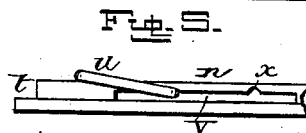
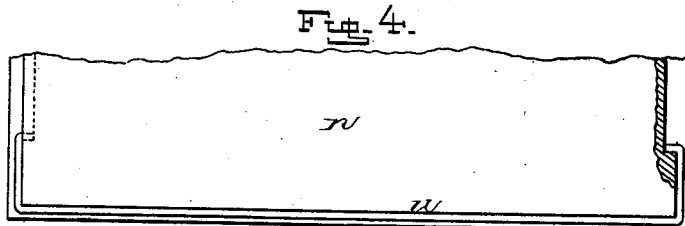
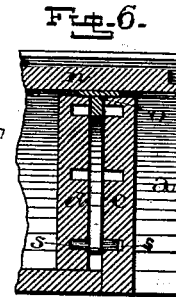
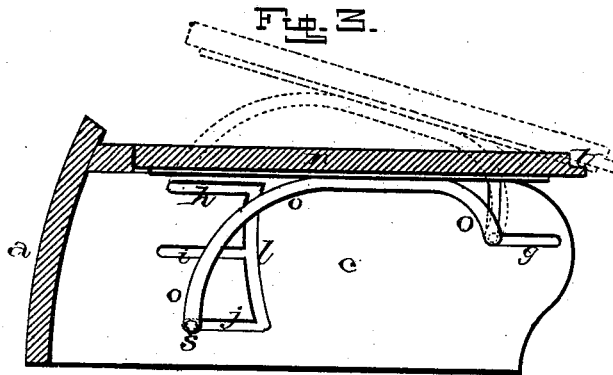
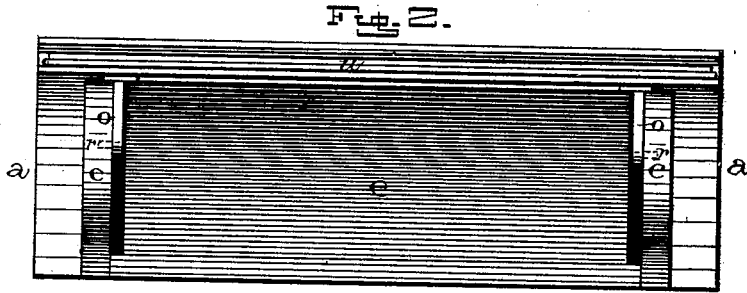
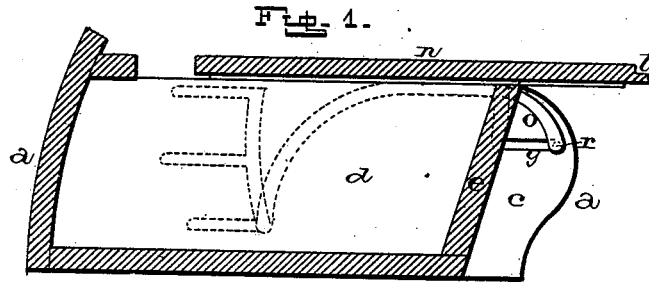


F. A. WILBER.
School-Desk.

No. 206,378.

Patented July 23, 1878.



Witnesses.

J. W. Garner,
W. S. D. Haines.

Inventor.
F. A. Wilber
per
J. A. Lehmann,
att'y.

UNITED STATES PATENT OFFICE.

FRANCIS A. WILBER, OF CENTRAL COLLEGE, OHIO.

IMPROVEMENT IN SCHOOL-DESKS.

Specification forming part of Letters Patent No. **206,378**, dated July 23, 1878; application filed May 23, 1878.

To all whom it may concern:

Be it known that I, FRANCIS A. WILBER, of Central College, in the county of Franklin and State of Ohio, have invented certain new and useful Improvements in School-Desks; 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 pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to an improvement in school-desks; and it consists in making the ends of the desk double, and in the inner sides of these ends are made a series of slots, in which the transverse pins of the brackets secured to the under side of the top of the desk move back and forth, so as to allow the top to be adjusted to any desired angle and be opened and closed.

It further consists in a book-stop, which has its two ends to catch in the notched slots in the ends of the top, so that it can be adjusted upward any desired distance from the edge of the top, all of which will be more fully described hereinafter.

The accompanying drawings represent my invention.

Figure 1 is a vertical cross-section of my invention. Fig. 2 is an elevation of the front side. Fig. 3 is also a vertical cross-section to show the grooves. Figs. 4, 5, 6 are details.

a represents a school-desk, which, instead of having a single thickness of material at each end, has two. These end pieces *c d* are separated from each other a suitable distance, and the outer pieces, *c*, extend outward a considerable distance beyond the inner ones, *d*, which extend only to the board *e*, which closes the front edge of the desk.

In the inner sides of the outer pieces, *c*, are made the grooves or guides *g*, the horizontal portions of which do not reach the front edge of the pieces *c*, while the vertical portions cut through the upper edge, so that there are no stops formed in them. In the inner sides of the two ends *c d* are made the three horizontal grooves or guides *h i j*, the central groove being longer and the bottom groove shorter than the top groove,

and which are united at their forward ends by the curved grooves *l*.

The top *n* is not hinged or otherwise connected to the desk except through the curved castings or brackets *o*, one of which is secured to each end immediately over the top of the opening or space between the ends *c d*. The forward ends of these brackets are provided with horizontal pins or projections *r*, which move back and forth in the grooves *g*, while the rear ends have horizontal pins or projections *s* projecting from each side, to move in the horizontal grooves *h i j* and curved grooves *l*.

When the pins *s* are in the grooves *j* and the pins *r* in the horizontal part of the grooves *g* the desk-top is perfectly straight, and cannot be raised upward at either edge until it has been drawn forward as far as the pins *r s* can move in their respective grooves. After the top has thus been drawn forward the rear edge can be raised upward in the curved grooves *l* until the pins *s* are ready to enter either the grooves *h* or *i*. If the desk-top is moved backward so that the pins *s* enter the grooves *i*, the top will be inclined forward at a gentle inclination, and if a still greater angle is desired, the top is again drawn forward, and then raised upward until the pins *s* enter the top grooves *h*.

When the pins *s* are in either groove *h* or *i* the front edge of the top can be raised upward, so as to give free access to the interior of the desk; but this cannot be done when the pins *r* and *s* are in the grooves *j* and *g*.

In each end of the desk-top is made a straight groove, *v*, in the upper edge of which are a number of notches, *x*. Along the lower edge of the top, and at the two adjoining corners, is made a rabbet, *t*, in which the stop *u* rests when not in use. This stop is used to prevent books and other articles from sliding off of the top when it is at an inclination; and it consists of a long wire or rod having each end bent at a double right angle, so as to reach down over the edge of the top and catch in the grooves *v*, as shown. When the ends of the stop are in the ends of the grooves nearest to the rabbeted edge of the top the stop sinks down behind the edge of the top, so as

to be entirely out of the way; but when the stop is raised upward and moved forward so as to catch in one of the notches *x*, the stop will rest upon the top of the desk at any desired distance from the edge.

Having thus described my invention, I claim—

1. In a school-desk, the combination of the desk *a*, top *n*, and supporting-brackets for connecting them together, that are adjustable at their rear ends and movable back and forth and up and down at their front ends, substantially as shown.

2. A desk, *a*, having the double ends *c d*, having suitable grooves in their inner sides, the spaces between the ends being adapted to receive the supporting-brackets for the top, substantially as described.

3. In a school-desk, the top *n*, a supporting-bracket, *o*, and suitable grooves or guides *g h i j* in the desk, the rear ends of the brackets being made to project further downward than

the front ones, and the top being adapted not only to be adjusted at different angles, but to be moved bodily toward the scholar, substantially as set forth.

4. The combination of the desk *a*, having the grooves *h i j*, top *n*, and brackets *o*, having pins or projections *r s*, substantially as specified.

5. The combination of the top *n* and an adjustable stop, *u*, the top having the rabbet *t* to receive the stop when not in use, substantially as specified.

6. The combination of the top having grooves in its ends and a stop that can be adjusted back and forth, substantially as set forth.

In testimony that I claim the foregoing I have hereunto set my hand this 17th day of May, 1878.

FRANCIS A. WILBER.

Witnesses:

S. G. BARBER,
A. L. MCLEOD.