

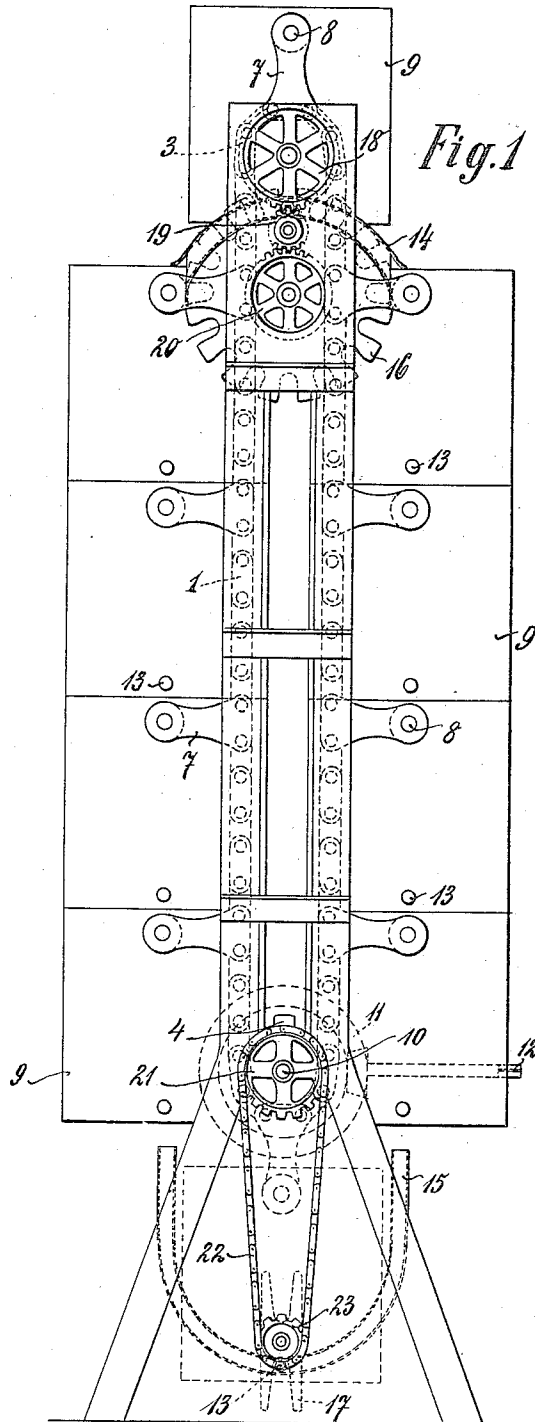
J. HASCHEK & K. F. HENOCH.
ELEVATOR.

APPLICATION FILED MAY 18, 1914.

Patented Dec. 17, 1918.

2 SHEETS—SHEET 1.

1,287,984.



Witnesses:
E. G. McGee.
L. Tate

Inventors:
Josef Haschek and
Karl F. Henoch
By Emil Raimeliche
Attorney.

J. HASCHEK & K. F. HENOCH.
ELEVATOR.

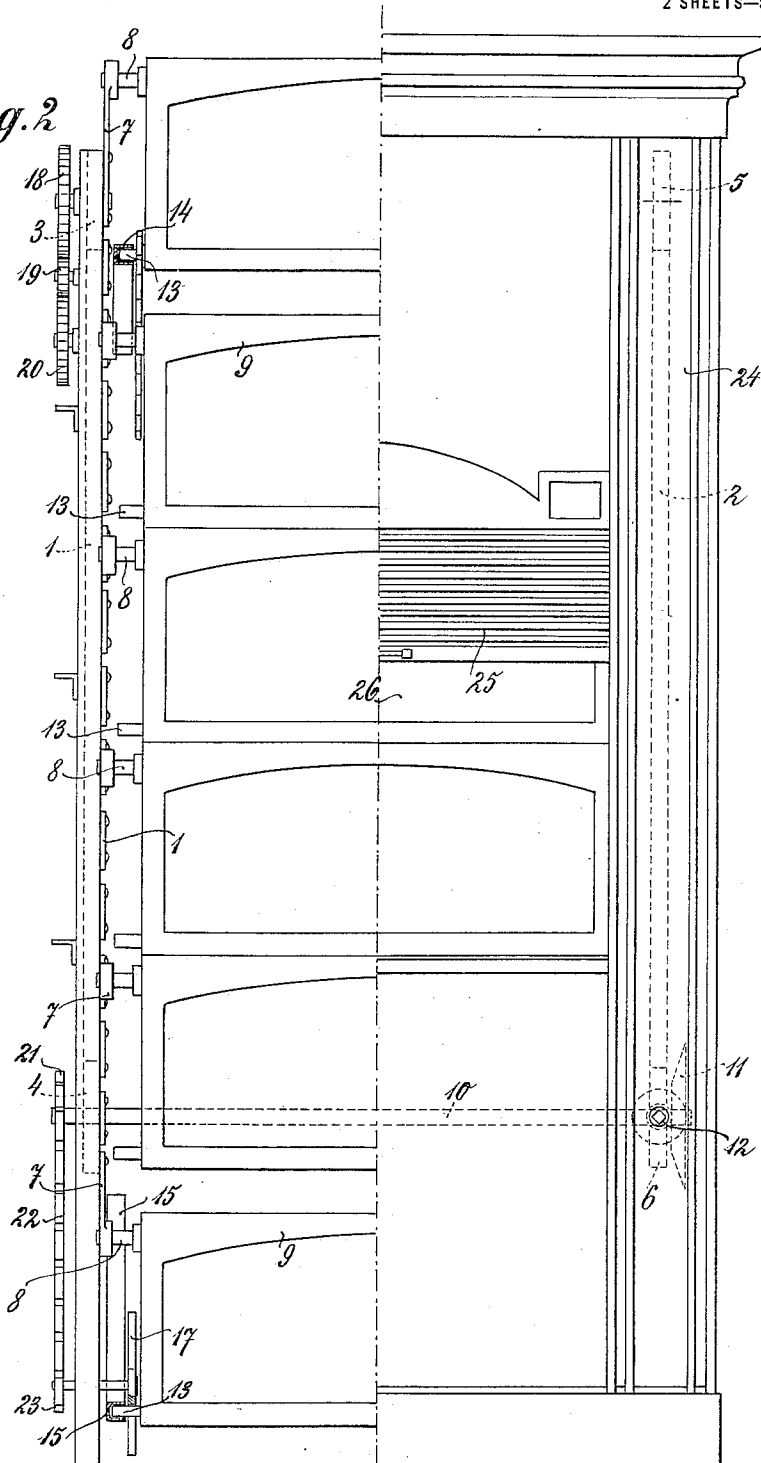
APPLICATION FILED MAY 18, 1914.

1,287,984.

Patented Dec. 17, 1918.

2 SHEETS—SHEET 2.

Fig. 2



Witnesses:
E. G. McGee.
L. Tate

Inventors:
Josef Haschek and
Karl E. Henoch
By *Quil* *Minneapolis*
Attorney

UNITED STATES PATENT OFFICE.

JOSEF HASCHEK, OF VIENNA, AND KARL FELIX HENOCK, OF STOCKERAU, NEAR VIENNA, AUSTRIA.

ELEVATOR.

1,287,984.

Specification of Letters Patent.

Patented Dec. 17, 1918.

Application filed May 18, 1914. Serial No. 839,390.

To all whom it may concern:

Be it known that we, JOSEF HASCHEK and KARL FELIX HENOCK, subjects of the Emperor of Austria, residing at Vienna and Stockerau, near Vienna, Lower Austria, respectively, have invented certain new and useful Improvements in Elevators, of which the following is a specification.

This invention relates to an elevator useful for a variety of purposes, which is provided with two endless chains, driven synchronously, and a part of whose links are formed with supporting-brackets for hoisting-vessels. According to the invention, the utilization of the space available is improved, increased security in the straight-line motion of the hoisting-vessels at each point of his path being attained at the same time.

For this purpose the hoisting-vessels consist of parallelopipedic or otherwise formed, open or closed boxes, of such a height, as to form an uninterrupted line in the straight parts of their path, the bottoms and the covers of the consecutive boxes being in immediate proximity to each other, whereas special positive guides are arranged to secure the parallelism of movement of the boxes during the rotation of their supporting-brackets around the chain-wheels.

In the accompanying drawing, there is represented an elevator designed as a book-case, Figure 1 showing a side elevation, Fig. 2 a front-elevation, with the casing partially removed.

1 and 2 are two endless chains, which are driven synchronously around the chain-wheels 3, 4 and 5, 6. In determined intervals the links of these chains are formed with supporting-brackets 7, each pair of these brackets extending in opposite directions, serving as supports for the pivots 8 of the hoisting-boxes 9, which are formed as book-cases. The lower chain-wheels 4 and 6 are mounted on a common shaft 10, which is driven by hand or by motor-power by means of a bevel-gear 11. In the former case, a crank can be fixed to the square end 12.

The height of the hoisting-box 9 is such, as to secure an immediate proximity of the bottoms and covers of each pair of consecutive boxes in the straight parts of their path, so as to attain the best utilization of the space available, assuring at the same time the correct parallel guidance of any box, which

may be loaded unequally. In order to secure this correct guidance of the boxes during the motion of the supporting-brackets 7 around the chain-wheels, the boxes are provided beneath their supporting-pivots 8 with guide-pins 13, entering the curved arc-shaped guide-paths 14 and 15 during the periods of revolution, which guide paths are arranged eccentrically relatively to the center of the chain-wheel.

In this movement, the guide-pins 13 are positively driven by dog-wheels 16 and 17, which are connected by toothed wheels 18, 19, 20 and 21, 23 and sprocket chain 22 with the chain-wheels.

When using this elevator in combination with a book-, deed- or register-case, as shown in the drawing, 24 is the completely closed casing, which is provided with an opening 26 of convenient height, corresponding to the free side-opening of one or more boxes, (two as shown in the drawing), thereby enabling the withdrawal of the contents of each box. This opening may be shut by any convenient arrangement such as for instance, by a roll-shutter 25.

In book-magazines or libraries a multitude of such book-cases may be arranged in several rows, beside or behind one another, in such a manner as to place the openings 26 of the cases, which are arranged beside one another, at the same height, and the openings of the rows behind or before, in different levels, like the steps of a stair-case, so as to enable in one room, which may be situated in the uppermost or in the lowermost story of the building, the withdrawal of all of the books contained in any of the boxes of all of the book-cases, thereby attaining the most complete utilization of the space available.

A similar arrangement may take place in large stores in order to realize an economy in space and personnel, the clerk being given the possibility to dispose also of the entire stock accumulated in the different stories above and below his place.

In an analogous manner, the hoisting-boxes being constructed in convenient size, may be utilized as show-boxes, enabling the merchant to exhibit successively his entire stock to the passers-by.

By means of this invention, in new buildings the space available may be utilized in the most suitable manner.

Obviously such elevators may be used also for hoisting men and loads in large buildings.

Claim:

- 5 In an elevator, the combination of a pair of endless chains having vertical runs, upper and lower chain wheels around which said chains pass, supporting brackets carried by said chains and projecting laterally out-
10 ward therefrom, carriers pivoted to said brackets and provided adjacent their lower ends with guide pins, said carriers arranged to rest one upon another during their periods of vertical travel, a stationary arcuate
15 guide located adjacent each of the chain wheels over which one of said chains passes.

said guides being disposed in position to enable the guide pins on said carriers to travel therealong, a dog wheel associated with each guide to engage the pins on the successive carriers and positively force them along said guides, and gear connections between said chain wheels and said dog wheels for driving the latter from the former.

In testimony whereof we affix our signatures in presence of two witnesses.

JOSEF HASCHEK.
KARL FELIX HENOCH.

Witnesses:

CREFORD KEORL,
AUGUST FUGGER.