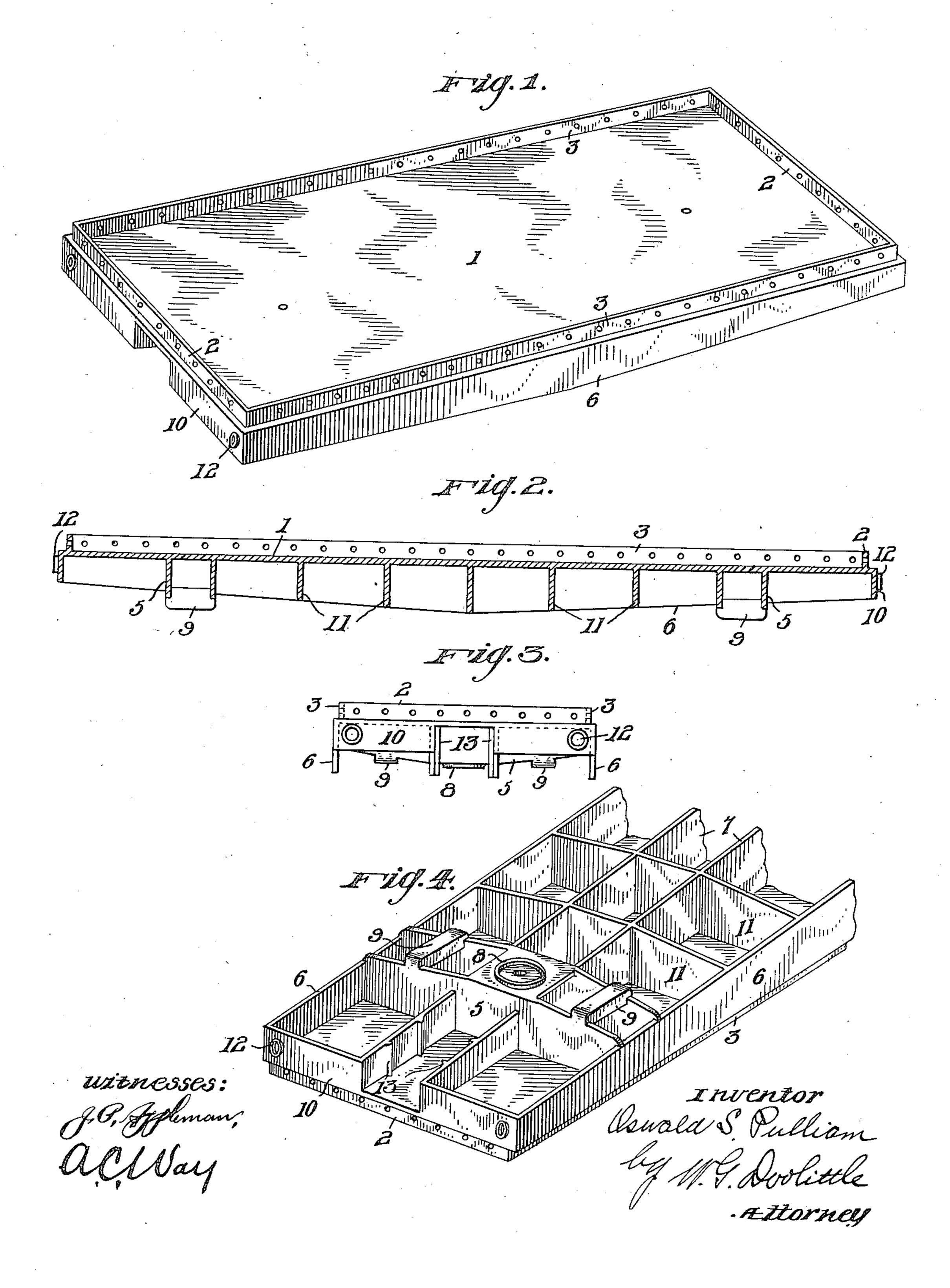
## O. S. PULLIAM. CAR BODY AND UNDERFRAME CONSTRUCTION. APPLICATION FILED JULY 17, 1909.

999,256.

Patented Aug. 1, 1911.



## UNITED STATES PATENT OFFICE.

OSWALD S. PULLIAM, OF PITTSBURG, PENNSYLVANIA, ASSIGNOR TO PITTSBURGH EQUIPMENT COMPANY, OF PITTSBURG, PENNSYLVANIA, A CORPORATION OF PENN-SYLVANIA.

CAR BODY AND UNDERFRAME CONSTRUCTION.

999,256.

Specification of Letters Patent.

Patented Aug. 1, 1911.

Application filed July 17, 1909. Serial No. 508,242.

To all whom it may concern:

Be it known that I, Oswald S. Pulliam, a resident of Pittsburg, in the county of Allegheny and State of Pennsylvania, have in-5 vented certain new and useful Improvements in Car Body and Underframe Construction, of which the following is a specification.

The prime object of my invention is to 10 provide a steel body and underframe for cars, locomotive tenders and the like, formed

as an integral cast-metal structure.

In the accompanying drawing, which illustrates an application of my invention, 15 Figure 1, is a perspective view of a carbody and its underframe constructed in accordance with my invention. Fig. 2, a central longitudinal sectional view; Fig. 3, an end view; and Fig. 4, an inverted broken 20 perspective view particularly showing the underframe.

As illustrated and as preferred, the carbody and its underframe are formed of a single steel casting. This integral construc-25 tion is equally applicable to a locomotive

tender-body, not shown.

Referring to the drawing, 1 designates the car-body floor, 2 end-walls, and 3 side-walls. In the embodiment of my invention as 30 shown by the drawing both the end and side-walls extend upwardly from the floor for only a short distance, but it is evident that the height of said walls may be greatly increased.

If desired, a portion of the side and endwalls of the car-body may be formed of separate plates secured to the integral walls 2 and 3, and in the form shown, I have provided holes for the purpose of permitting

40 plates to be riveted thereto.

Formed on the underside of the floor 1 are two body-bolsters 5, and depending from the floor and extending longitudinally of the car-body are side-sills 6 and center-sills 7.

45 As illustrated the body-bolsters are each formed with center-plates 8 and side-bearing members 9, but these parts may constitute separate members and be suitably secured to the bolsters.

In addition to the side and center-sills, as

shown, I provide integral end-sills 10 and laterally extending members 11 connecting the side and center-sills. The end-sills may be formed with push-pockets 12 and the ends of the center sills are preferably formed 55 with lugs 13.

The car-body and its underframe is designed to be carried on two trucks, not shown, and the dimensions of the parts may of course be varied to suit different conditions. 60

What I claim is:

1. A car-body and underframe construction consisting of an integral cast-metal structure comprising a floor, car-body endwalls, car-body side-walls, underframe end- 65 sills, and underframe side-sills.

2. A car-body and underframe construction consisting of an integral cast-metal structure comprising a floor, car-body endwalls, car body side-walls, underframe end- 70 sills, underframe side-sills, and a body-

bolster.

3. A car-body and underframe construction consisting of an integral cast-metal structure comprising a floor, a laterally ex- 75 tending and upwardly projecting member constituting a portion of a car-body endwall, a longitudinally extending and upwardly projecting member constituting a portion of a car-body side-wall, an under- 80 frame end-sill, and an underframe side-sill.

4. A car-body and underframe construction consisting of an integral cast-metal structure comprising a floor, a laterally extending and upwardly projecting member 85 constituting a portion of a car-body endwall, a longitudinally extending and upwardly projecting member constituting a portion of a car-body side-wall, an underframe end-sill disposed in a different vertical 90 plane than the laterally extending member, and an underframe side-sill disposed in a different vertical plane than the longitudinally extending member.

In testimony whereof I affix my signature 95 in presence of two witnesses.

OSWALD S. PULLIAM.

Witnesses:

A. C. WAY, W. G. DOOLITTLE.