prowided with pockets having a slot in the bottom thereof, in combination with a curved needle in each jucket working in said slot and means for operating said needle to engage and release a potato. 3th. In a potato planter, a conveyer provided with pockets having a slot in the bottom thereof, in combination with a needle in tach pocket having an arm for agitating potators in the pocket, and means for operating the needle. 10th. In a potato planter, a conveyer provided with pockets having a slot in the hottom thereof, in combination with a curved needle in each pocket having an arm for agitating potatoes in the pocket, and means for operating the needle. 11th. In a potato planter, a conveyer provided with pockets having a slot in the lottom therrof, in combination with a needle in each pocket provided with an arm for agitating putatoes in the jorket, and an arm to nject surplus putatoes, and means for operating the needle. 12 th . In a potato planter, a conveyer provided with pookets having a slot in the bottom thereof, in combination with a curved needle in each pocket provided with an arm at one end for agitating potatoes in the pocket, an arm to expel the surplus potatoes, and means for operating the needle. 13th. In a potato planter, a conveyer having pockets, in combination with means for agitating and ejecting surplus potatoes and engaging one potato in each pocket, and means for releasing the potato. 14 th. In a potato planter, a conveyer provided with pockets having a slot on each side of its centre, in combination with is curved needle in each pocket provided with an arm at one end for agitating potatoes in the pocket and an arm near the opposite end to expel surplus potatoes from the pocket. 10\%th. In a potato planter, a conveyer provided with pockets, in combination with a curved needle having a transverse bar, and a track with which said bar engages. 16th. A potato planter, provided with a conveyer having pockets, means operating in each pocket to remove surplus potatoes, a supplemental device separate from the pockets to remove surplus potatoes, means for engaging a potato in the proket, and means for releasing potatoes.
No. 61,871. Kailway Nwitelf. (Alguille de chomin de fer.)


Charles Henry Strauss and Benjamin Julius Rosten, both of Seattle, Washington, U.S.A., 1st December, 1898 ; 6 years. (Filed 17 th October, 1898.)
Claim.-1st. In a safety railway switch, the combination with a phrality of tracks, such as a main and side track, and switch rails adapted to be moved into line with either track, of antomatic actuating mechanism for the switch-rails comprising a rock-shaft arranged transversely to said tracks and having opposite bends, arms or cranks, connections between said shaft and rails, and movable parts or levers for each of said tracks connected respectively with said opposite arms of the rock-shaft, substantially as shown and described. 2nd. The combination of a plurality of tracks, switch-rails therefor, movable farts or levers in or by each of said tracks, mechanism connecting the same, whereby the depression of the movable part or parts of one track will elevate the corresponding part or parts of the other track, and operating connections between said mechanism and the switch-rails, substantially as shown and described. 3rd. The combination with the switch-rails, of a plurality of tracks, the rails of which are bodily movable vertically at or near the switch-rails, mechanism connecting said vertically movable rails, whereby the depression of those of one track will elevate the others, and actuating connections between said mechanism and the switchrails for shifting the latter into line with the track, the movable rails of which are depressed, substantially as shown and described. 4th. The combination with the switch-rails, of a plurality of tracks, the rails of which are bowily movable vertically, fish-plates in witich said vertical movable rails are held and guided provided with transverse learings, a rock-shaft mounted beneath the tracks in said bearings and having opposite arms, bends or cranks, connections between the movable rails of one track and the arms at one side of the shaft, connections between the movahle rails of the other track and the arms at the other side of the shaft, and actuating mechanism connecting the shaft with the switch-rails, substantially as shown and described. 5th. The combination with the switch-actuating parts or levers, and the switch-rails, of actuating mechanism connecting said parts with the switch-rails, locking deviees for main-
taining the switch-rails in their stt position, and a loose connection between said actuating mechanism and the locking devices whereby the latter are operated at a different time from the switch-rails, substantially as shown and described. 6th. The combination with the switch-actuating parts, such as the levers A, B, C, D, and the switch-rails, of actuating mechanism connecting said parts with the switch-rails, Jocking devices such as the keys $x x$, for maintaining the sad actuating parts in their set position, and a loose connection, such as is provided by the slotted rood $F$, between said actuating mechanism and the locking devices, wherehy the latter are operated at a different time from the said switch-actuating parts, substantially as shown and described. 7th. The combination with a plurality of tracks, each having switch-actuating parts or levers, and the switch-rails, of actuating mechanism commecting said parts with the switch-rails, switch-actuating parts or levers at the other side of or beyond the switch-rails, and mechanism connecting the last-mentioned levers with the first-mentioned levers of both tracks, whereby a clear main track is insured in loth directions, substantially as shown and described. 8th. The combination with a plurality of tracks, each having switch-actuating parts or levers, and the switchrails, of actuating mechanism connecting said parts with the switchrails, locking devices for maintaining the switch-rails in their set position, a loose connection between said actuating mechanism and the locking devices whereby the latter are operated at a different time from the switch-rails, switch-actuating parts or levers at the other side or beyond the switch rails, and mechanism connecting the last-mentioned levers with the first-mentioned levers of both tracks. substantially as shown and described. 9th. In an automatic railway switch, the combination with the tracks and switch-rails, of switch actuating levers inclined in opposite directions, one lever formed with a horizontally extending recess and the other with a corresponding projection fitting in said recess, connections between said levers and the switch-rails and means for elevating the levers, substantially as shown and described. 10th. The combination with a plurality of tracks having switch-actuating parts or levers, and the switch-rails of actuating mechanism connecting said parts with the switch-rails, a second second set of switch-actuating parts or levers beyond the switch-rails, mechanism connecting the latter levers with the switch-rails, and a third set of levers connected with the mechanism of said second set whereby the second set of levers may be rendered inoperative, substantially as shown and described. 11 th. The combination with the rock-shaft $B^{2}$, of levers $C^{1}, D^{1}$, of the sliding cams $\mathrm{C}^{2}$, brackets ?, carrying rollers and means for reciprocating said cams and brackets, substantially as shown and described.

No. $61,87 \%$. Muchinefor Inserting Metallic Fantening. (Machiue pour chasser les pointes métalliques.)


The McKay Shoe Machinery Company, Portland, Maine, and Louis Amedet Casgrain, Winchester, Massachusetts, C.S.A., 1st December, 1898; 6 years. (Filed 26th October, 1898.)
Claim.-1st. A horn spindle, and a horn jivoted thereon and provided at its upper end with two clinching cavities, one being located nearer the end of the tip of the horn than the other, either of said cavities being adapted to be put into line with the nose of the machine through which the nail is driven into the work supported on the horn, substantially as described. 2nd. A horn spindle, and a horn pivoted thereon and provided at its upper and with two clinching cavities, one being located nearer the end of the tion of tha

