June 11, 1929. R. T. TYNER 1,716,746

NEST OF CHAIRS

Filed May 21, 1924

Fig. 1.

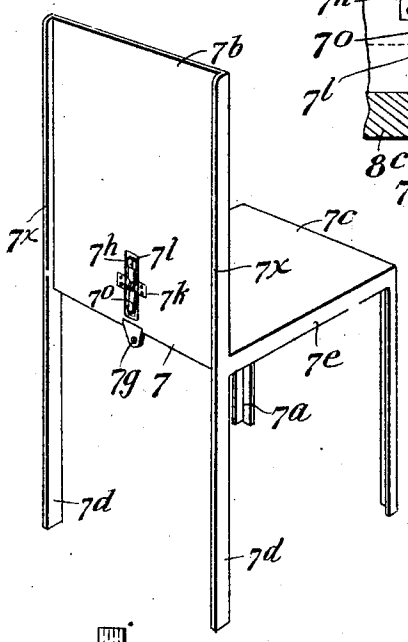


Fig. 4

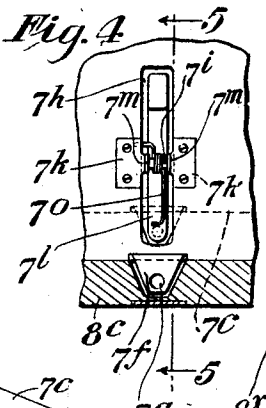


Fig. 5.

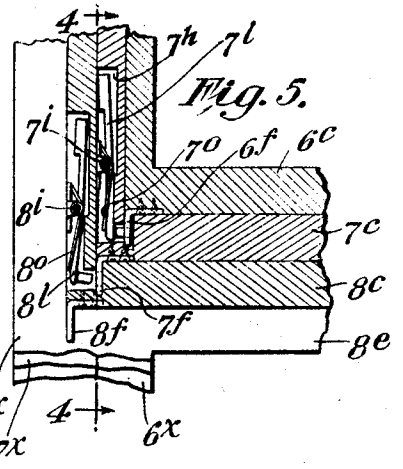


Fig. 2.

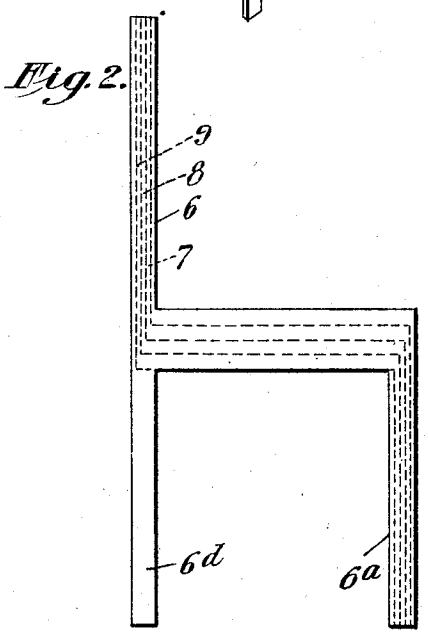
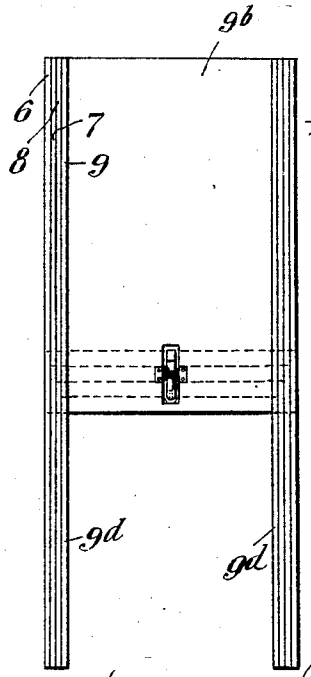


Fig. 3.



Inventor
Ralph T Tyner

By His Attorney
Edmund G Borden

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UNITED STATES PATENT OFFICE.

RALPH T. TYNER, OF SOUND BEACH, CONNECTICUT.

NEST OF CHAIRS.

Application filed May 21, 1924. Serial No. 714,760.

The present invention relates to a set of chairs constructed to nest one within another so that they may be nested to occupy the room of only one chair.

It has been proposed to construct chairs in nesting sets, but the scheme has never become popular. One of the drawbacks of this plan which has developed in attempts to introduce it is that it has been difficult to move such a set of nested chairs from one place to another without their coming apart. If the person sitting on the uppermost one of a set of nested chairs should wish to move his chair slightly, the separateness of the individual chairs has inevitably been advertised.

It is the principal object of the present invention to overcome the beforementioned difficulties and objections.

A second object of the present invention is to design a set of chairs which shall look as much as possible like one when in nested position.

A further object of the present invention relates to the particular arrangement and combination of parts hereinafter described with reference to the accompanying drawing.

In the drawing, Fig. 1 is a perspective view of one of a nest of chairs according to the present invention.

Fig. 2 is a side elevation of a nest of chairs according to the present invention.

Fig. 3 is a rear elevation of the chairs illustrated in Fig. 2.

Fig. 4 is a detail elevation on the line 4—4 of Fig. 5.

Fig. 5 is a vertical section through a portion of a nest of chairs according to the present invention, illustrating the fastening means according to the present invention.

Referring to the drawing, the chair 7 is one of a nesting set and preferably is formed, according to the present invention, of sheet metal or like material whereby the front legs of the chair may be conveniently formed as illustrated at 7^a to have a right angled section permitting the legs of other members of the set of chairs to lie one within another when the chairs of the set are nested without attracting attention. The back 7^b of the chair has two flanges 7^x—7^x which project rearwardly therefrom. Extensions fixed to flanges 7^x—7^x continue below the seat 6^e to form the rear legs 7^d—7^d. Chair 7 has also a downwardly extending flange which runs horizontally around three sides of the seat 7^e and one side of which is illustrated at 7^e. The other chairs of a given set according to the invention are made similarly to chair 7.

I find it convenient to include four chairs 6, 7, 8 and 9 in each set, but I do not limit myself to any given number. The chairs of a given set other than chair 6 have their legs slightly shorter than those of chair 6, so that their seats 7^e, 8^e and 9^e lie below seat 6^e of chair 6 in the order just mentioned. Seats 7^e, 8^e and 9^e are concealed within the flange 6^e of chair 6 when the chairs are nested and the rear legs 7^d, 8^d and 9^d of chairs 7, 8 and 9 are in transverse alignment with rear legs 6^d of chair 6 so that taken altogether a person is not apt to notice that there is more than one chair unless they have been separated intentionally.

According to the present invention, chairs of a given nest are prevented from separating accidentally by latch means illustrated in detail in Figs. 3 and 4. Each of chairs 6, 7 and 8 has fastened to the lower edge of its back an angle plate 6^f, 7^f or 8^f, respectively. Each of the angle plates 6^f, 7^f and and 8^f extends downwardly below the seat of the chair to which it is attached and is apertured as illustrated at 7^g. Moreover, each of chairs 7, 8 and 9 has a recess 7^h, 8^h or 9^h formed in its back and opening rearwardly. Within each recess 7^h, 8^h and 9^h is a pintle 7^i, 8^i or 9^i respectively mounted between plates 7^k—7^k, 8^k—8^k, and 9^k—9^k respectively. Pivoted on pintles 7^i, 8^i and 9^i are levers 7^l, 8^l and 9^l respectively. Levers 7^l, 8^l and 9^l each have apertured ears similar to ears 7^m of lever 7^l illustrated in Fig. 1 by which they are secured to the corresponding pintles 7^i, 8^i and 9^i. Also, each lever 7^l, 8^l and 9^l has thereon at its lower end a forwardly projecting pin such as is illustrated at 7^m and 8^m in Fig. 4. Moreover, a spring such as 70, is provided on each of the pintles 7^i, 8^i and 9^i, one end of which hooks under a plate 7^k, 8^k or 9^k respectively and the other end of which bears against the rear face of the lower end of the corresponding lever 7^l, 8^l and 9^l and tends to force the same forward. The plates 6^f, 7^f and 8^f are so arranged with respect to the levers 7^l, 8^l and 9^l that pins on the levers are forced into the apertures in the plates 6^f, 7^f and 8^f respectively, so that each chair is held firmly to the chair ahead of it when the chairs are

nested. Any chair in a given nest may be readily released from the one in front of it.

While I have described in detail the construction of chairs according to the present invention and the manner in which they may be nested, such description is not intended to be limiting, and in particular it will be understood that the invention is not limited to chairs made of metal sheet and that many features of the invention are wholly independent of whether or not the chairs are made of sheet material.

Having thus described my invention, I claim:—

1. The combination of a plurality of chairs proportioned to nest, each of said chairs having apertured plates depending from the lower edge of their backs, recesses in the backs of the chairs adjacent said plates, locking levers mounted in said recesses, and springs for normally holding the lower end of the said levers in yieldable contact with the back of the chairs, and a pin on the end of said levers arranged to engage the aperture in said plates when the chairs are in nested position.

2. A nest of chairs comprising three or more chairs shaped to fit closely together and form a nest, said nest comprising an outer chair and inner chairs arranged to slide under the preceding chairs in series, the chairs in series from the outer chair having successively narrower legs and flanges whereby the legs and flanges of the outer chair conceal successively the legs of the inner chairs when the nests are assembled, and locking members between adjacent chairs so arranged that the outer chair may be moved while the inner chairs are securely held to it for movement in unison, said locking members comprising an apertured lug on the bottoms of the backs of the chairs and a yieldably mounted lever on the backs of the chairs, said levers having pins thereon arranged to be movable into and out of engagement with said apertured lugs.

3. A nest of chairs comprising a plurality of chairs shaped and proportioned to fit together and form a nest, said nest consisting of an outer chair and a series of inner chairs, said inner chairs arranged to slide forwardly under the preceding chair, and locking members for connecting adjacent chairs positioned at the bottom and the rear of the backs of the chairs, said locking members comprising apertured plates on the chair backs adjacent the chair seats, and pivoted levers secured to the backs of the chairs, said levers being so positioned to have a pin thereon movable into and out of apertures in the plates.

In testimony whereof I affix my signature.

RALPH T. TYNER.