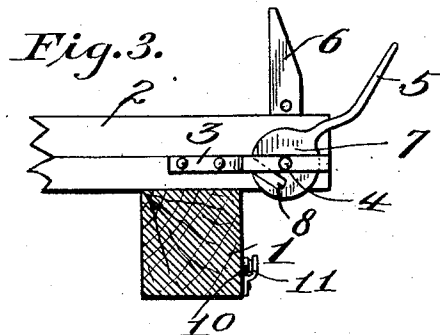
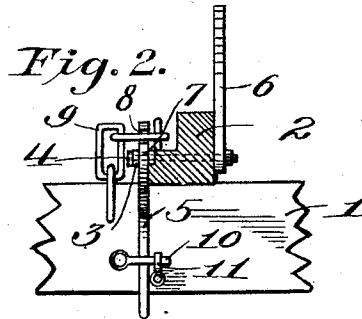
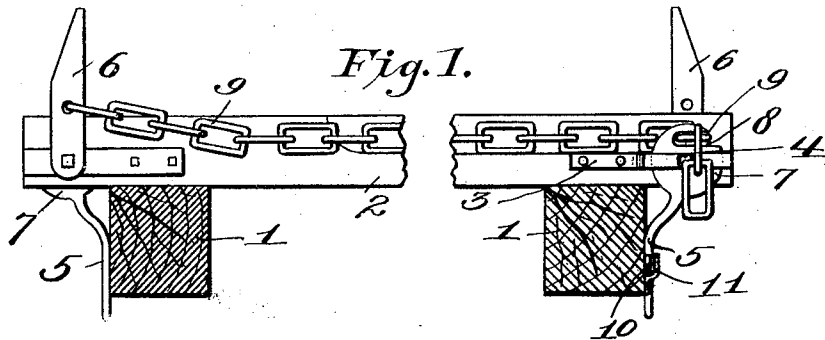


A. BENEDICT.
STAKE FOR LOGGING CARS.
APPLICATION FILED MAR. 25, 1909.

944,838.

Patented Dec. 28, 1909.



Witnesses.

W. B. Keeler
C. H. Mesler

Inventor.

Austin Benedict
per *James L. Notter*
Attorney.

UNITED STATES PATENT OFFICE.

AUSTIN BENEDICT, OF MERRILL, WISCONSIN.

STAKE FOR LOGGING-CARS.

944,838.

Specification of Letters Patent.

Patented Dec. 28, 1909.

Application filed March 25, 1909. Serial No. 485,703.

To all whom it may concern:

Be it known that I, AUSTIN BENEDICT, a citizen of the United States, residing at Merrill, in the county of Lincoln and State of Wisconsin, have invented new and useful Improvements in Stakes for Logging-Cars, of which the following is a specification.

This invention relates to new and useful improvements in stakes for logging cars, such stakes being known in the trade as "corner binds".

The invention belongs to that type of construction in which pivoted stakes are employed in combination with a suitable means which is manipulated either to maintain the stakes in a perpendicular position, resisting the influence of the weight of the logs or to release the stakes, as in the operations of loading and unloading.

In connection with such a structure the invention has for a primary object the provision of novel stake holding and releasing means which may be conveniently operated by hand at one side of the car and in which the releasing operation is positively effected.

The invention aims as a further object to provide a structure of the type stated which shall be compact in its assemblage and which, in addition to its positive advantages of operation and use, shall have also the advantageous incidents of simplicity and inexpensiveness.

In the accompanying drawings I have illustrated a preferred and advantageous embodiment of the invention, the structural details of which will be set forth at length in the following description, while in the claims appended at the end of the description, I have recited the novel features by which the invention is distinguished from the prior art.

In the said drawings: Figure 1 is an elevation showing the application of the improvement on an ordinary logging car. Fig. 2 is an end elevation showing the arrangement of parts at one end of the cross bolster, and Fig. 3 is a fragmentary elevation similar to Fig. 1 but showing the operating lever in its releasing position.

Similar characters of reference refer to corresponding parts throughout the several views.

Referring more particularly to Fig. 1, the numeral 1 denotes the side sills of an ordinary car and the numeral 2 a cross bolster which is supported on the sills 1. Only one

bolster 2 is shown but it will be understood that as many as are necessary or advantageous may be employed. The mechanism at each end of the bolster 2 is the same and therefore the use of singular expressions is to be understood as applying to all corresponding parts wherever shown.

At each end of the bolster 2 a longitudinally exposed fork, as 3, is provided, and the latter serves as a bearing for a transverse pivot bolt, as 4. The bolt 4 extends through the bolster 2 and between the legs of the fork 3 carries an operating lever, as 5, and at its other end a stake, as 6. In this connection it should be noted that the forks 3 are mounted on relatively opposite sides of the bolster and that, therefore, on each side of the bolster there will be a stake 6 and its cooperating lever 5. The lever 5 terminates in a substantially disk-shaped head, as 7, which surrounds the bolt 4 and which is formed with a recess, as 8. The stake 6 is connected intermediate its length to a suitable chain, as 9, which extends longitudinally of the bolster 2 and which has one of its links near its free end engaged in the recess 8 of the lever 5, in the operative position thereof, as shown more particularly in Figs. 1 and 2. In such operative position the handle portion of the lever 5 is positioned against the side of the adjacent sill 1 and is held against displacement by any suitable latch means, as for example a pivoted latch, as 10, which engages in a suitable keeper, as 11. It will be seen that when the lever 5 is so positioned, the recess 8 points to the outer end of the bolster and extends longitudinally thereof. The link of the chain 9 which is engaged in such recess is disposed in a horizontal plane and is turned at a substantial right angle to the other links of the chain which extend longitudinally of the bolster 2. By virtue of such arrangement the chain is firmly held and the stake is supported in a perpendicular position thereby against the pressure of the load of logs. The chain 9 is sufficiently long to permit of its extreme free links hanging downwardly, as shown in Fig. 1 and such extreme links prevent any lateral disengagement of the link in the recess 8 from its position.

From the foregoing it will be seen that the levers 5 at each end of the bolster are employed to sustain the stakes 6 at the respective opposite ends of the bolster. In releasing the stakes the latch 10 is moved

to disengage the handle portion of the lever 5 and the latter is then swung on its pivot 4 to the position shown in Fig. 3. In such position the fork 3 will have engaged the link of the chain 9 that was previously in the recess 8 and will strip such link from said recess as the movement of the lever 5 is continued. In this manner any tendency of the link to bind in the recess 8 which might occur in the absence of the fork 3 if the lever 5 were moved rapidly, is positively guarded against.

The levers 5 may be very conveniently manipulated by hand to draw the stakes into their proper positions or to release the same in the manner explained and the general arrangement of the parts of the device as an entirety is compact, it being observed that all the parts are supported at the ends of the bolster and occupy comparatively small space.

The structures of the various details are of simple nature and the device may be inexpensively manufactured and assembled for use upon logging cars.

Having fully described my invention, I claim:

1. The combination with a cross bolster of a stake pivotally supported at one end thereof, a manually operable lever pivoted at one side of the bolster at the other end thereof, the said lever having a recess in its pivotal portion, a chain connected to the stake and having one of its links at or near its free end engaged in the recess of the lever in the operative position of the latter

and a latch device engaging the handle portion of the lever to hold the same against movement from its operative position.

2. The combination with a cross bolster of a stake pivotally supported at one end thereof, a longitudinally disposed fork at the other end thereof and at one side of said bolster, a lever having a portion thereof pivotally disposed between the legs of the fork, the said pivotal portion having a recess therein, a chain connected to the stake and having one of its links at or near its free end engaged in the recess of the lever, the latter being movable whereby the link engages the fork and is stripped thereby from the recess and a latch device engaging the handle portion of the lever to hold the same against movement from its operative position.

3. The combination with a cross bolster of levers pivoted on relatively opposite sides at each end thereof, stakes pivoted at each end of the bolsters on the sides opposite to the levers, means connected to the stakes and capable of detachable engagement with the levers at the opposite ends of the bolsters and means for holding the levers against movement from their operative positions.

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

AUSTIN BENEDICT.

Witnesses:

L. G. GAYLOR,
T. B. TYNDALL.