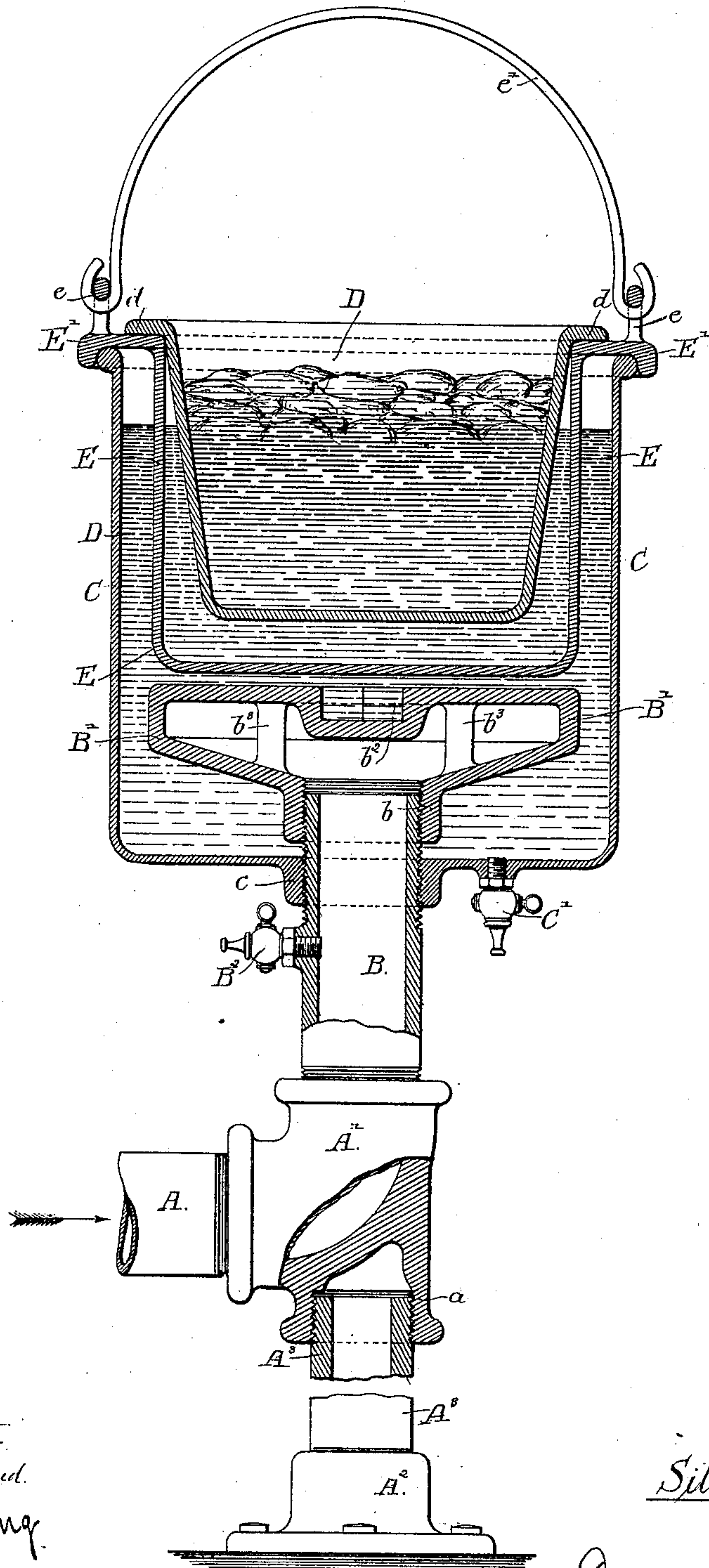


(No Model.)

S. H. MOSHER.
GLUE HEATER.

No. 410,765.

Patented Sept. 10, 1889.



Witnesses:-
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UNITED STATES PATENT OFFICE.

SILAS H. MOSHER, OF CHICAGO, ILLINOIS, ASSIGNOR TO THE MOSHER TUBULAR METALLIC PACKING AND MANUFACTURING COMPANY, OF SAME PLACE.

GLUE-HEATER.

SPECIFICATION forming part of Letters Patent No. 410,765, dated September 10, 1889.

Application filed March 15, 1889. Serial No. 303,411. (No model.)

To all whom it may concern:

Be it known that I, SILAS H. MOSHER, of Chicago, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Glue-Heaters; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawing, and to the letters of reference marked thereon, which form a part of this specification.

My invention relates to a novel construction of glue-heaters, wherein the heat applied to the pot of glue is obtained from an adjacent boiler or steam-generator.

My invention is designed as an improvement upon the devices heretofore in use, in which a water-jacket surrounds the glue-pot and a steam-heating chamber is inserted within said water-jacket to obtain the desired result. It has been customary, in this form of heater, to construct the steam-heating chamber in part or wholly integral with the water-jacket. This construction is necessarily expensive and objectionable, for the reason that should the steam-heating chamber become worthless by rusting out or by freezing and bursting it becomes necessary to supply an entirely new apparatus.

The invention consists in the details of construction and combinations of parts herein after fully described and claimed.

The accompanying drawing contains a side view of my invention with certain parts in vertical section.

A indicates a pipe leading from a source of steam-supply and entering the horizontal end of a pipe-elbow A'.

A² indicates a foot, preferably secured to the floor, work-bench, or other suitable horizontal support adjacent to the place at which it is desired to employ the glue-heater. A supporting pipe or bar A³ fits into said post and enters a screw-threaded tubular extension *a* on the lower end of said elbow at its upper end, and thus supports the glue-heater.

B indicates a short pipe leading from the upper end of the coupling A' and externally screw-threaded on its upper end.

C indicates a cylindrical casing or open-topped receptacle forming an outside water-jacket. An opening formed in the bottom of

said casing is provided with a rim *c*, internally screw-threaded and adapted to fit the upper end of the pipe B. C' represents a stop-cock inserted in the bottom of said casing to permit the water to be drawn therefrom, when desired. B' indicates a hollow steam cap or head attached to the upper end of said pipe B within the casing C. The said steam-cap B' consists of an internally-screw-threaded rim *b*, upwardly inclined, and vertical sides and a flat top. *b*² is a square depression or one of other than circular form, formed in the top of said cap and adapted to receive a square or other suitable tool, by which the head may be unscrewed and removed.

*b*³ indicates integral posts or studs located inside the head and adapted to strengthen the same.

B² indicates a stop-cock inserted in the pipe B to permit the escape of air and water therefrom at the time of turning on the steam.

I have found that in use it is often necessary to remove the glue-pot from the heater to have it in readiness near the place where the work is performed. This is objectionable, as the glue will in a short time cool off and harden. To obviate this difficulty, I have devised the following means, which consist of a glue-pot D, provided near its upper end with an annular flange *d*. E indicates a cylindrical casing or open-topped receptacle capable of insertion into the casing C and forming an inside water-jacket. E' is an outwardly-turned flange formed on the upper edge of the casing E and adapted to rest upon the top of the casing C. The glue-pot D is placed within the casing E. *e* indicates ears formed upon the flange E', and *e'* a bail attached at each end to said ears, by which the inside water-jacket and glue-pot may be removed, as desired. It will be seen that a second water-jacket is afforded, which will retain its heat for some time after being removed from the heater, and thus preserve the desired consistency of the glue.

The parts of my invention being constructed as described, the operation is as follows: A sufficient quantity of water having been poured into the casing C, and the glue-pot being suitably filled, the casing E is placed in position, in which water is also poured, and

the glue-pot placed therein. The stop-cock B^2 is then opened and steam admitted from the source of supply through the pipes A and B to the cap B' , which gives out the desired heat. Any products of condensation will readily pass off through the pipes A and B. Should it be desirable to gain access to the inner part of the cap or pipes, it is an easy matter to unscrew the cap by inserting a suitable tool in the depression b^2 and turning the same. When the device is not in use, the water in the casing can be easily removed by means of the stop-cock C' .

I claim as my invention—

1. A glue-heater comprising a steam-supply pipe, a water-jacket, and a steam-cap removably secured upon said pipe within the water-jacket, substantially as set forth.

2. A glue-heater comprising a water-jacket, a steam-supply pipe extending into the same, and a steam-cap removably secured upon said pipe, substantially as set forth.

3. A glue-heater comprising a water-jacket, a steam-supply pipe extending into the same, and a steam-cap connected by a screw-joint with the pipe and provided in its top with a depression of other than circular form, substantially as set forth.

4. A glue-heater comprising a water-jacket, a steam-supply pipe extending into the same, and a steam-cap secured upon said pipe, said

steam-cap provided internally with integral posts or studs, substantially as set forth.

5. A glue-heater comprising an outside water-jacket, an inside water-jacket, a glue-pot, and a heater, substantially as set forth.

6. A glue-heater comprising an outside water-jacket, a steam-pipe extending into said outside water-jacket, a glue-pot having a flange near its upper edge, and an inside water-jacket resting upon the upper edge of the outside water-jacket and supporting the glue-pot by engagement with the flange thereof, substantially as set forth.

7. A glue-heater comprising a water-jacket, a steam-cap, and a steam-supply pipe secured to said steam-cap, combined with a pipe-elbow, a pipe leading from the source of steam-supply, and the said steam-supply entering said elbow, said pipe-elbow having a tubular extension, a supporting-pipe or bar, the upper end of which enters said tubular extension, and the lower end of which rests on an adjacent supporting-surface, substantially as set forth.

In testimony that I claim the foregoing as my invention I affix my signature in presence of two witnesses.

SILAS H. MOSHER.

Witnesses:

C. CLARENCE POOLE,
TAYLOR E. BROWN.