(No Model.)

B. B. FLOYD.

SLIDING HILL AND TOBOGGAN THEREFOR.

No. 367,286. Patented July 26, 1887

FIG. 1.

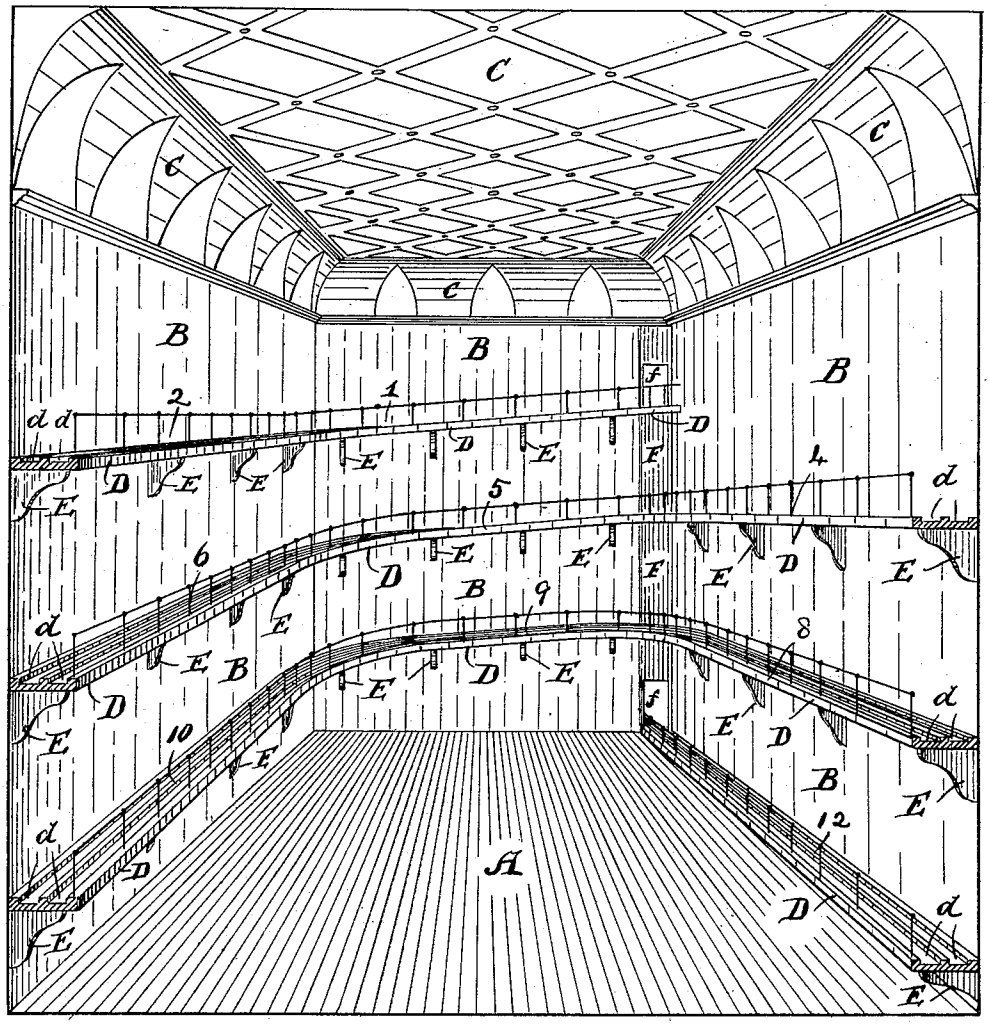


FIG. 2.

FIG. 3.

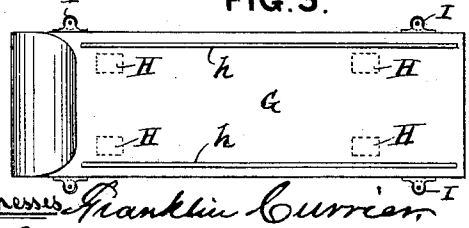


FIG. 4

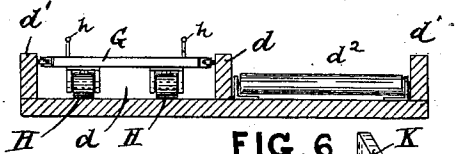


FIG. 6.

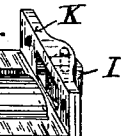
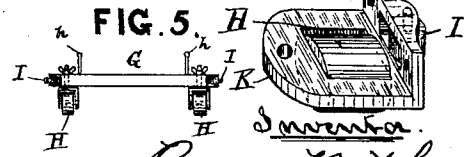


FIG. 5.



Witnesses: Franklin Curran.
Edward P. Ba[illegible],

Inventor.
Byron B. Floyd

UNITED STATES PATENT OFFICE.

BYRON B. FLOYD, OF HAVERHILL, MASSACHUSETTS, ASSIGNOR OF ONE-HALF TO STEPHEN E. JACKMAN, OF SAME PLACE.

SLIDING-HILL AND TOBOGGAN THEREFOR.

SPECIFICATION forming part of Letters Patent No. 367,286, dated July 26, 1887.

Application filed January 20, 1887. Serial No. 224,952. (No model.)

To all whom it may concern:

Be it known that I, BYRON B. FLOYD, a citizen of the United States, residing at Haverhill, in the county of Essex and State of Massachusetts, have invented certain new and useful Improvements in Sliding-Hills and in Toboggans to be used therewith, of which the following is a specification.

The object of my invention is to produce a sliding-hill particularly adapted for halls, rinks, and such like places, and in toboggans to be used therewith.

The invention consists in constructing the hill in a spiral form and terminating at a point immediately below the starting-point, so that a very long slide may be obtained in a comparatively small space, the hill being provided with tracks or ways; and the invention further consists in constructing toboggans to adapt them to run in or on the said tracks or ways.

Referring to the accompanying drawings, Figure 1 represents a section of a hall fitted with a sliding-hill embodying my invention. Fig. 2 is a side view of a toboggan designed for use with the sliding-hill. Fig. 3 is a plan or top view of the same. Fig. 4 shows an end view of the toboggan and cross section of the tracks or ways. Fig. 5 is an end view of a toboggan with the wheels or rollers detachable. Fig. 6 is a view showing the friction and running rollers mounted in the same frame.

A represents the floor; B, the walls; and C, the ceiling of a hall or other building, one end of the same being removed.

D D represent the sliding-hill, only one end of which is shown. The other end connects the several successive stages or spirals.

In the drawings I have shown the sliding-hill supported by brackets E E; but it may be supported by pillars or by rods secured to the ceiling or, should it be desired to erect one out of doors it may be supported upon any suitable form of frame, the means or method of supporting the hill varying according to taste and circumstances.

F is an elevator-well provided with doors or openings *f f*. The object of this well is that when a person has run from the top of the hill to the bottom both he and his toboggan can be raised for another descent.

I prefer to make the hill with two or more ways or tracks, *d d*, so that more than one toboggan can run at the same time without fear of collision.

The toboggan G (shown in Figs. 2 and 3) is provided on its under side with wheels or rollers H H. In this case I have shown four rollers; but if they are made wider, then only two need be employed, one at each end. Or, instead of having the rollers on the toboggan, they may be secured to the bottom of the tracks or ways, so as to stand above them, as shown at *d'* in Fig. 4, or let in so that their periphery will stand just above the bottom of the tracks or ways. In this case the bottom of the toboggans will be flat without rollers.

On the sides of the toboggan I secure friction-rollers I I, two on each side. The object of these rollers is to keep the toboggan in position in the tracks or ways, (see Fig. 4,) and should the toboggan incline more to one side than the other the friction-rollers will come into contact with the sides *d'* of the ways *d* and prevent the toboggan being retarded by friction.

I prefer to mount both the running wheels or rollers H and the friction-rollers I in one and the same frame, K, made of an L form, as shown in Fig. 6, and secured to the toboggan by a bolt passing up through the bottom and two screws passing through the sides.

On the top of the toboggan is the usual guard or hand rail *h*.

In Fig. 5 the wheels or rollers H H are shown mounted in a saddle with a screw-bolt attached thereto, the bolt passing up through the bottom of the toboggan and secured by a thumb-nut, so that they may be readily removed, if required.

Instead of, or in addition to, an elevator a flight of steps may be provided for the riders to ascend to the top of the hill, and the toboggans may be raised by means of an endless chain or rope driven by power, or they may be raised in any suitable and desired manner.

When a rider starts, he first passes down that portion of the track marked 1, along the side marked 2, across the third section of the track (not shown in the drawings) onto the side 4, thence across the end 5, and along the

side 6, onto the seventh section of the track, (not shown,) onto the side 8, and then across the end 9, and along the side 10, and across the eleventh section of the track (not shown) onto the side 12, thence to the elevator or end of the track.

It will be seen from the above that a very long slide can be obtained in a comparatively small hall. Thus if the hall is, say, one hundred feet long by fifty feet wide, and has a hill with the number of spirals shown and described, the length of the hill would be about nine hundred feet. Of course, the length of the hill will depend upon the length, width, and number of spirals employed, as I do not limit myself to any number, as they will have to be governed by height and the required pitch or inclination given to the hill.

If desired, the hill may be formed in sections, so that it can be taken apart and moved from place to place.

What I claim as my invention is—

1. A sliding-hill constructed in spiral form and terminating at a point immediately below the starting-point, substantially as shown and described.

2. A sliding-hill constructed in spiral form and provided with two or more tracks or ways, substantially as shown and described.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

BYRON B. FLOYD.

Witnesses:

JAMES M. DAVIS,

GEO. W. WENTWORTH.