

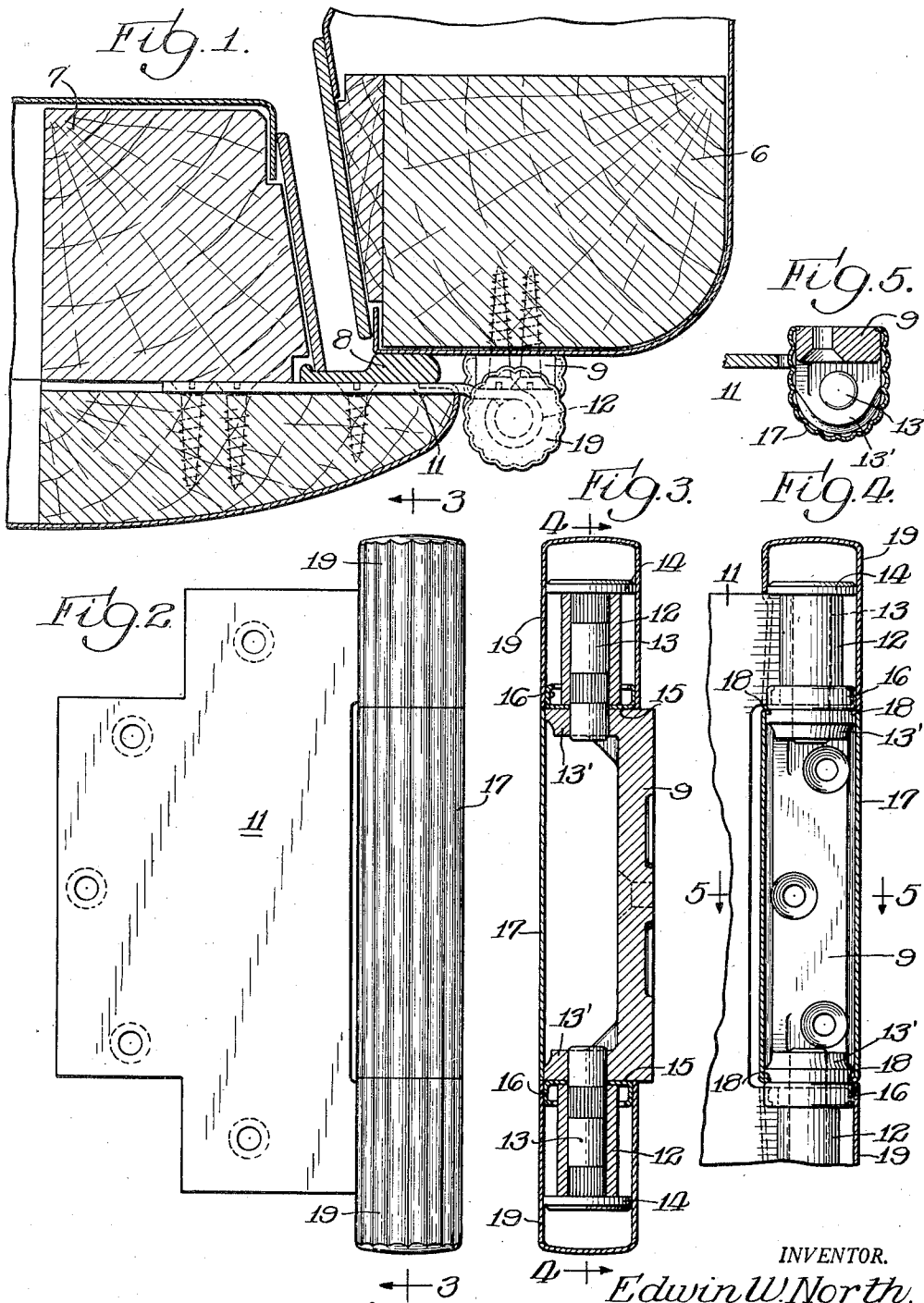
Nov. 12, 1935.

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2,020,696

HINGE

Filed Feb. 4, 1935



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UNITED STATES PATENT OFFICE

2,020,696

HINGE

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Application February 4, 1935, Serial No. 4,798

4 Claims. (Cl. 16—148)

This invention relates to hinges and, while capable of many uses, is particularly adapted for use as a refrigerator hinge to support the heavy door of a refrigerator cabinet. The invention of this application is an improvement upon my co-

pending application Serial No. 742,561, filed September 4, 1934. The purposes of the invention are to provide a hinge which is strong and durable, one which can be economically manufactured, and one which will present a pleasing appearance and give an impression of massiveness and strength.

In the drawing illustrating a practical and preferred embodiment of the invention,

Fig. 1 is a fragmentary sectional view of a refrigerator cabinet and door equipped with my invention;

Fig. 2 is a front elevation of a hinge embodying my invention;

Fig. 3 is a sectional view on the line 3—3 of Fig. 2;

Fig. 4 is a partial sectional view on the line 4—4 of Fig. 3; and

Fig. 5 is a sectional view on the line 5—5 of Fig. 4.

Referring to the drawing more in detail, reference character 6 indicates generally a door post of a refrigerator cabinet to which the door 7 is hinged. The structural details of the cabinet, such as the sealing strip 8 and other features, may be of any preferred construction.

The hinge proper comprises a base 9 and a leaf 11 having at the top and bottom projections which are curled to form the knuckles 12 between which the base 9 is disposed. Pintle pins 13, fluted or otherwise roughened so as to be firmly anchored in the knuckles by a drive fit, project inwardly through bearing openings formed in the forwardly projecting end portions 13' of the base, as clearly shown in Fig. 3. The outer end of each pintle is equipped with a large disc-like head 14 and between each knuckle and the end portion 13' of the base a bearing washer 15 is interposed which has an up-turned flange 16 of the same diameter as the head 14.

The base is enclosed and concealed by a cover 17 of sheet metal substantially U-shaped in cross section which snugly fits over the base and embraces the sides thereof so as to be frictionally held in place. To insure against longitudinal displacement of the cover its upper and lower ends are inwardly flanged as indicated at 18 to engage correspondingly shaped grooves in the end portions 13' of the base.

The knuckles are enclosed and concealed by caps or tips 19 of sheet metal or other preferred material of the same diameter as the cover 17 and presenting the appearance of being a continuation thereof. These caps are dimensioned

to snugly embrace the pintle heads 14 and the washer flanges 16 by which the caps are frictionally retained in place.

The structure as a whole presents the appearance of massiveness, strength and symmetry, although the apparently solid metal exposed portions are in reality cover members for the concealed operating parts which, while strong and durable, are much lighter than the appearance presented would indicate.

The structural details may obviously be varied within considerable limits without departing from the scope of the invention as defined in the following claims.

I claim:

1. A hinge comprising a base member having outwardly projecting end portions provided with bearing openings, a leaf provided with knuckles disposed in alignment with said bearing openings, a pintle anchored in each knuckle and having one end thereof extending into one of said base member bearing openings and being provided at its other end with an enlarged head, a washer interposed between each knuckle and the end portion of the base, the external diameter of said washer being substantially that of said pintle head, a cap enclosing each knuckle and frictionally engaging said washer and pintle head, and a cover enclosing said base member.

2. A hinge comprising a base member having end portions provided with bearing openings, a leaf provided with knuckles aligned with said openings, a pintle anchored in each leaf and extending into one of said bearing openings, a washer interposed between each knuckle and said base, a cap enclosing each knuckle, means carried by said pintle and washer for frictionally retaining said cap in position, and a removable cover enclosing said base.

3. A hinge comprising a base member, a leaf member provided with knuckles, pintles affording a pivotal connection between said knuckles and base member, washers interposed between the base member and said knuckles, caps enclosing said knuckles and frictionally engaging said pintles and washers, and a cover enclosing said base member.

4. A hinge comprising a base member, a leaf provided with knuckles, washers positioned between said knuckles and base member and equipped with circumferential flanges, pintles extending through said washers and providing a pivotal connection between said knuckles and base member, said pintles being provided with enlarged heads, caps enclosing said knuckles and frictionally engaged with said heads and washer flanges, and a cover enclosing said base member.

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