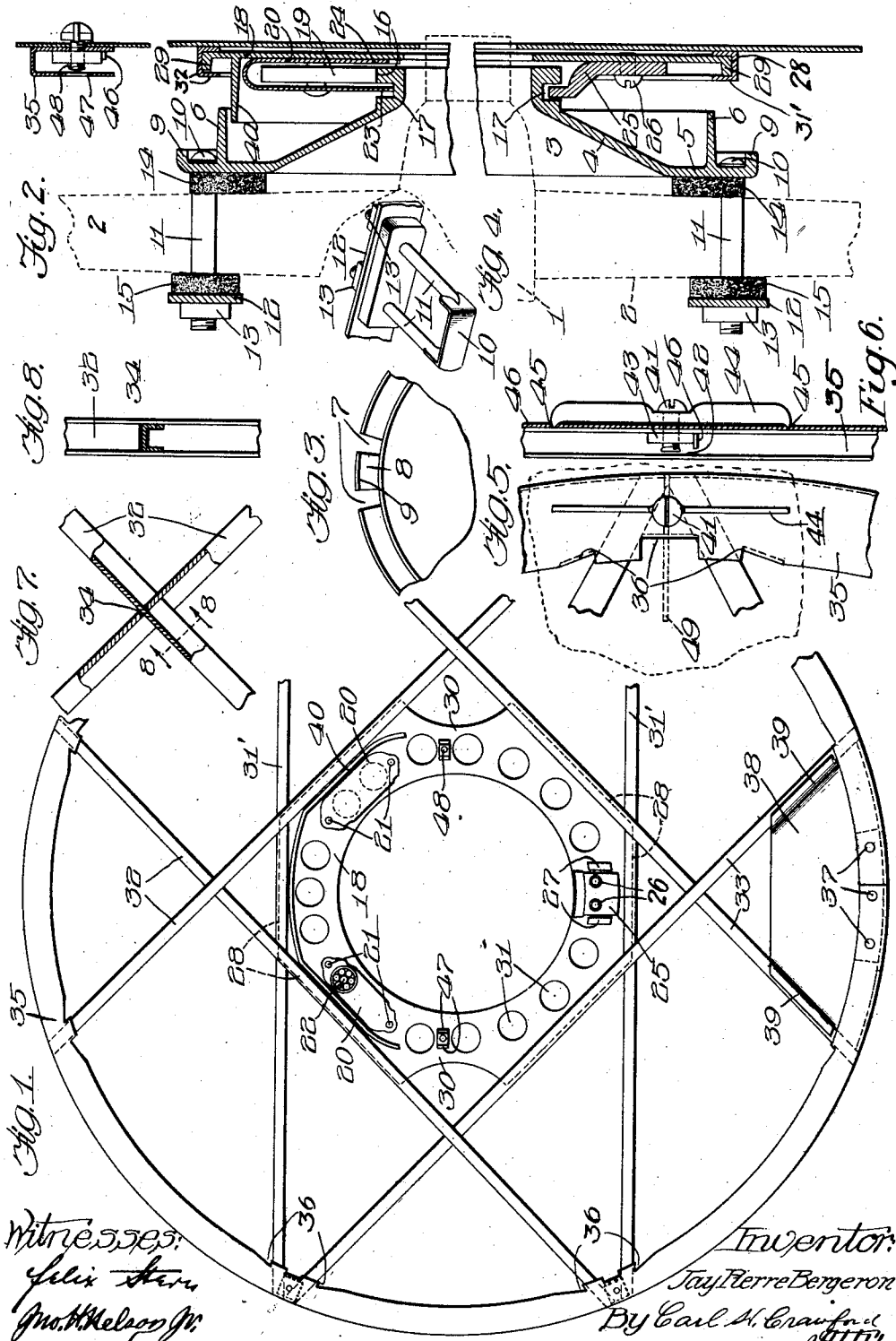


J. P. BERGERON.
 ADVERTISING DEVICE.
 APPLICATION FILED MAR. 4, 1910.

1,037,855.

Patented Sept. 10, 1912.



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UNITED STATES PATENT OFFICE.

JAY PIERRE BERGERON, OF TISKILWA, ILLINOIS.

ADVERTISING DEVICE.

1,037,855.

Specification of Letters Patent.

Patented Sept. 10, 1912.

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To all whom it may concern:

Be it known that I, JAY PIERRE BERGERON, a citizen of the United States, residing at Tiskilwa, in the county of Bureau and State of Illinois, have invented new and useful Improvements in Advertising Devices, of which the following is a specification.

This invention relates to improvements in advertising devices of that character adapted to be secured to the wheels of a vehicle and has for its principal object certain structural improvements in the embodiment disclosed in my application filed October 29, 1908, Serial Number 460,110.

In this embodiment of the invention a card supporting frame is formed of a plurality of reinforced members angularly disposed in interlocking relation with respect to each other in a manner to provide requisite rigidity and a substantially lighter construction, the arrangement involving a relatively less number of said members and a corresponding reduction of interlocking joints.

The invention includes an outer, preferably circular or annular member, and means for securing the ends of said reinforced members to said annular member in a manner to reduce first cost and facilitate assembling of the parts.

The invention also includes an improved form of card clamp or attaching device for attaching the card to said carrying frame.

The invention also includes other novel features and details of construction which will be more fully described in connection with the accompanying drawing and which will be more particularly pointed out in and by the appended claims.

In the drawing:—Figure 1 is a view in side elevation of the device illustrating one embodiment of my invention. Fig. 2 is a vertical sectional view thereof. Fig. 3 is a contracted side elevational view of the support adapted to be secured around the hub and to the spoke of the wheel. Fig. 4 is a detail perspective view of a portion of the support and one of the devices for securing the same to the spokes. Fig. 5 is a detail side elevation of one of the card clamps. Fig. 6 is an inside edge view thereof. Fig. 7 is a detail illustrating the manner of interlocking the inner members of the frame at the intersections of said members. Fig. 8 is a detail section of line 8—8 of Fig. 7.

Like characters of reference designate similar parts throughout the different figures of the drawing.

As shown, the hub of the wheel is indicated at 1 and the spokes thereof at 2. A support, indicated as a whole at 3 is secured to the wheel, preferably directly to the spokes thereof, and the same comprises as shown an annular member which surrounds the hub and which is so proportioned as to be wholly out of contact therewith thereby permitting the use of the device on wheels having hubs of large or small diameters. The support 3 includes a stiffening web or body portion 4 which is preferably inclined with respect to the vertical and which terminates in a vertical flanged portion 5 adapted to lie abreast of spokes 2. The flange 5 is preferably provided with an annular mud guard 6 which extends outwardly therefrom a suitable distance so as to intercept mud and dirt and prevent entrance thereof to movable parts of the device. At suitable spaced points the flange 5 is recessed at 7 to provide bolt openings and between the recessed portions radial lugs 8 project, or are formed, and said lugs are preferably provided with top portions 9 which slightly overhang the mud guards 6 and between which ends of the bolts are disposed and held.

U-shaped anchoring bolts are preferably employed to secure support 3 to the spokes 2 and the bases 10 of said bolts embrace the lugs 8 and lie between the mud guards 6 and the overhanging top portions 9. The shanks 11 project through the recesses 7 on opposite sides of the spokes and also through a clamping piece 12 at the rear of the spokes. Nuts 13 serve to tighten the bolts in place. In order to prevent injury to the spokes and to provide for a rigid anchorage thereto I preferably interpose strips of soft material, indicated at 14 and 15 between the spokes and flange 5 and between the spokes and clamping pieces 12.

The support 3 is provided with an annular track 16 on the inside of which is formed a groove 17.

A bearing member is indicated as a whole at 18 and preferably comprises a flat plate provided with suitable means whereby it may be supported on the track 16. As shown roller elements 19 are disposed at the rear of said bearing member and on opposite

sides of the vertical axis thereof and above the horizontal axis. Said elements 19 are disposed in casings 20 which are secured to the bearing member at 21. Each casing is preferably provided with two rollers the trunnions of which may be mounted on anti-friction ball bearings 22. The rear walls 23 of the casings preferably project into the groove 17 on one side of the track 16 and the outer walls 24 of said casings project downwardly abreast of the front face of the track 16 to securely hold the rollers 19 thereon. At the lower portion of said bearing member means, preferably in the form of a retaining finger 25, is provided and is secured to the bearing member at 26. The upper end of said finger projects into the groove 17 and serves to retain the lower portion of said bearing member in close relation to the support. In order to take the strain off of the screws 26 the bearing member is preferably provided with lugs 27 between which the finger 25 is disposed, the screws 26 merely serving to hold said finger 25 in place.

The bearing member 18, as shown, is provided with hexagonal supporting portions 28 which are preferably flanged at 29 to receive the reinforcing members constituting the card carrying frame and the hexagonal portions are so arranged and disposed that concaved and recessed portions 30 may be formed on opposite sides thereof for the dual purpose of reducing weight and permitting certain of the anchoring bolts to be attached from the front of said device. In order to further reduce the weight of said bearing member a plurality of openings 31 are formed therein.

The card carrying frame includes a plurality of reinforced members which are preferably of channeled formation in cross-section. The flanges of said members extend on opposite sides of the supporting portions 28 and the flanges 29 engage the bases or webs of said channeled members. In the form shown two horizontal members 31' are arranged in parallel relation and interlock with inclined members 32 and 33 in a manner to form a rigid card carrying frame which is effectively reinforced against "dishing." Each member or bar extends completely across the frame and at points laterally of the center of the frame so that each bar will, if the frame is circular, be slightly reduced in length with respect to the greatest diameter of the frame.

In order to effectively interlock the channel bars with each other the base or web of one channel is provided with an opening to permit an adjacent bar to extend there-through, the opening 34 corresponding to the cross-section of the bar. Inasmuch as all of the bars are of the same size the flanges of the bars provided with openings are sprung

or distended and the flanges of the bars projecting through said openings are contracted sufficiently to permit of assembling as shown in Figs. 7 and 8. In the arrangement shown each horizontal bar 31' interlocks with two inclined bars 32 and 33 respectively and said inclined bars interlock with each other at four points. This arrangement materially reduces the cost of forming the bars and distributes the interlocking joints in a manner to form a very rigid structure.

The outer annular member or rim 35 is of channeled formation in cross-section and is of sufficient width to receive the ends of said bars, as shown. Portions of the flanges of the rim or member 35 are bent inwardly as indicated at 36 to engage opposite sides of the ends of said bars and hold the same securely in place. The ends of said rim 35 are connected by bolts or rivets 37 and said rim 35 is so proportioned that its ends are brought together under constricting tension in a manner to reduce its diameter, thereby serving to tighten engagement between the ends of the bars and the portions 36 so as to prevent the same from rattling and to produce a rigid frame. In view of the fact that the card carrying frame is designed to be non-rotatable on its support I provide a weight 38 which extends into the channel of said member 35 and provides a body through which the bolts or rivets 37 may be passed. The weight 38 may be provided with flanges 39 embracing the lower ends of the bars 33.

A segmental mud guard 40 may be mounted upon the bearing member 18 in a manner to extend within and underlap the mud guard 6. The mud guard 40, as shown, merely extends laterally of the vertical center a sufficient distance to cover the casings 20.

The devices for securing the card upon the frame may consist of screws 41 passing through the outer flanges of the part 35 and loosely fitting in openings therein, and clamps 44 retained by said screws. The clamps and screws are designed to be non-separable from the frame. A nut 43 is provided for each screw 41 and is disposed between the flanges of the part 35 and is held non-rotative therein by a suitably turned in portion 46 of the outer flange of the part 35. The inner flange of the part 35 is provided with an opening 47 to permit the end of the screw 41 to be upset or otherwise mutilated, as at 48, so that the screw 41 cannot be turned out of engagement or detached from the nut 43, the screw 41 being upset after the nut 43 is disposed thereon. The clamps 44 are long and thin so as not to conceal the matter disposed upon the reading face of the card and the outer ends of the clamps 44 are provided with sharp projections 45 arranged to pierce the card and hold the same in place. In view of the fact

that the clamps are non-separable I provide the card with a radially disposed slit 49, as clearly shown in Fig. 5, so that the clamps 44 can be turned at right angles to their full line position to permit the slitted portion of the card to be forced over and under the clamps. The clamps are thereafter turned at right angles to the slits and the screws 41 are tightened to force the sharp ends 46 into the card.

I claim:—

1. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel provided with a track, a bearing member having rollers engaging said track to suspend said member on said support, retaining means on said member engaging said support, and a card supporting frame on said bearing member comprising a plurality of intersecting ribbed bars angularly disposed with respect to each other and arranged in interlocking relation.

2. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel, said support being provided with a track, a bearing member having rollers engaging said track to suspend said member on said support, a card supporting frame on said bearing member comprising a plurality of bars, and an outer member surrounding said bars and provided with integral means engaging the bars to hold the latter fixed relatively to the outer members.

3. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel, said support being provided with a track, a bearing member having rollers engaging said track to suspend said member on said support, a card supporting frame on said bearing member comprising a plurality of bars, and an annular member of channeled cross-section surrounding and embracing said bars and having inturned portions in locking engagement with said bars.

4. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel, a bearing member rotatively mounted on said support, a card supporting frame on said member, an annular strip of channel iron surrounding said frame, a weight disposed at the ends of said channel iron, and means extending through

said weight and channel iron for securing the ends of the latter.

5. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel, a bearing member rotatively mounted on the support, a card supporting frame on said bearing member comprising a plurality of bars, and an outer member of channel cross-section embracing the ends of said bars and having inturned portions engaging the same, and means connecting the ends of said outer member and contracting the same to prevent the parts from rattling.

6. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel, a bearing member rotatively mounted on said support, a card supporting frame on said bearing member comprising a plurality of bars, an outer member engaging the ends of said bars, and a weight for said frame engaging said outer member and certain of said bars.

7. The combination with a vehicle wheel, of an advertising device comprising a support on the wheel, a bearing member rotatively mounted on said support, and a card supporting frame comprising a plurality of bars mounted on said support, certain of said bars being disposed in parallel relation with respect to each other and the remaining bars being angularly disposed with respect to each other and with respect to said parallel bars.

8. In an advertising device for vehicle wheels, a skeleton card supporting frame having means for supporting it on a wheel to permit the wheel to rotate relatively to the frame and having means to attach a card thereto, said frame comprising a central member having an opening for the wheel hub, a rim and spaced members interlocked with and connecting the central member and rim, the rim consisting of a continuous piece of material the ends of which are brought together and fastened under constricting tension whereby the frame parts are fixed rigidly together.

In testimony whereof I affix my signature in presence of two witnesses.

JAY PIERRE BERGERON.

Witnesses:

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