March 24, 1936. C. T. TOLLEFSEN 2,035,352

CARD INDEX, FILE, AND THE LIKE

Filed May 2, 1934

Fig. 1.

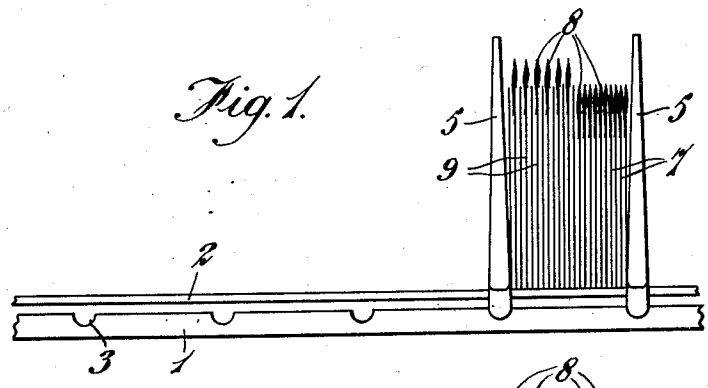


Fig. 2.

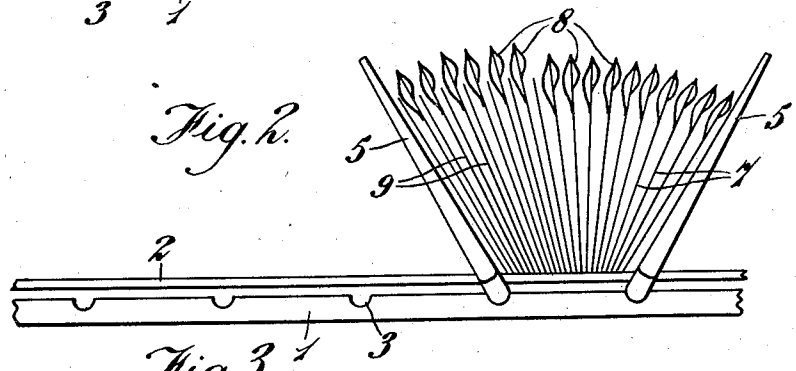


Fig. 3.

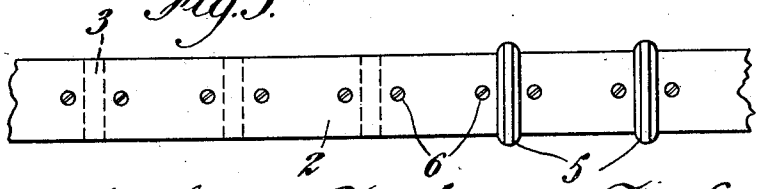


Fig. 4.

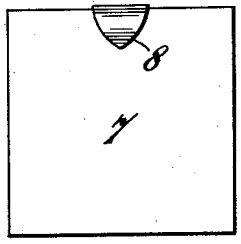


Fig. 5.

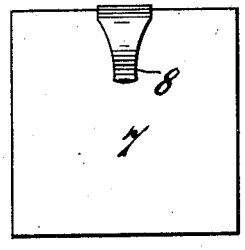
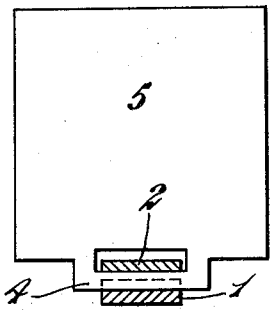


Fig. 6.



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2,035,352

CARD INDEX, FILE, AND THE LIKE

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Application May 2, 1934, Serial No. 723,551
In Norway June 15, 1933

3 Claims. (Cl. 129—16)

This invention relates to card indexes, files and the like and has for its object to construct such devices in such a manner that the cards or the like are readily separated and accessible and preferably so stored that they may be arranged in desired groups or the like.

In general, according to the invention, the cards, or some of the cards carry or are subject to the action of spring means which tend to space apart adjacent cards at their free edges.

Alternatively, between the cards, or some of the cards, inserts or insertion cards are fitted which are provided with springs.

The drawers or other containers for the cards are formed to receive (preferably adjustably) hingedly or otherwise, separating partitions between desired groups of cards.

In this manner when such a partition is turned about the edge or the like remote from its outer free edge, the cards between this partition and the next partition are freed to open out under the action of the spring means applied thereto or to the insertion cards.

The supports for the cards and separator members or partitions comprise a lower rail formed with transverse grooves to receive the pivots or hinges of the said separator members the said pivots being clamped between the said lower rail and an upper rail, which supports the cards, by means of screws, and the separators or partitions may be formed or fitted with a weight at their free extremities to facilitate handling and also further to press the inserts or cards together.

The invention will now be described more particularly by reference to the accompanying drawing wherein:—

Fig. 1 shows the supports with the cards and inserts clamped between a pair of separator members or partitions.

Fig. 2 shows similar supports with the separator members or partitions turned outwardly and the cards and inserts separated at their top edges.

Fig. 3 is a detail plan view of the support for the cards and separator members.

Fig. 4 shows a card, in front elevation fitted with a spring.

Fig. 5 shows a rear view of a card and spring.

Fig. 6 shows a sectional end view of Fig. 2.

As will be seen from the drawing the support for the cards and separator members comprises a lower rail 1 and an upper, preferably thinner rail 2, the said rails being in the nature of flat bars or strips applied to the base of a drawer or container in a substantially central position. The lower rail is formed with spaced transverse grooves 3 into which the pivots 4 of the separator members or partitions 5 are fitted. To vary the grip on the pivots so that the separator members may be retained in any position, the flat rails or strips 1 and 2 are connected by spaced screws 6 passing through the upper rail and threading into the lower rail the tightening or loosening of which effects the purpose.

The cards 7 have applied to the edge, forming the outer free edge, a spring 8 comprising a bent strip of light gauge phosphor bronze or other suitable springy metal. The strip is doubled on itself and thereby grips the edge of the card, although if desired small spikes or tongues in the strip may be forced into engagement with the material of the card. Springs of a similar nature may also be applied to the insertion cards 9.

When the cards 7 are closely packed together by the separator members 5 (see Fig. 1) the springs are straightened out, but when a separator member is turned on its pivot the springs 8 expand and cause the cards to be fanned out or separated as shown in Fig. 2.

The inserts may be provided with holes by means of which they can be mounted on longitudinally disposed rods. The cards may then be fitted between the inserts. Consequently should two inserts be directly in contact, the absence of a card or cards will be apparent.

As will be realized the separator members 5 can be mounted in any desired position according to the required grouping of the cards.

Having thus described my invention what I desire to secure by Letters Patent of the United States is:—

1. In card indexes, files and the like, means for spacing adjacent cards at their free edges comprising a resilient clip like spring composed of a strip of thin spring tempered sheet metal doubled on itself, the upper marginal parts being flattened together to grip the edge of a card and the remainder forming two tongues bowed outward away from each other but tending to close together at their free tips and adapted by their thinness and resiliency to be flattened by slight pressure and to open out again when the pressure is released.

2. The combination with the cards in a card index, file or the like, of separate detachable spring means applied over the upper free edge of each of the cards tending to space apart adjacent cards at those edges, said means consisting of a resilient clip like device composed of a strip of thin resilient sheet metal or other material dou-

bled on itself, the upper marginal parts being flattened together sufficiently to grip the edge of the card and forming two spring tongues bowed outwardly away from the surfaces of the card but tending to close together at their free tips which rest lightly one on each side of the card, the bowed out portions of the tongues being adapted by their thinness and resiliency to be flattened out against the cards by slight pressure as when the cards are packed together and to open out again and separate the cards when such pressure is released.

3. In card indexes, files and the like, having index cards and insert cards the combination with the insert cards between the index cards of separate detachable spring means applied over the upper free edge of each insert card tending to space the cards apart, said means consisting of a resilient clip-like device composed of a strip of thin resilient sheet metal or other material doubled on itself, the upper marginal parts being flattened together to grip the edge of the card and the remainder forming two tongues bowed outwardly away from the surfaces of the card but tending to close together at their free tips which rest lightly one on each side of the card, the bowed out portions of the tongues being adapted by their thinness and resiliency to be flattened out against the cards by slight pressure, as when the cards are packed together, and to open out again when such pressure is released.

CARL THORLEIF TOLLEFSEN.