L and L'. The lining L' for the lower side of said spout is put into place by being slid along till its upper edge comes under the inverted-V-shaped clip K, fastened at its ends to the section R. Its lower end is held in place by a small bolt, P'. The other lining, L, is kept in place in the same way by a bolt, P, at its lower end, and at its upper end by a flat sheet of metal, riveted to the said section R and projecting down over said upper end of the lining L.

The object in having the two curved spouts angularly adjustable is that the grain can be thrown to different points in the car, and so trim the load more evenly. It also saves time in not requiring the car to be placed so exactly in the right position; or, if a car-door is a little narrower than most car-doors, the curved spouts $D D'$ can be unhooked, pressed together, put through the door into the car, and hooked up again.

This invention is substantially the same as the one which I filed as a caveat in April, 1881.

What I claim as my invention, and for which I desire Letters Patent, is as follows, to wit:

1. The rods and handles G and collars and set-screws V, in combination with the linings

L L', bent over at their upper edges and held to the section C by the bent strips J J', substantially as and for the purpose specified.

2. As a removable lining for the two spouts
5 D D' of a bifurcated grain-spout, the combination of the linings L L', bolts P P', and the clips K K', substantially as specified.

3. The combination, with the short section R,
10 hinged to the section C of a bifurcated grain-spout, of the two curved spouts D D', hinged to said section R, the perforated plate N, and the hooked rod M, substantially as and for the purpose specified.

4. The sections B, C, and R, hinged together,

as shown, at the points S² and S', in combination with the two outwardly-curved spouts D D', hinged at S to said section R, and provided with devices for retaining them at different
desired angles, substantially as and for the
purpose set forth. 15 20

In testimony that I claim the foregoing invention I have hereunto set my hand this 23d day of February, 1882.

WILLIAM D. DICKSON.

Witnesses:

H. W. WELLS,
R. GOLDSBORO.