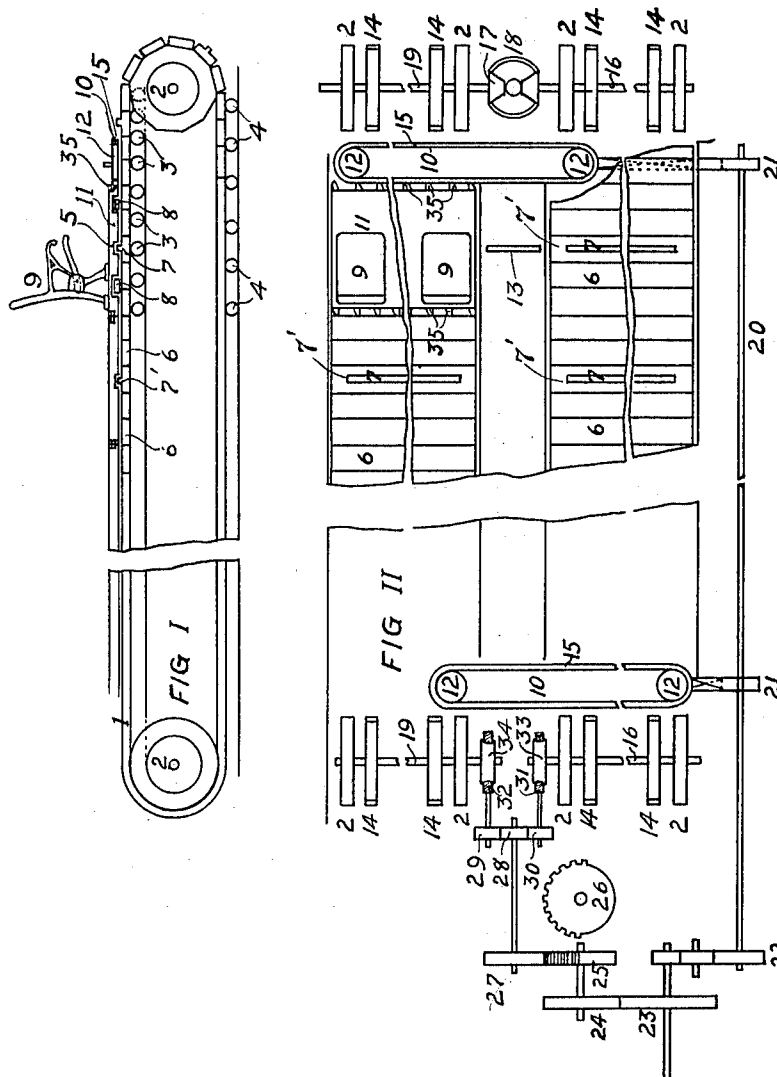


J. A. H. RAYMOND.  
MOVING PLATFORM FOR THEATERS.  
APPLICATION FILED JUNE 9, 1911.

1,040,411.

Patented Oct. 8, 1912.



WITNESSES

*E. Bilanger*  
*Monty*

J. A. H. RAYMOND

INVENTOR

BY

*James Beaudry*  
ATTORNEY

# UNITED STATES PATENT OFFICE.

JOSEPH ANTONIO HILAIRE RAYMOND, OF MONTREAL, QUEBEC, CANADA.

## MOVING PLATFORM FOR THEATERS.

1,040,411.

Specification of Letters Patent.

Patented Oct. 8, 1912.

Application filed June 9, 1911. Serial No. 632,215.

*To all whom it may concern:*

Be it known that I, JOSEPH ANTONIO HILAIRE RAYMOND, a subject of the King of Great Britain and Ireland, residing in the city of Montreal, in the Province of Quebec, Canada, and whose post-office address is Montreal, Province of Quebec, have invented certain new and useful Improvements in Moving Platforms for Theaters, of which the following is a specification.

The invention relates to theaters and is particularly adapted to moving pictures theaters. Its object is to bring to the notice of the attendants, the spectators who have seen the performance once, so that they may collect a second fare if the spectator remains for a repetition of the show.

It consists of two endless traveling platforms occupying nearly the whole width of the hall, except the aisles on each side and center. The platforms are provided with rows of chairs or seats. One of these platforms moves forward, carrying the rows of seats toward the stage where each row of seats is transferred bodily, one after the other to the other side of the hall on the platform which travels backward, until the rows of seats have traveled to the rear, where they are transferred again to the first platform which moves forward and so on, until the show is finished.

The spectator is admitted on one side of the hall where the platform moves forward and takes the nearest seat to the door. All the seats are moved about  $2\frac{1}{2}$  feet, in about half a minute, with a pause of about another half minute. During the first half of the performance the seats of one platform advance toward the stage where they are transferred bodily to the other platform and moved backward during the second half of the performance till they reach the entrance where the spectator is at liberty to go out or sit still to witness the show a second time by paying another fare. Necessary railings and partitions are placed near the door and to the front to prevent accidents. The platforms are composed of sets of slats hinged together so as to present an even lower surface to run smooth over rollers all along their path. The upper surface of the center slat of each set is provided with a tongue extending to within a few inches of its two extremities.

The rows of seats are fixed to independent floorings having a width of  $2\frac{1}{2}$  feet and a length equal to the width of the traveling platform, and the lower surface of each of these floorings has along its center a groove to fit the tongue of the central slat of each set so that the floorings are carried along by the platform. The floorings are provided with rollers fixed transversely to the path of the platform to insure their easy travel, crosswise, from one platform to the other when the rows of seats reach the ends of their path.

When the flooring with its row of seats has reached the end of its path at the front or at the rear of the hall, an endless chain running transversely to the path of the platforms and fitting on corresponding pins or sprockets fixed to the front and to the rear of each flooring causes it to roll along the tongue of the center slat, along a similar tongue across the center aisle and along the tongue of the center slat of the platform at the other side of hall, which platform will carry it to the other end of the hall where the same operation is repeated to transfer the seats back to the first platform and so on during the performance.

In the drawings connected with this, specification: Figure 1. is a longitudinal view or section of the moving feature of the invention. Fig. 2. is a partial top view of the platforms.

1. is one of the traveling platforms.
2. are broad tired wheels supporting the platforms.
3. are the rollers supporting the platforms, on their upper travel.
4. are other rollers supporting the platforms, on their lower transit.
5. are the grooves under the floorings of seats.
6. are the slats composing the traveling platforms.
7. is the central slat of each set having a tongue 7 to fit the groove 5.
7. is the tongue on the upper surface of the center slat.
8. are the rollers transversely fixed to the seat flooring.
9. are the seats.
10. are the endless chains to move the rows of seats from one platform to the other.
11. is one of the floorings for the seats 9.

12. are the sprocket wheels of the endless chains.

13. is the tongue fixed across the center aisle to guide the floorings from one platform to the other.

14. are the sprocket wheels fixed to the cross shafts 16 to move the traveling platforms.

15. are the links of the endless chain 10 to fit on the teeth 35.

16 and 19. are the shafts of the sprocket wheels 14 and broad tired wheels 2.

17 and 18. are miter gears to insure the regularity of the reverse motion of the shafts 16 and 19.

20. is the shaft communicating motion to the sprocket wheels 12, 12.

21. are the wheels on the main shaft communicating motion to the endless chains 10, 10 through belts.

22. is a cog wheel receiving motion from the main wheel 23.

23. is the main wheel connected with the power supply.

24. is an intermediate wheel to transfer motion from the main wheel 23 to the wheel 25.

25. is a wheel carrying cogs on one half of its circumference only to impart motion to the whole system during one half minute and continue its own motion without affecting the rotation of wheel 27.

26. is a side view of wheel 25.

27. is a cog wheel moved by the rotation of the wheel 25.

28. is a cog wheel fixed on the same shaft as wheel 27 to rotate, in opposite direction, the two wheels 29 and 30.

29 and 30. are wheels turning the endless screws 31 and 32 setting the whole system into operation.

31 and 32. are endless screws acting upon the worm wheels 33 and 34 which are fixed to shafts 16 and 19, respectively.

35. are pins or sprockets fixed to the

front and to the rear of the seat floorings to be acted upon by the endless chains.

Having thus described the invention in all its details, still be it understood, that certain modifications may be introduced provided the main features of the following claim are not overstepped.

What I claim as my invention and desire to secure by Letters Patent is:

The above described system of platforms which consists in an endless platform supported on rollers and moving forward; the lower return part thereof also supported by rollers; another endless platform also supported by rollers similar to the first and moving backward; the two actuated by endless chains and sprocket wheels; each platform being composed of sets of slats hinged together so as to offer a smooth contact surface to the rollers, the center slat of each set bearing a projecting tongue; seats for the public fixed to separate and independent floorings, each having on its lower face a groove to fit the tongue of the center slat of the sets; rollers fixed under the floorings of the seats; endless chains to move the floorings, from one platform to the other; pins or sprockets fixed to the front and to the rear of the floorings, fitting the links of the endless chains; a main wheel 23 to actuate the wheel 24; a wheel 25 having cogs on one half of its circumference and acting intermittingly on wheel 27 to revolve in opposite directions the worm screws 31 and 32 which move the two platforms simultaneously in opposite direction and a miter gear to insure the regularity of the motion, for the purpose and in the manner hereinabove specified.

In witness whereof I have hereunto set my hand in presence of two witnesses.

JOSEPH ANTONIO HILAIRE RAYMOND. [L. s.]  
Witnesses:

E. BILANGER, [L. s.]

P. HOINTZ. [L. s.]

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."