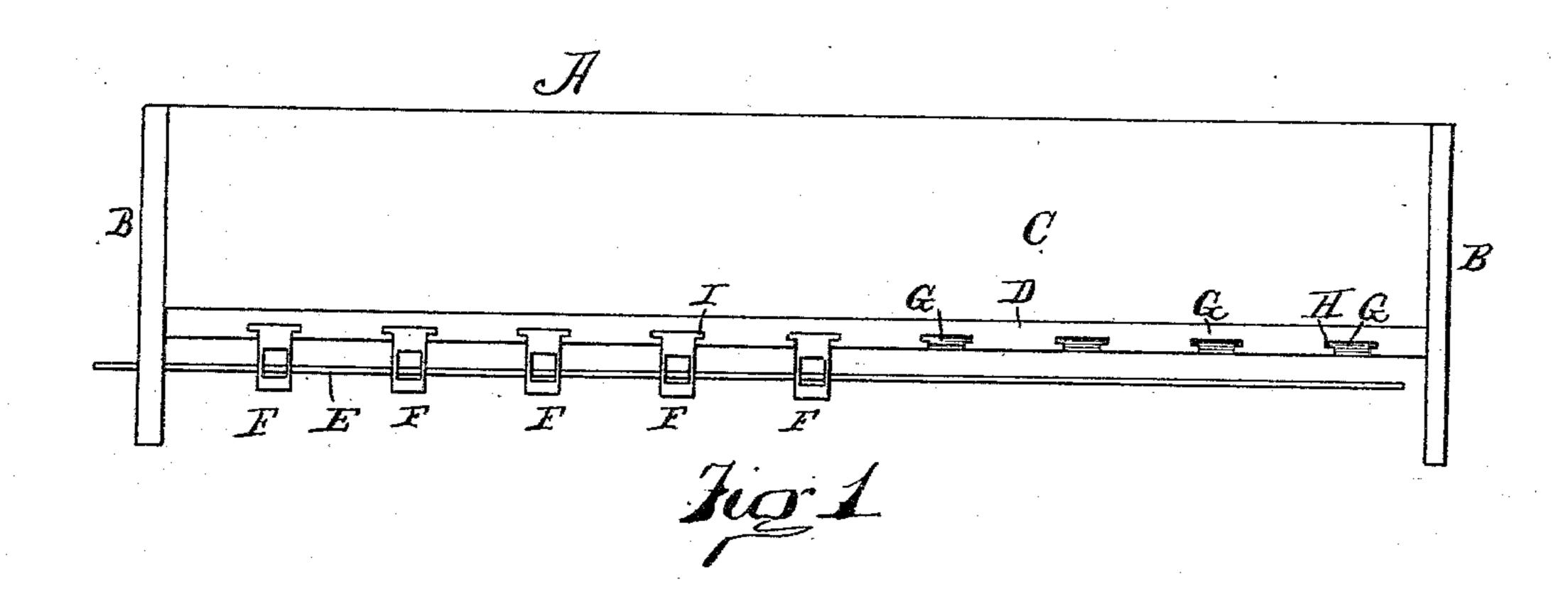
(No Model.)

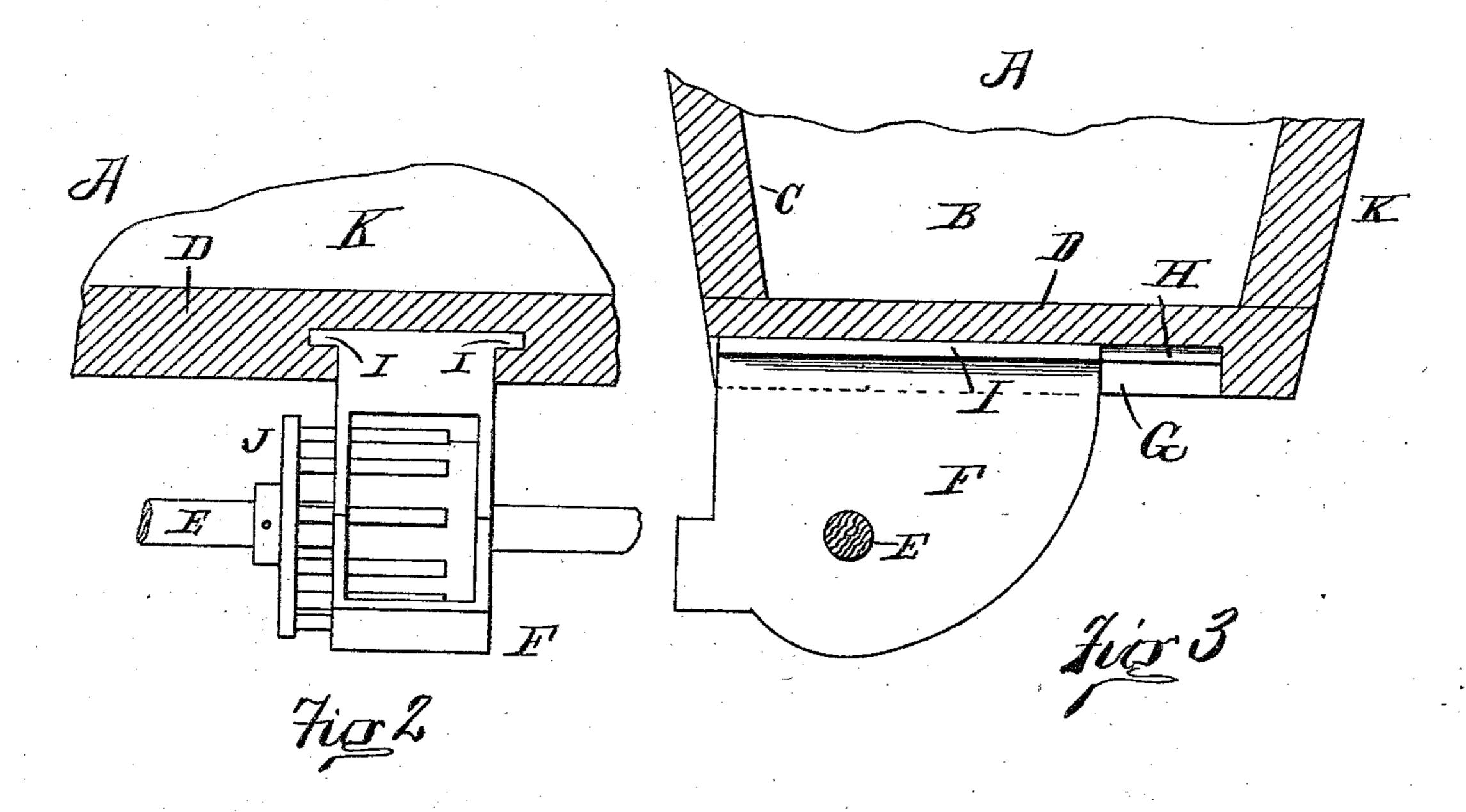
## J. L. RITER.

SEEDING MACHINE.

No. 274,518.

Patented Mar. 27, 1883.





WITNESSES:

Jan B. Stare

John S. Phita INVENTOR
by James W. SEE

ATTORNEY

## United States Patent Office.

JOHN L. RITER, OF BROWNSVILLE, INDIANA.

## SEEDING-MACHINE.

SPECIFICATION forming part of Letters Patent No. 274,518, dated March 27, 1883.

Application filed October 13, 1882. (No model.)

To all whom it may concern:

Be it known that I, John L. Riter, of Brownsville, Union county, Indiana, have invented certain new and useful Improvements in Seeding-Machines, of which the following is a specification.

In the accompanying drawings, Figure 1 represents the seed-box of a seeding-machine, shown in rear elevation; Fig. 2, a vertical longitudinal section of the same at the seat of one of the seed-cups, and Fig. 3 a vertical transverse section at same point.

This invention relates to the means for attaching the series of seed-cups to the bottom of the seed-box, as hereinafter set forth.

A is the seed-box; B B, the end pieces of the seed-box; C and K, the sides of the seed-box; D, the bottom of the seed-box; E, the longitudinal shaft for operating the seed-wheels; F, the seed-cups to receive the seed-wheels; G, transverse grooves in the bottom of the seed-box, one at each seed-cup; H, a widened portion of the grooves at their tops, giving them a T form; I, flanges projecting from the sides of the seed-cups; J, the seed-wheels.

The seed-cups slide into the grooves, and are retained by the flanges in an obvious manner.

The cups may be adjusted transversely to the seed-box into true alignment with the shaft. 30 No skill is required to set the cups into alignment. No screws are required, and the grooves being susceptible of being machinemade, the device is much cheaper than the usual screwed attachment.

The grooves may be in dovetail form, and

seeding machines have been devised in which the seed-cups are partly supported by the projection of a rear flange in a grooved 40 piece beneath the seed-box, and also by means of flanges seating in dovetail sockets secured separately beneath the seed-box. I do not

claim any such devices as of my invention.

I claim as my invention—

In a seeding-machine, the combination of a seed-wheel shaft, a series of seed-cups having side flanges, and a seed-box having a perforated wooden bottom provided with transverse grooves cut in its lower face to engage said 50 side flanges and support the seed-cups, substantially as set forth.

JOHN L. RITER.

Witnesses:

JAMES W. SEE, ISRAEL WILLIAMS.