

C. H. DEMPSEY.

CAR SQUEEZE.

APPLICATION FILED FEB. 1, 1909.

936,523.

Patented Oct. 12, 1909.

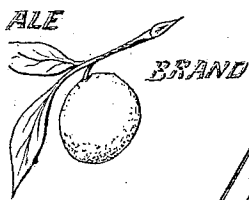


Fig. 1.

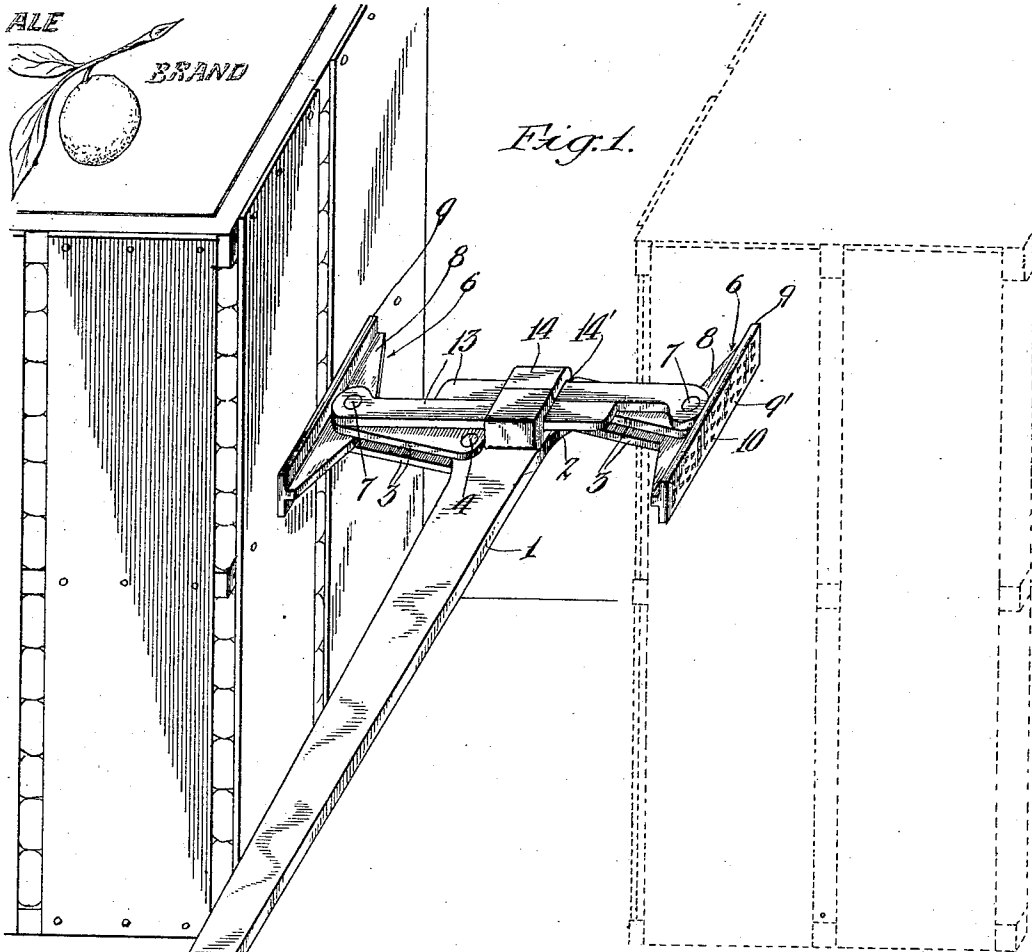


Fig. 2.

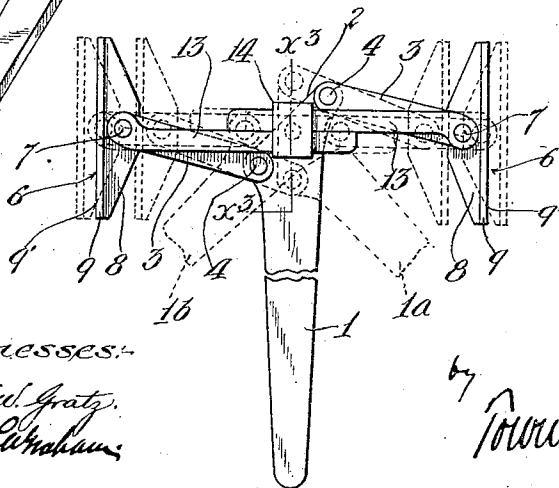
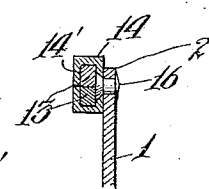


Fig. 3.



Witnesses:
Louis W. Gratz.
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UNITED STATES PATENT OFFICE.

CHARLES H. DEMPSEY, OF RIVERSIDE, CALIFORNIA.

CAR-SQUEEZE.

936,523.

Specification of Letters Patent.

Patented Oct. 12, 1909.

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To all whom it may concern:

Be it known that I, CHARLES H. DEMPSEY, a citizen of the United States, residing at Riverside, in the county of Riverside and State of California, have invented a new and useful Car-Squeeze, of which the following is a specification.

This invention is especially designed for the spacing apart of packages or boxes when placed in storage or packed into a car or other means of transportation, so that a final package or box may be put in between two of such boxes, thereby crowding the boxes or packages close together and preventing slipping or moving thereof during transportation.

My invention is especially adapted for use in packing boxes of oranges in refrigeration cars, as all such cars are built to accommodate a certain number of rows of boxes with a certain number of boxes to the row.

The boxes ordinarily used for packing oranges are twice as long as they are high and are square in cross section, and in packing refrigerator cars for transportation these boxes are set upon end in rows side by side as close together as possible, and in order to insert the last box it becomes necessary to push the boxes endwise of the row to make room for the insertion of the last box. This is necessitated by reason of the fact that orange boxes are usually packed under pressure so that the sides thereof which are thin and yielding bulge out under the pressure of the oranges and it is not possible in setting the boxes in the car by hand to bring them as close as desired.

By the use of my invention the boxes of a row of orange boxes packed into a refrigerator car can be moved with ease to space them apart to allow of the insertion of the last box.

While my invention is especially adapted for the purposes of a car squeeze I do not limit it to that use alone, as the same is adaptable for other purposes.

The object of my invention is to provide a car squeeze which will provide sufficient leverage to move a great weight and at the same time exert such leverage in opposite directions and in a straight line.

Another object of my invention is to provide a device of this nature which will be strong, light, portable, and operable by hand power.

Another object of my invention is to pro-

vide means for exerting a strong pressure upon the boxes or packages to be moved without causing any breaking or marring of the package.

Other objects and advantages will appear from the following description and drawings and which are particularly pointed out in the annexed claims.

The accompanying drawings illustrate the preferred form of my invention as used in spacing orange boxes apart when such boxes are packed in a refrigerator car. The said drawings are for illustrative purposes only and are not drawn to any particular scale.

Figure 1 is a perspective of the squeeze in position between two boxes showing the manner of operation thereof. Fig. 2 is a plan of the squeeze showing the initial and final positions respectively in full and dotted lines. Fig. 3 is a section on line x^2-x^3 in Fig. 2.

The device comprises a handle 1 of metal having a widened or enlarged head or portion 2 at one end. Two sets or pairs of links 3 are pivoted to this widened portion of the handle, the pivots 4 of said sets of links being on opposite sides of the center line of the handle member 1. The two links of each set are parallel and are pivoted at their outer ends to shoes or blocks 6 by pivotal connection 7, each block 6 being formed with a flange 8 embraced between the two links of the pair or set and having the pivot pin 7 passing therethrough and each block being further provided with a bearing plate or sole 9 formed with a flat bearing face 9', preferably provided with projections or struck up portions 10. The pairs or sets of links are connected to operate in unison by means of a bar 13 pivoted to the outer end of each set or pair of links by the pivot 7, above referred to, the inner end portions of these bars sliding side by side in an opening 14' formed in a guide block 14 pivoted at the handle member 1 midway between the pivots 4 aforesaid, the pivot 16 being also midway between the center lines of the bars 3.

The operation is as follows: When all but the last row of boxes have been placed in the car leaving a space which is not quite sufficient to receive another row of boxes the squeeze is inserted in the space left between the boxes, the handle member being in the position shown at 1^a in Fig. 2 giving minimum extension or distance between the

spreading plates 9. On then moving the handle toward the left, say to position shown in full lines, the plates 9 are spread apart, as indicated in the full line position, the pivotal connections 4 moving around the pivot 16 in an arc of a circle, say through 45°, this part of the movement being comparatively rapid. In the further movement of the handle, say to the position shown in dotted lines at 1^b, the pivotal connections 4 move through a further angle or arc, of say 45°, which brings them on a dead center or alinement with the centers 7, 16, this last part of the angular movement producing a slower and gradually decreasing outward movement with corresponding increase in the power of the outward pressure. In this operation the bars 13 slide through the opening 14' in the guide block 14 and in contact with one another, said bars sliding in opposite directions through said opening. The function of said bars is to maintain the centers 7 and the outer ends of the links substantially in alinement with the center or pivot 16. Said bars can in fact be regarded as constituting conjointly an extensible device whose ends are extended by the spreading of toggle devices consisting of the links 3 and the portions of handle head between the centers 4 and 16.

What I claim is:

1. A device for use as a car squeeze or other purpose consisting of a handle member, a guide member pivotally mounted on the handle member, a link pivoted to the handle member at each side of the pivot of the guide member, and a bar pivoted to the outer end portion of each of said links and sliding in the guide member.
2. A device for use as a car squeeze or other purpose consisting of a handle mem-

ber, a guide member pivotally mounted on the handle member, a link pivoted to the handle member at each side of the pivot of the guide member, a bar pivoted to the outer end portion of each of said links and sliding in the guide member, and shoes pivoted to the outer ends of said links.

3. A device for use as a car squeeze or other purpose consisting of a handle member, a guide member pivotally mounted on the handle member, a link pivoted to the handle member at each side of the pivot of the guide member, a bar pivoted to the outer end portion of each of said links and sliding in the guide member, and shoes pivotally connected to the outer end of said bars.

4. A car squeeze comprising a handle member, a guide block pivoted thereon, a pair of links pivoted to the handle member at each side of the guide block, a pressure plate having a flange extending between the links of a pair, a pivot extending through the said links and through said flange, and a bar connected to each of said pivots and sliding within said guide block.

5. A device for the purpose set forth comprising a handle member, a guide block pivoted thereto, pressure plates provided with pivots, means connected to said pivots and having a sliding connection with said guide block to maintain the aforesaid pivots in alinement, and toggle means operated by the handle member to spread said pressure plates apart.

In testimony whereof, I have hereunto set my hand at Riverside California this 25th day of January 1909.

CHARLES H. DEMPSEY.

In presence of—

EVELYN PUTNAM,
ANNA WILKINSON.