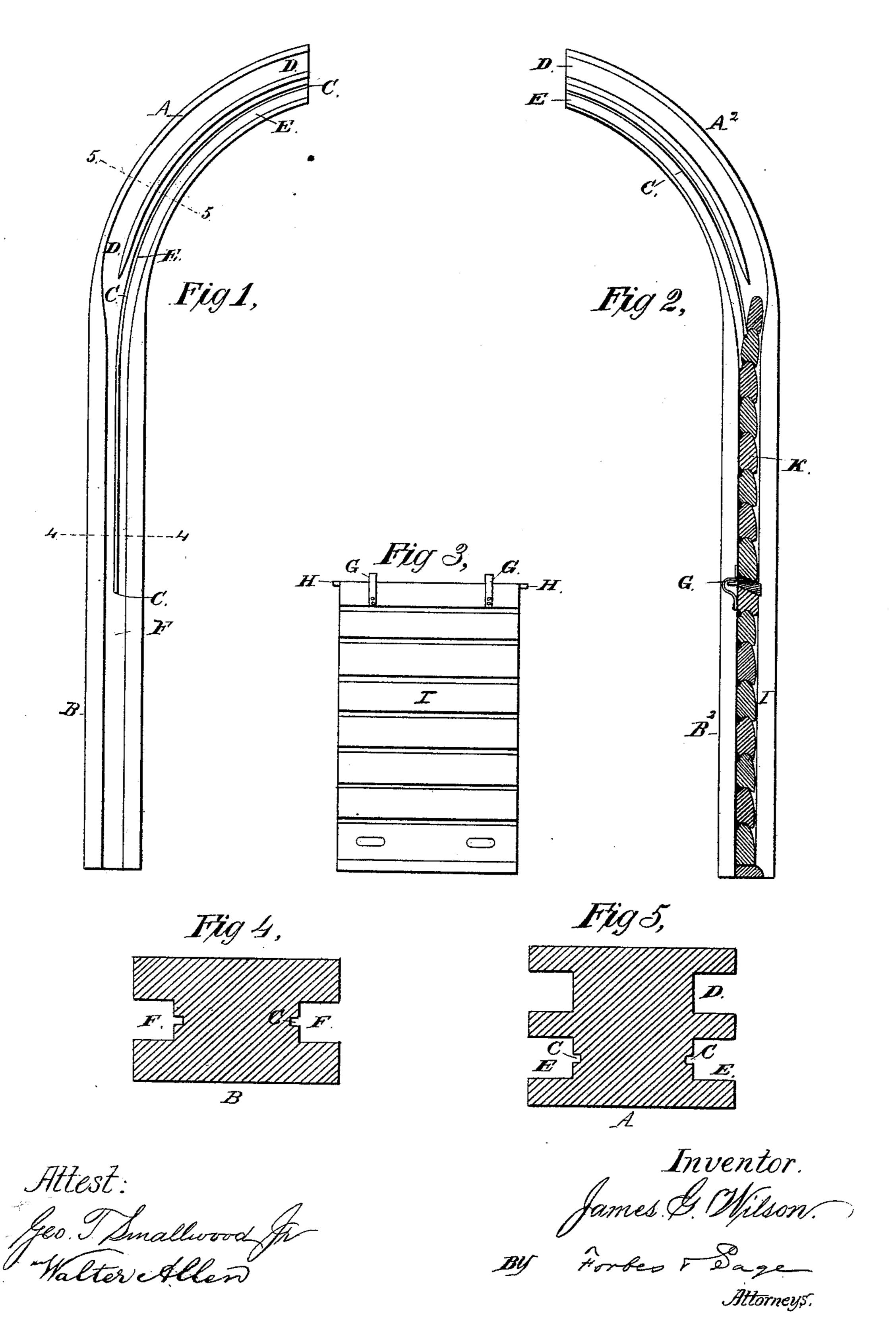
J. G. WILSON. Shutter.

No. 229,786.

Patented July 6, 1880.



United States Patent Office.

JAMES G. WILSON, OF NEW YORK, N. Y., ASSIGNOR TO FRANCIS FORBES, OF SAME PLACE.

SHUTTER.

SPECIFICATION forming part of Letters Patent No. 229,786, dated July 6, 1880.

Application filed February 4, 1880.

To all whom it may concern:

Be it known that I, James Godfrey Wilson, of the city, county, and State of New York, have invented a new and useful Improvement in Railroad-Cars, of which the fol-

lowing is a specification.

My invention relates to the application to each or any of the doorways or windows in the sides of a railroad passenger-car of a double 10 flexible blind or pair of blinds, which operate in a single groove in the uprights of the door or window and in double grooves or pairs of grooves in the carlings of the roof.

The object of the improvement is to operate a pair of flexible blinds in a single groove in each upright instead of a double groove, as ordinarily used, and thereby to adapt the uprights to be reduced in thickness, affording more space in the interior of the car, and lessening the cost of construction. I obtain this object by the means illustrated in the accom-

panying drawings, of which-

Figure 1 is an elevation of an upright and carling grooved to receive a pair of flexible blinds according to this invention. Fig. 2 represents an elevation of the matching upright and carling and a vertical transverse section of the blinds, showing the latter as pulled down to close the opening. Fig. 3 is an elevation of the lower blind, showing its guide-pins. Figs. 4 and 5 represent sections at 4 4 and 5 5, Fig. 1, on a larger scale, showing the shape of the uprights and carlings in cross-section and their relative proportions.

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

For the reception of a pair of flexible blinds, KI, adapted to close, respectively, the upper and lower portions of a doorway or window-opening, I provide the uprights BB² at the sides of such opening with a single longitudinal groove, F, in each, and the coincident carlings AA² with a pair of similar grooves, ED, in each, the latter being arranged one above

the other, and each conformed to the curve of 45 the carling, while both communicate at their lower ends with the single groove F in the coincident upright.

The blind K when raised occupies the grooves D, and its upper end may remain therein, as 50

shown in Fig. 2.

The lower blind, I, is received by the grooves Ein the carlings, being caused to enter the same by guide-pins H, projecting from the top rail of said blind I, as shown in Fig. 3, and occupying small guide-channels C. These channels are formed within the grooves F and E, as shown in Figs. 1, 2, 4, and 5, and, in connection with said pins H, operate positively and satisfactorily. The same effect can be accomplished, however, by inserting in the mortises of the lower blind a spring having a tendency to turn toward the inside of the car, so as to give said blind an inclination to turn in the direction of its own groove.

Catches G automatically couple the blinds together, so as to cause the upper blind to follow the lower when the latter is pulled down.

The blinds are preferably constructed in the manner covered by my reissued Patent No. 70 9,047; but such construction is not essential to the present invention.

I claim as new and desire to protect by Letters Patent—

1. The combination of uprights, each pro- 75 vided with a single groove, and carlings, each provided with a pair of grooves opening into the single groove of the uprights, whereby two flexible car-blinds may be used in a position vertical to each other and moved into a posi- 80 tion side by side.

2. The combination of the flexible car-blinds K I, grooves F, E, and D, guide-pins H, and channels C, substantially as herein specified.

JAS. G. WILSON.

Witnesses:

C. F. Connor, C. A. Sears.