(No Model.)

DE WITT C. BOUTON.

SLEIGH.

No. 462,684. Patented Nov. 10, 1891.

Fig. 1.

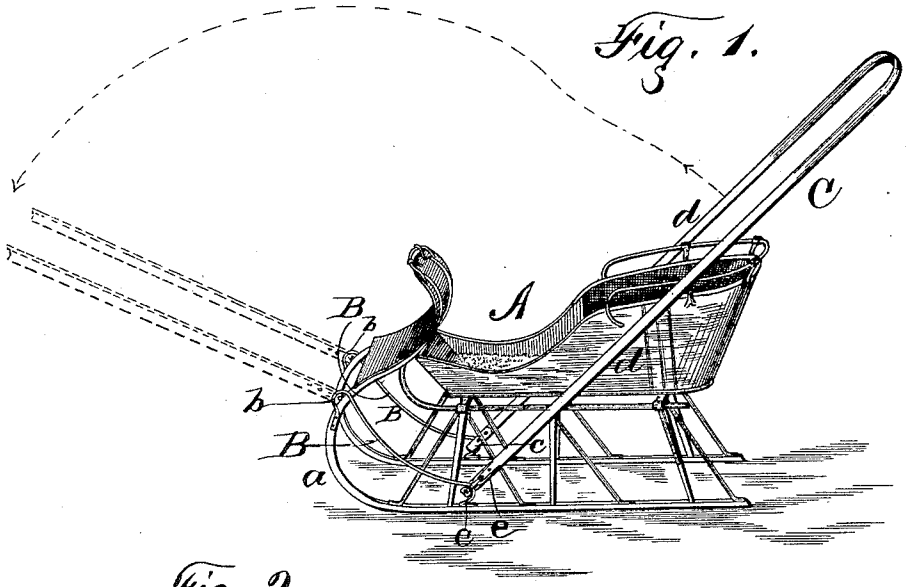


Fig. 2.

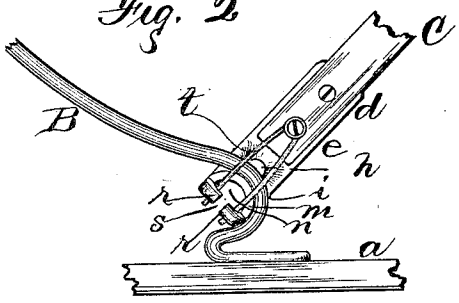
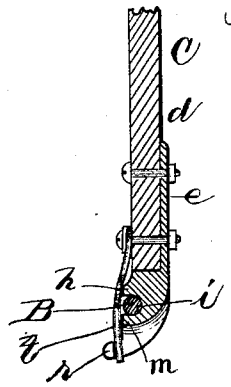


Fig. 3.



Witnesses
H. A. Carhart
A. B. Kinne

De Witt C. Bouton Inventor

By his Attorneys
Smith & Denison

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

DE WITT C. BOUTON, OF ITHACA, NEW YORK.

SLEIGH.

SPECIFICATION forming part of Letters Patent No. 462,684, dated November 10, 1891.

Application filed March 2, 1891. Serial No. 383,376. (No model.)

To all whom it may concern:

Be it known that I, DE WITT CLINTON BOUTON, of Ithaca, in the county of Tompkins, in the State of New York, have invented new and useful Improvements in Devices for Propelling Sleighs, of which the following, taken in connection with the accompanying drawings, is a full, clear, and exact description.

My invention relates to sleds or sleighs, and especially to the means for their propulsion or draft.

My object is to produce an immovable handle adapted to be used for the propulsion of a sleigh from the rear or for its draft from the front, such handle being detachably connected to the sleigh, and the sleigh being provided on each side with a trackway, upon which the handle ends are mounted and upon which the handle traverses when shifted from the rear for push-propulsion to the front for direct propulsion, said trackways having also adjacent to each end a seat for the end of the handle, which retains the handle while force is being applied thereto.

My invention consists in the several novel features of construction and operation hereinafter described, and which are specifically set forth in the claims hereunto annexed. It is constructed as follows, reference being had to the accompanying drawings, in which—

Figure 1 is a side perspective elevation of a sleigh to which my invention is applied, showing the handle in full lines in position for propulsion from the rear and by the dotted lines for draft from the front. Fig. 2 is an enlarged elevation of part of the lower end of the handle, part of the trackway, showing the handle connection in the rear seat in the track, and part of one runner. Fig. 3 is a longitudinal transverse section of the lower end of the handle, the track, and the connection connecting the handle to the track.

A is a sleigh of any construction desired, carried upon runners *a*.

B is a trackway on each side of the sleigh, consisting of a wire or rod secured in front of the upper part of the runner, then bent upward, outward, and rearward to form the seat *b*, then bent around forward to form the seat *c*, and then bent to adapt the rear end to be secured to the sleigh-runner. (Shown in the drawings at a point abaft the front knee.) This track is also bent outward to clear said knee and the brace in front thereof.

C is the handle of any desired construction, but having its arms *d* spread apart a little wider than the sleigh-body and side rails. Upon the lower end of each of these arms I secure the connection *e*, consisting of a body secured to the handle, a spur *h*, projecting outward from said body, a transverse and curved groove *i* below this spur, a curved rib *m* below this groove, a concavity *n* between the arms of the ends of this rib, and inwardly-projecting lips *r* upon the extremities of these arms, leaving a slotway *s* between these lips. When this connection is placed upon the trackway, said groove *i* forms a seat for the track and the rib *m* forms a saddle, which fits into the seat *c*. On account of the shortness in width of the spur *h*, when the connection is thrown forward out of the seat it will slide freely over the track into the front seat *b* in the track. The curved dotted line in Fig. 1 shows the travel of the handle while it is being shifted from the rear to the front. To retain this connection I secure a wire or wires *t* upon the handle, leaving the free end or ends to project downward until they slip under one or both of the lips *r*, slipping freely through the slotway *s*.

To detach the handles I spring the wire out from under the lip or lips through the slotway and swing it around out of the way, and then the handle is readily detached from the track.

Although I describe my invention as applying to a sleigh, I do not limit myself thereto, as it is very evident that the same may be used upon all kinds of vehicles, whether mounted upon runners or wheels.

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

1. The combination, with a sleigh, of trackways having their ends secured to the runners and a reversible handle having its arms connected to the trackways and adapted to traverse them while being reversed.

2. The combination, with a sleigh, of trackways, each bent to form seats adjacent to the ends and having the ends secured to the sleigh-runner, of a reversible handle having upon the end of each arm a connection containing a curved saddle and recess for the

trackway and means for detachably connecting the handle ends to the trackways.

3. The combination, with the handle and its arms, of a connection secured to each arm and having on its outer face a spur, a curved and concaved groove below the spur, a curved rib below the groove, inwardly-projecting lips upon the extremities of said lip, a spring-wire having one end secured to the handle and its free end adapted to pass through the slot between said lips and fit under said lip or lips and retain said connection upon the trackway secured to the sleigh-runner.

In witness whereof I have hereunto set my hand this 26th day of February, 1891.

DE WITT C. BOUTON.

In presence of—
H. P. DENISON,
C. W. SMITH.