May 22, 1934. R. J. LACKNER 1,959,722

CABLE CLAMP

Original Filed Sept. 28, 1929

Fig. 1.

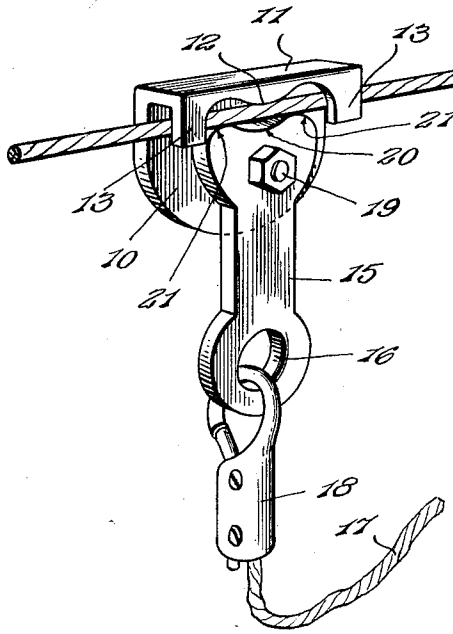


Fig. 2.

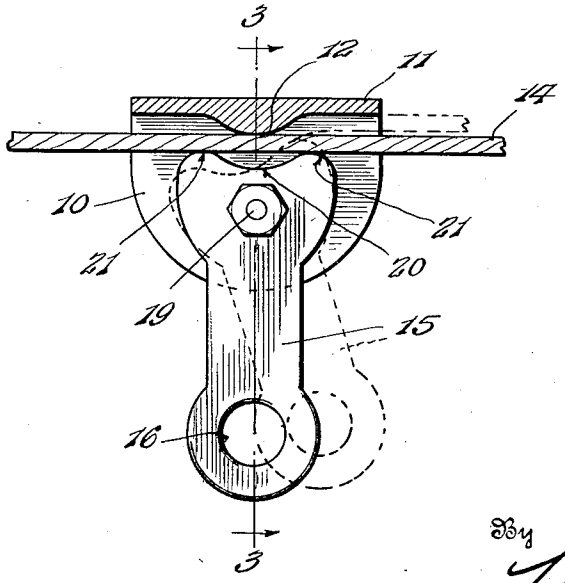
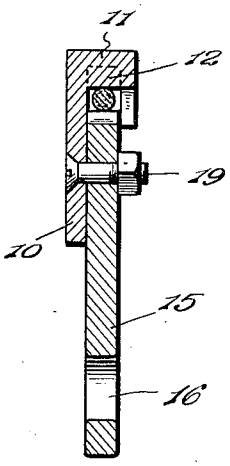


Fig. 3.



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1,959,722

CABLE CLAMP

Rolph J. Lackner, Brooklyn, N. Y.

Original application September 28, 1929, Serial No. 395,921, now Patent No. 1,899,162, February 28, 1933. Divided and this application February 25, 1933, Serial No. 658,646

4 Claims. (Cl. 24—134)

This invention relates to an improved cable clamp, being a division of my application filed September 28, 1929, Serial No. 395,921, now Patent No. 1,899,162, February 28, 1933.

The invention seeks, among other objects, to provide a clamp especially adapted for use with my improved safety appliance filed of even date herewith for preventing falling of workmen from swinging scaffolds, steel structures or the like.

A further object of the invention is to provide a clamp which may normally slide freely on a cable but wherein, when pull is exerted on the trigger of the device, the clamp will effectually grip the cable.

And the invention seeks, as a still further object, to provide a clamp wherein the trigger and the head of the clamp will be so formed that, when the trigger is swung, the trigger will bend or kink the cable and effectually bind the clamp in set position thereon.

Other and incidental objects of the invention will be apparent during the course of the following description.

In the drawing, Figure 1 is a perspective view showing my improved clamp in normal position on a cable,

Fig. 2 is a sectional view through the head of the device and showing, in dotted lines, the trigger swung to grip the cable, and

Fig. 3 is a sectional view at a right angle to Fig. 2 on the line 3—3 of Fig. 2.

In carrying the invention into effect, I employ a head substantially L-shaped in cross section and comprising a depending flange 10 and an overhanging flange 11 projecting at a right angle from the flange 10 at its upper end. The flange 10 is preferably rounded at its lower edge and formed on the flange 11 at its lower side is a medially disposed transverse rib 12 having a convex lower face. The flange 11 is further provided at its ends with depending lugs or keepers 13 whereby the head is adapted to extend over a cable and rest thereon, a cable being conventionally shown at 14. Pivoted upon the flange 10 of the head, below the flange 11, is a trigger or lever 15 which depends below the head and has an opening 16 through its lower extremity in which the end of an anchoring cable 17 may be secured, preferably by a snap hook 18. Pivotally connecting the trigger with the flange 10 of the head is a bolt 19.

As particularly brought out in Figs. 2 and 3, the upper end of the trigger 15 is disposed immediately below the cable 14 and its upper edge is formed on a concave arc, as indicated at 20, whereby the ends or corners 21 will acquire the functions of cams to coact with the cable. The concave upper edge of the trigger is centered with respect to the convex face of the rib 12 and is of slightly greater radius than said rib, the upper end of the trigger straddling the rib.

As will now be seen, the cable may slide freely between the flange 11 of the head and the trigger 15 as long as the trigger is perpendicular or at a right angle to said flange and the clamp may, consequently, be shifted along the cable to such point as may be desired or at which it will be most efficient. Should anything happen, however, which would put a strain upon the anchoring cable 17, the resulting pull will rock the trigger upon the bolt 19 so that one or the other of the corners 21 of the trigger will be caused to bind the length of the cable so that the cable will be firmly clamped between the trigger and the flange and, consequently, will be firmly secured.

Attention is now directed to the fact that when the trigger 15 is rocked, as just described and as shown in dotted lines in Fig. 2, the upwardly swung corner or cam of the trigger will flex the adjacent portion of the cable against the rib 12 to cause a bend or kink in the cable, as also shown in dotted lines in Fig. 2. Pull on the trigger will thus be in the direction of said kink or bend with the result that the rib 12 will be forced against the obstruction in the cable provided by said kink or bend and coact with the upwardly swung cam or corner of the trigger to effectually prevent slipping of the clamp along the cable. I accordingly provide a particularly simple and efficient device for the purpose set forth and, as will now be seen, a device which will effectually serve its function.

Having thus described the invention, I claim:

1. A cable clamp including a head engageable over a cable and provided with an intermediate convex face to ride on the cable and terminal depending guide lugs, and a trigger pivoted upon the head between the guide lugs and provided with a concave face to confront the convex face of the head, the trigger being movable to flex the cable about said convex face and grip the cable between said faces.

2. A cable clamp including a head having an overhanging flange to engage over a cable, said flange being formed with a transverse convex rib to rest on the cable and terminal depending guide lugs, and a trigger pivoted upon the head between the guide lugs and provided with a concave face confronting said rib, the trigger being movable to

flex the cable about said rib and grip the cable between the trigger and the rib.

3. A cable clamp including a head having an overhanging flange to engage over a cable, said flange being formed with a medial transverse rib to rest on the cable and being provided at its ends with depending guide lugs for retaining the head on the cable, and a trigger pivoted upon the head below said rib and between the guide lugs and provided with a concave upper edge defining cams selectively engageable with the cable when the trigger is rocked for flexing the cable about said rib and binding the cable between the trigger and said flange.

4. A cable clamp including a head substantially L-shaped in cross section and provided with a depending flange and an overhanging lateral flange having depending guide lugs at its ends to engage over a cable, said overhanging flange being provided medially with a transverse convex rib, and a trigger pivoted upon the depending flange of the head between the guide lugs and provided with a concave upper face of slightly greater radius than said rib and defining corners selectively engageable with the cable when the trigger is rocked for flexing the cable about said rib and binding the cable between the trigger and said overhanging flange.

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