

(No Model.)

N. W. PRATT.
STEAM GENERATOR.

No. 338,676.

Patented Mar. 23, 1886.

FIG. 2

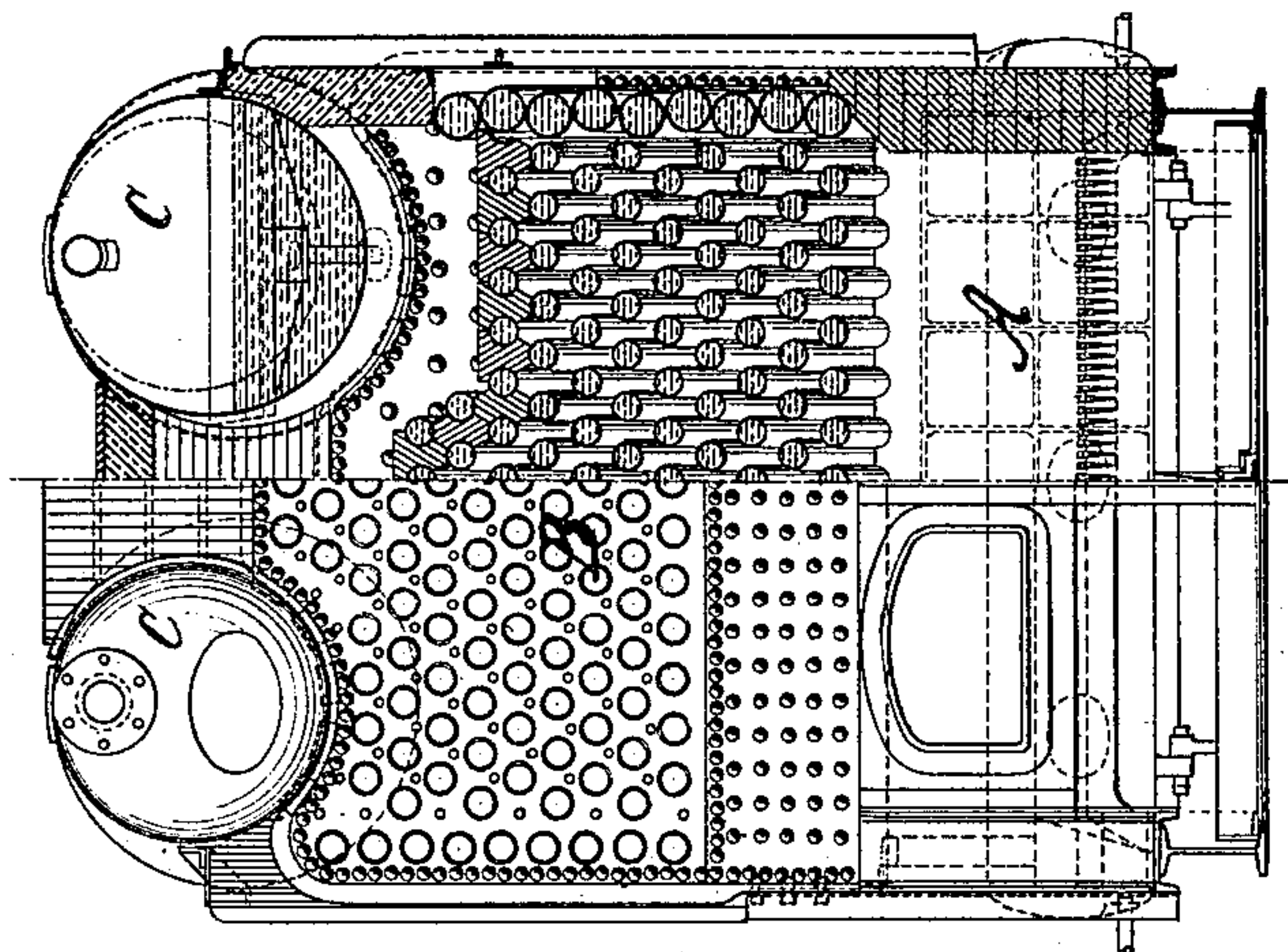
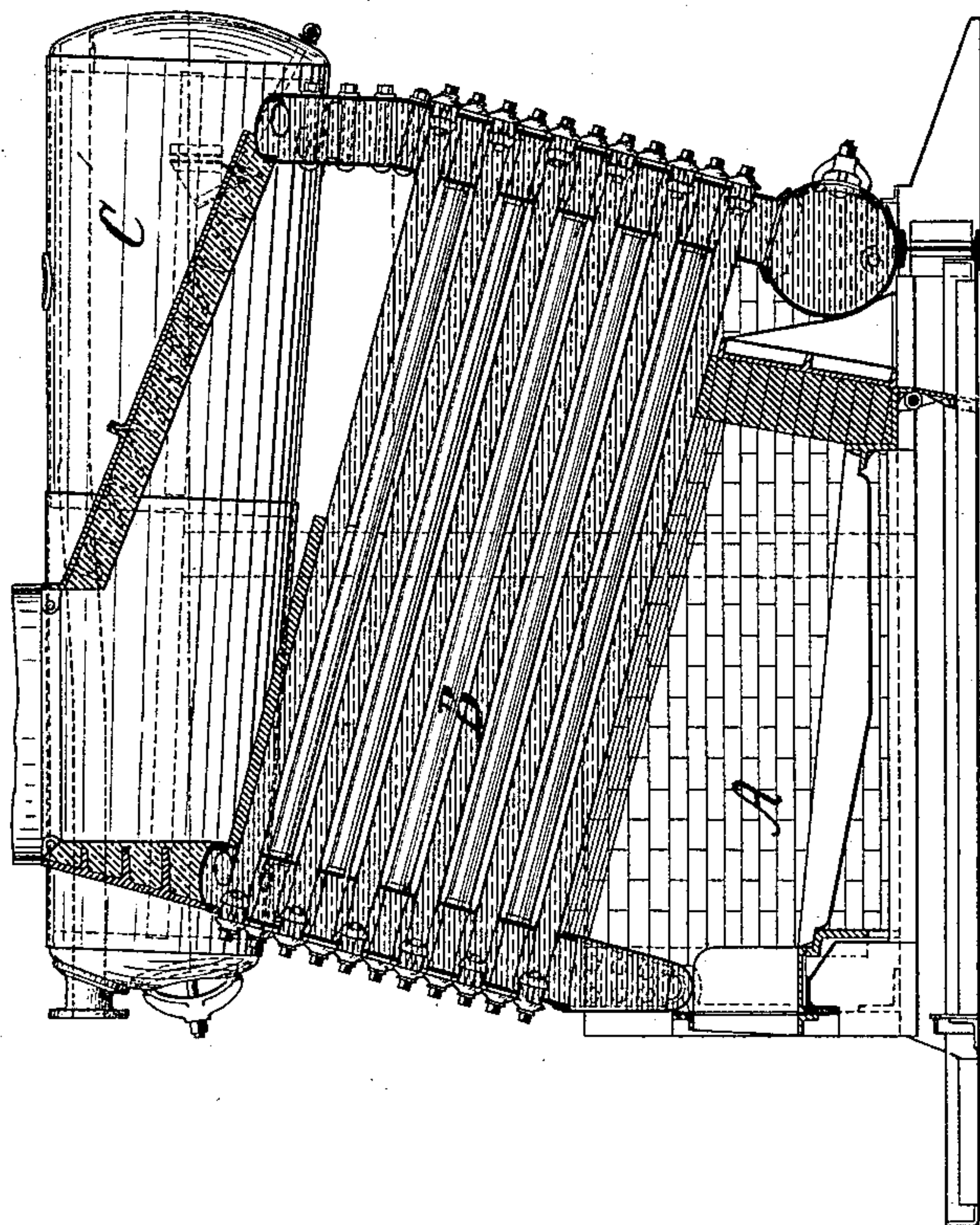


FIG. 1



WITNESSES:

Aug. Creviering
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INVENTOR

Nat. W. Pratt
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Att'y

UNITED STATES PATENT OFFICE.

NATHANIEL W. PRATT, OF BROOKLYN, NEW YORK.

STEAM-GENERATOR.

SPECIFICATION forming part of Letters Patent No. 338,676, dated March 23, 1886.

Application filed July 16, 1885. Serial No. 171,731. (No model.)

To all whom it may concern:

Be it known that I, NATHANIEL W. PRATT, a citizen of the United States, residing at Brooklyn, in the county of Kings and State of New York, have invented a new and useful Improvement in Steam-Generators, of which the following is a specification, reference being had to the accompanying drawings forming a part of the same, in which—

Figure 1 is a side view, and Fig. 2 an end view, both partly in section, of a steam-generator embodying my invention.

The invention relates to that type of generator in which one or more steam and water drums are arranged above and communicating with a series of inclined heating-tubes; and the invention consists in constructing said steam and water drum of increasing diameter from the front toward the rear end, whereby greater drum capacity and heating-surface are obtained with a given number of heating-tubes, and a surrounding space provided for the passage of gases, increasing in size toward the front of the generator and to the smoke-stack.

In the drawings the furnace of the generator is represented at A, the inclined heating-tubes at B, and the elevated steam and water drums at C, these parts constituting the main divisions of the generator, and to which, for the purposes of this application, it is only deemed necessary to refer.

In the use of cylindrical or straight steam and water drums in connection with inclined heating-tubes, as heretofore practiced, the in-

clination of said heating-tubes gives greater vertical space to the drums at the rear end, which is utilized by the present invention by giving greater inclination to the bottom of the drum and increasing its diameter, as shown. Such construction adds to the capacity of the drum, and also presents a greater heating-surface to the escaping gases, at the same time bringing such surface nearer to the furnace. It will also be observed that increasing space is obtained toward the smoke-box for the passage of the gases, either when a pair or a single drum is used. In the former instance the tapering form of the drums will allow for such space between them at the front end, and in the latter instance between the drum and the side of the furnace that is carried up to form the smoke-box. The advantages attending this new construction are so obvious that no further description of the same, or of other details of the generator shown, is needed. Therefore,

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

1. A steam-generator provided with one or more conical water and steam drums.

2. A steam-generator provided with inclined heating-tubes and a steam and water drum constructed of gradually-increasing diameter, substantially as and for the purpose set forth.

NAT. W. PRATT.

Witnesses:

C. W. FORBES,
A. CREVELING.