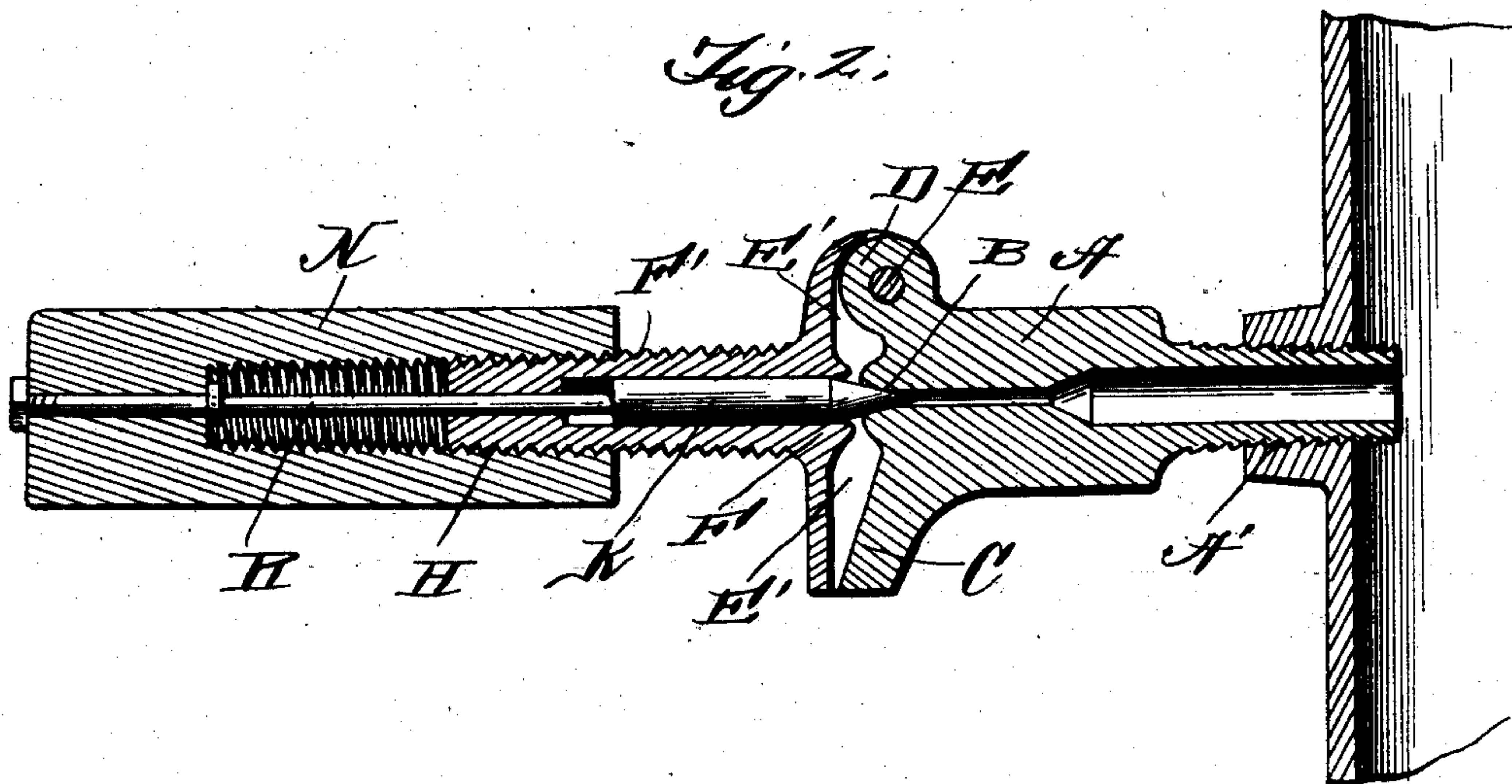
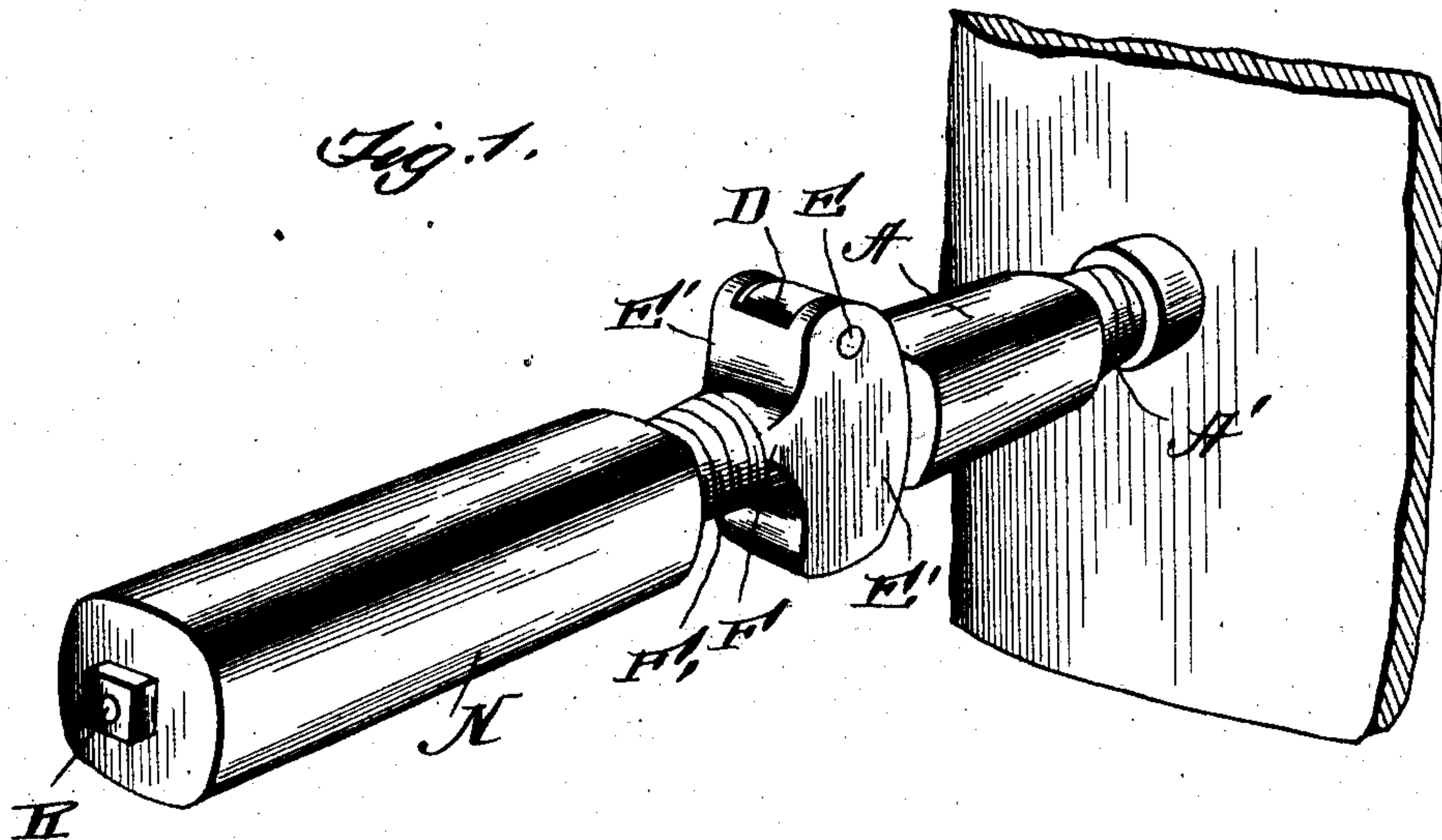


No. 883,606.

PATENTED MAR. 31, 1908.

E. F. ALEXANDER.  
WATER GAGE FOR STEAM BOILERS.  
APPLICATION FILED DEC. 19, 1907.



Witnesses

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# UNITED STATES PATENT OFFICE.

EDWARD F. ALEXANDER, OF SALEM, WEST VIRGINIA.

## WATER-GAGE FOR STEAM-BOILERS.

No. 883,606.

Specification of Letters Patent.

Patented March 31, 1908.

Application filed December 19, 1907. Serial No. 407,201.

*To all whom it may concern:*

Be it known that I, EDWARD F. ALEXANDER, a citizen of the United States, residing at Salem, in the county of Harrison and State of West Virginia, have invented certain new and useful Improvements in Water-Gages for Steam-Boilers; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, and to the letters and figures of reference marked thereon, which form a part of this specification.

This invention relates to new and useful improvements in water gage for steam boilers and the object in view is to produce a simple and efficient device in which a suitable packing may be fed forward as it wears away, thereby avoiding the replacing of packing strips commonly used upon devices of this nature.

The invention comprises various details of construction and combinations and arrangements of parts which will be hereinafter fully described and then specifically defined in the appended claims.

My invention is illustrated in the accompanying drawings, in which:—

Figure 1 is a perspective view of my improved water gage for steam boilers, and Fig. 2 is a longitudinal sectional view through the same.

Reference now being had to the details of the drawings by letter, A designates the shell which has a threaded portion A' adapted to engage the threaded opening in the boiler, said shell being chambered and provided with an exit opening B. The portion of said shell about said exit opening is provided with wings C and D, the latter of which is apertured to receive a pivot pin E mounted upon one of the wings E' of the shell F, which latter has a series of threads F' about its shank portion and adapted to engage the threads H formed on the inner circumference of the chambered portion of the handle N. Said shank portion F' of the shell F is provided with a longitudinal aperture extending therethrough and in which a packing K, of lead or any other suitable material, is provided, said packing having its forward end tapering and adapted, when the shell F is closed, to form a valve entering the tapering end of the exit opening B. Said

packing, which is made in pencil form, has a longitudinal movement in the aperture in which it is positioned, and R designates a pin which projects from the bottom of the chamber in said handle and is adapted to pass through the opening in the shank F' and to bear against the end of said pencil of packing. As the handle is turned upon the threaded portion of the shell F, it will be observed that the packing strip will be fed forward to compensate for wear.

By the construction shown and described, it will be observed that, when it is desired to feed the packing forward a slight distance, a partial rotary movement is given to the handle which will cause the pin projecting from the end wall of the chamber of the handle to bear against the packing strip so that the outer end of the packing strip will engage the tapering wall in the end of the exit opening and shell A, thereby making a steam and water tight valve or closure.

What I claim to be new is:—

1. A water gage for steam boilers comprising, in combination with a shell which is adapted to engage a boiler and communicate with the interior thereof, a pivotal valve shell mounted upon said boiler engaging shell, a movable packing strip mounted within the shank portion of said pivotal valve shell, a handle mounted upon the latter and adapted to move said packing strip longitudinally, as set forth.

2. A water gage for steam boilers comprising, in combination with a shell which is adapted to engage a boiler and communicate with the interior thereof, a pivotal valve shell mounted upon said boiler engaging shell, a movable packing strip mounted within the shank portion of said pivotal valve shell, a handle mounted upon the latter, a finger movable with the handle and adapted to engage and move said packing strip longitudinally as the handle is turned, as set forth.

3. A water gage for steam boilers comprising, in combination with a shell which is adapted to engage a boiler and communicate with the interior thereof, a pivotal valve shell mounted upon said boiler engaging shell, a movable packing strip mounted within the shank portion of said pivotal valve shell, a handle having a chambered portion to receive the shank portion of said pivotal valve shell, a finger fixed to the handle and adapted to contact with the strip of packing in

said valve shell and move the latter longitudinally as the handle is rotated, as set forth.

4. A water gage for steam boilers comprising, in combination with a shell which is  
5 adapted to engage a boiler and communicate with the interior thereof, a pivotal valve shell mounted upon said boiler engaging  
shell, a movable packing strip mounted within the shank portion of said pivotal valve  
10 shell, a handle having a chambered portion to receive the shank portion of said pivotal valve shell, the end wall of said chamber having threads thereon adapted to engage

threads upon the shank of the valve shell, a finger projecting from the end wall of the  
15 chamber of the handle and adapted to pass through an aperture in the shank portion of the valve and bear frictionally against said packing strip as the handle is rotated, as set forth.

In testimony whereof I hereunto affix my signature in the presence of two witnesses.

EDWARD F. ALEXANDER.

Witnesses:

E. B. FITTRO,  
H. L. NUTTER.