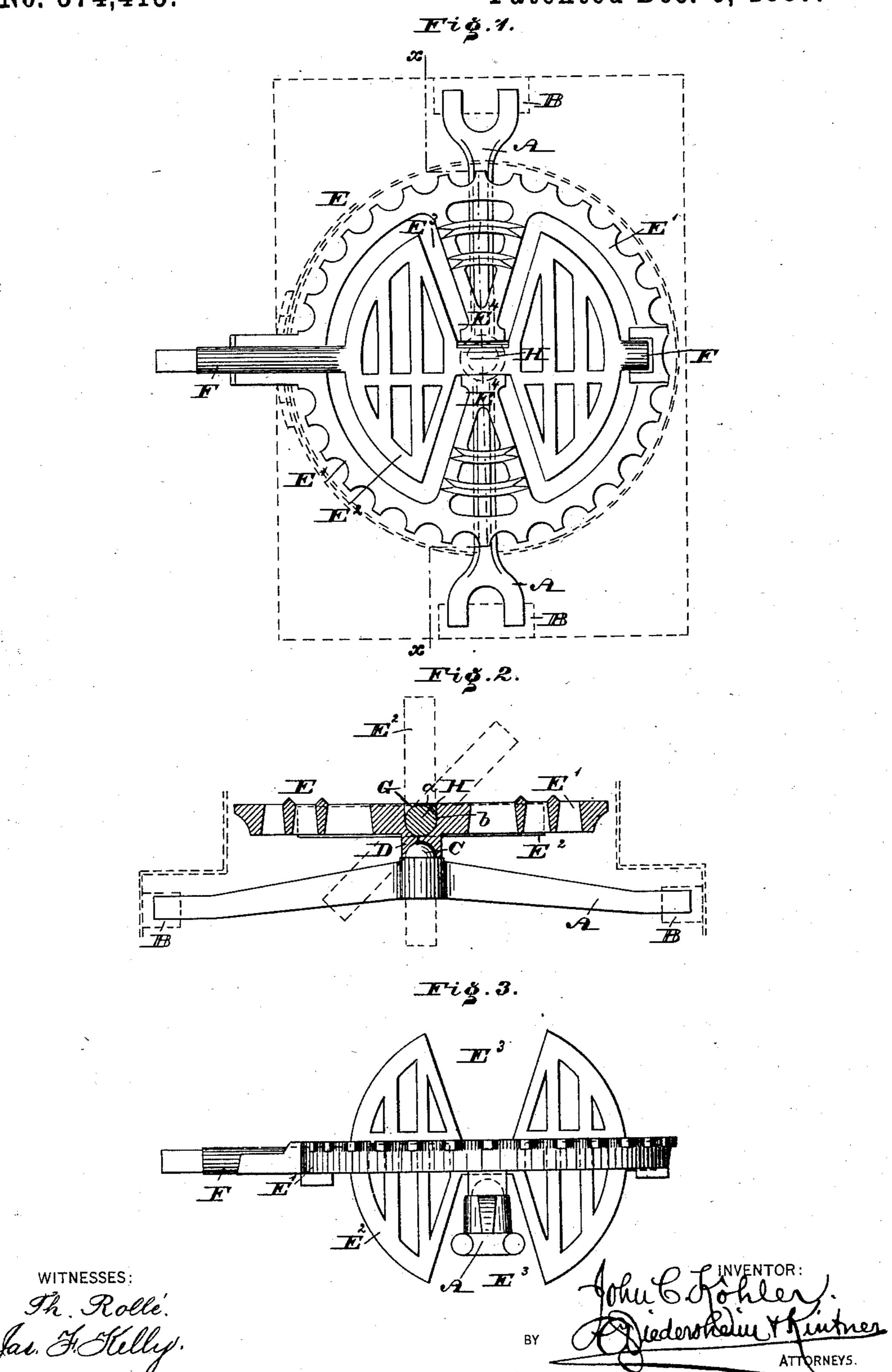
## J. C. KOHLER.

STOVE GRATE.

No. 374,413.

Patented Dec. 6, 1887.



## United States Patent Office.

JOHN C. KOHLER, OF PHILADELPHIA, ASSIGNOR TO WILLIAM L. McDOWELL, OF LOWER MERION, PENNSYLVANIA.

## STOVE-GRATE.

SPECIFICATION forming part of Letters Patent No. 374,413, dated December 6, 1887.

Application filed June 6, 1887. Serial No. 240,350. (No model.)

To all whom it may concern:

Be it known that I, John C. Kohler, a citizen of the United States, residing in the city and county of Philadelphia, State of Pennsylvania, have invented a new and useful Improvement in Stove-Grates, which improvement is fully set forth in the following specification and accompanying drawings.

My invention consists of a stove-grate pos-10 sessing novel features, whereby it may be both rotated or raked and dumped, as will be here-

inafter fully set forth.

Figure 1 represents a top or plan view of a stove-grate embodying my invention. Fig. 2 represents a vertical section thereof in line x x, Fig. 1. Fig. 3 represents a side elevation thereof.

Similar letters of reference indicate corresponding parts in the several figures.

Referring to the drawings, A represents a stringer or beam, which is supported on lugs B in the base or ash pit of a stove, said stringer having at the center an upright lug, C, which receives the socket D on the under side of the grate E, whereby the grate is supported or mounted on said stringer, and may be rotated in lateral or horizontal directions.

The grate is formed of two sections, E' E<sup>2</sup>, the section E<sup>2</sup> being within the section E' and 30 mounted by its journals F on said section E', and having its sides forked, as at E<sup>3</sup>, into which projects the diametrical portion E<sup>4</sup> of the section E', which portion fills the spaces formed by the bifurcations or forks E<sup>3</sup>. In the 35 center of the upper face of the portion E<sup>4</sup> is a recess, G, which receives the journal H at the center of the section E<sup>2</sup>, said journal in cross-section being ellipsoidal or rounded on its under side, so as to oscillate freely on the base 40 of the recess G, the upper portion of the journal having tapering sides a b, so as to be of

considerably less diameter than the adjacent portion of the recess G.

It will be seen that the sections of the grate form a continuous surface for the support of 45 the fuel, and they may be rotated laterally, as one, on the stringer A, for purposes of raking the fire, it being noticed that the journal F is

continued forwardly, forming means for attachment of a key or handle, whereby the grate 50 may be raked

may be raked.

When the grate is to be dumped, the section E<sup>2</sup> is rotated by operating the journal F, whereby said section turns on its journals or axis to an upright position, and the forks or 55 bifurcations E<sup>3</sup> straddle the stringer A, the flaring form of the spaces of the forks then permitting the grate to be raked to and fro in the dumped position of the section without being materially interfered with by the stringer, and 60 thus the grate may be effectively cleared of the fuel or ashes, or both.

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

Patent, is—

1. A grate consisting of the laterally-rotary section E' and the oscillating section E<sup>2</sup>, in combination with the stringer A, the section E<sup>2</sup> having bifurcations adapted to straddle the the said stringer, substantially as and for the 70 purpose set forth.

2. In a grate, the combination of the laterally-rotary section E', having the diametrical portions E<sup>4</sup>, with the oscillating section E<sup>2</sup>, having the bifurcations E<sup>3</sup>, and the stringer A, 75 with upright lug C, and having suitable bearings, substantially as and for the purpose set forth.

JOHN C. KOHLER.

Witnesses:

John A. Wiedersheim, A. P. Jennings.