

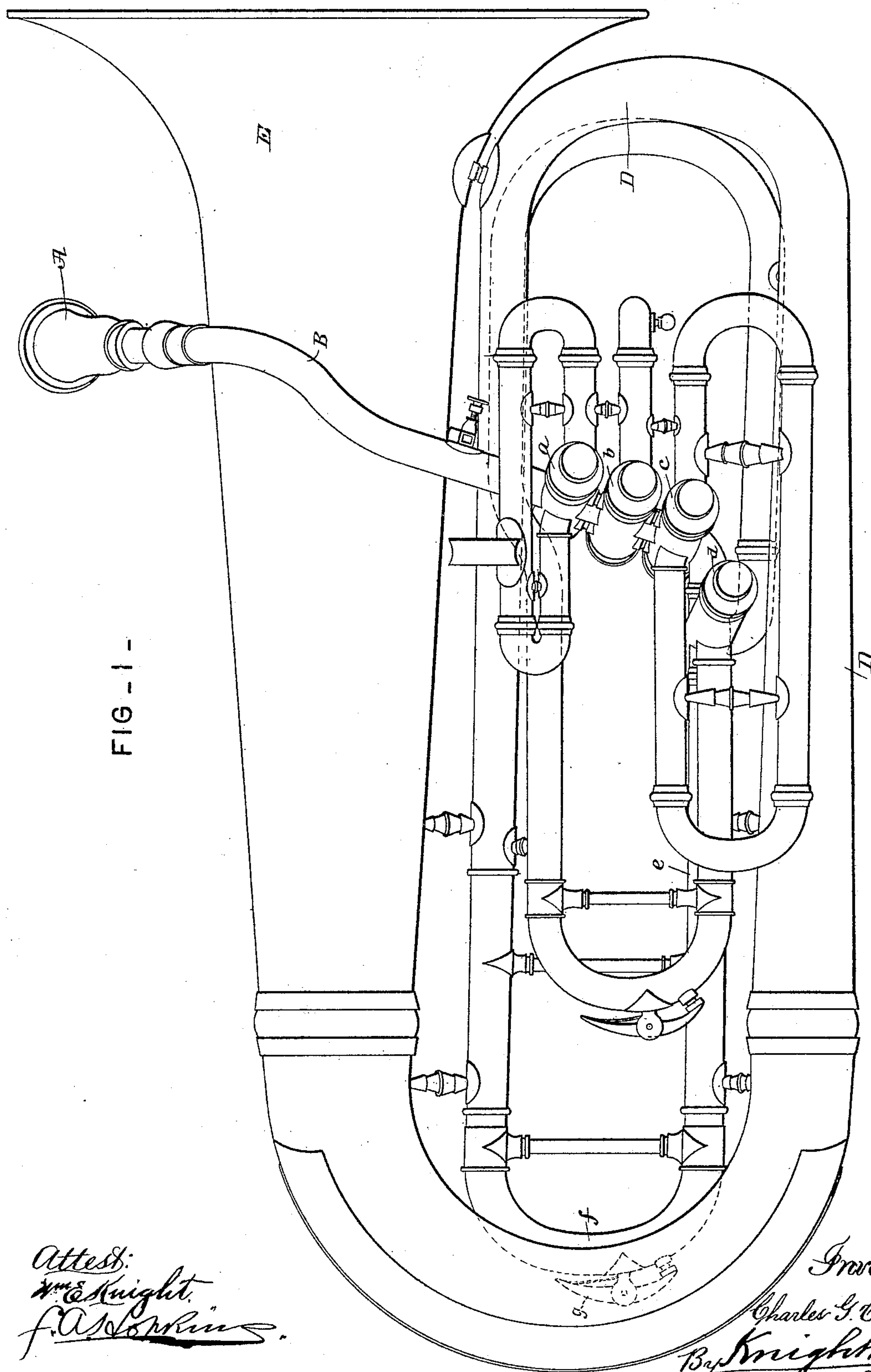
(No Model.)

2 Sheets—Sheet 1.

C. G. CONN.
MUSICAL WIND INSTRUMENT.

No. 405,395.

Patented June 18, 1889.



Attest:
W. E. Knight.
f. A. Perkins.

Inventor.
Charles G. Conn.
By *Knight Bros.*
attys.

(No Model.)

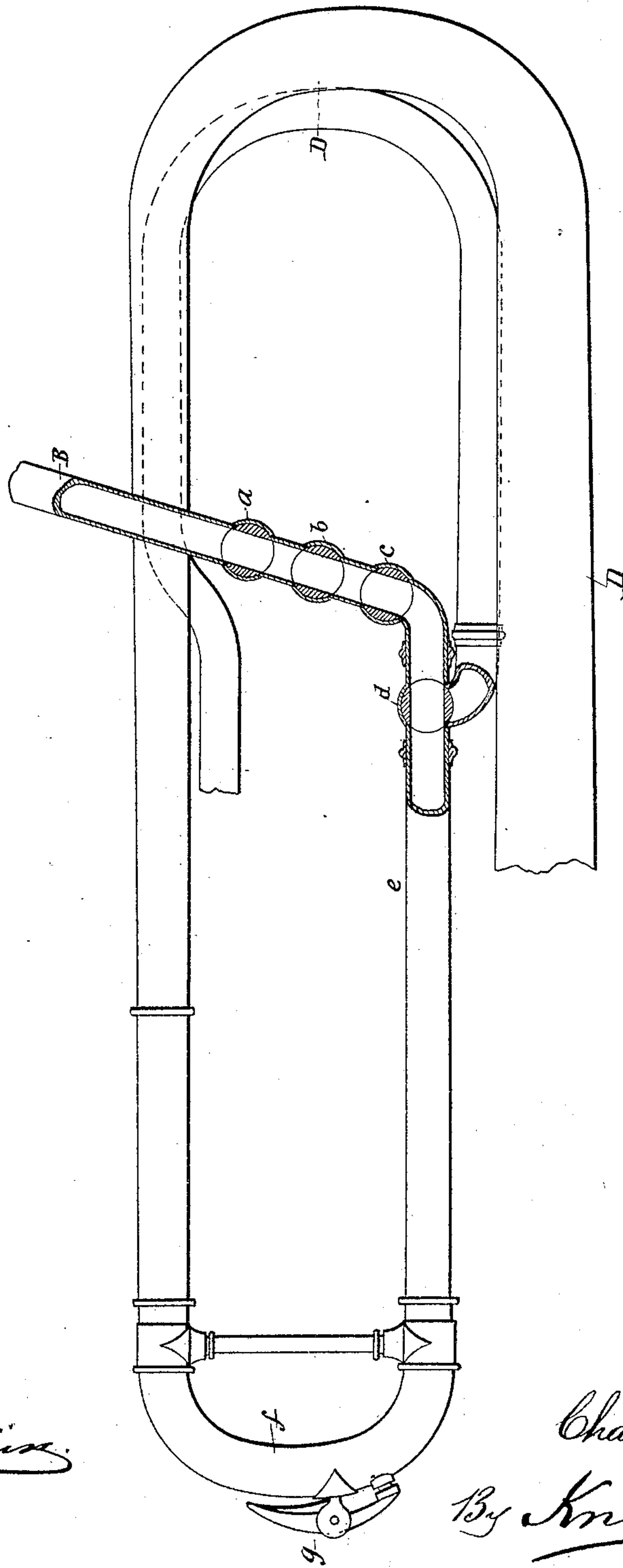
2 Sheets—Sheet 2.

C. G. CONN.
MUSICAL WIND INSTRUMENT.

No. 405,395.

Patented June 18, 1889.

FIG. II.



Attest:
Wm. E. Knight.
f. A. Hopkinson.

Inventor:
Charles G. Conn
By *Knight Bros.*
attys.

UNITED STATES PATENT OFFICE.

CHARLES G. CONN, OF ELKHART, INDIANA.

MUSICAL WIND-INSTRUMENT.

SPECIFICATION forming part of Letters Patent No. 405,395, dated June 18, 1889.

Application filed November 30, 1888. Serial No. 292,218. (No model.)

To all whom it may concern:

Be it known that I, CHARLES G. CONN, a citizen of the United States, residing at Elkhart, in the county of Elkhart and State of Indiana, have invented certain new and useful Improvements in Musical Wind-Instruments; and I do hereby declare that the following, taken in connection with the drawings which accompany and form a part of this specification, is a description of my invention sufficient to enable those skilled in the art to practice it.

Heretofore in piston-valve instruments the valves have been arranged parallel with the length of the piece and usually vertical with the body of the instrument. To obviate the many difficulties of piston-valves placed in this position I have invented a new style.

My invention, which is mainly applicable to large instruments intended to be carried in front and across the body of the musician, relates to two improvements—first, a new and more convenient disposition and arrangement of the piston-valves and keys, which inclines the bell of the instrument to the left, leaving the view unobstructed for reading music or marching, and, second, the forming of a direct and nearly vertical passage from the mouth-piece to the water-key in the tuning-slide, to facilitate the easy passage and removal of water. The first of these objects is accomplished by arranging the piston-valves in planes nearly perpendicular to the other tubes and diagonally across the piece, and the second by having the ports of all the valve-pistons opening upward, reference being had to the instrument in the position it assumes while being played.

In order that the invention may be fully understood, I will proceed to describe the same with reference to the accompanying drawings, in which—

Figure I represents a front view of an instrument, with my improvements attached, in the position it assumes while being played. Fig. II represents a detached portion of the

piece, broken away in part, showing the direct passage from the mouth-piece to the water-key.

Like letters of reference in both the figures indicate the same parts.

a, *b*, *c*, and *d* are valve-cases arranged in planes nearly perpendicular to the other tubes and diagonally across the piece.

e is a tube leading from valve-case *d* to tuning-slide *f*, in which is a water-key *g*.

A is the mouth-piece, and *B* the tube leading from *A* to the first valve-case *a*.

D is the tube extending from the tuning-slide *f* to the bell *E*. Referring to Fig. 2, it will be seen that the passage from the mouth-piece *A* to the tuning-slide *f* is very nearly vertical and very direct.

By the use of this new system I am enabled to make a shorter and lighter piston, because the tuning-slide is placed so low in the tubing of the instrument, instead of having it in the tubing before the valves are reached. Consequently the valves are smaller in diameter and the instrument more regularly conic, as it should be.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. A musical wind-instrument having valves placed diagonally across the piece, for the purpose set forth.

2. A musical wind-instrument having a direct air-passage from the mouth-piece through the diagonally-arranged valves to the water-key in the tuning-slide, as and for the purpose set forth.

3. The combination of a musical wind-instrument having valves placed diagonally across the piece with a direct air-passage through said valves from the mouth-piece to the water-key in the tuning-slide, substantially as set forth.

CHARLES G. CONN.

Witnesses:

E. C. BICKEL,
C. W. FISH.