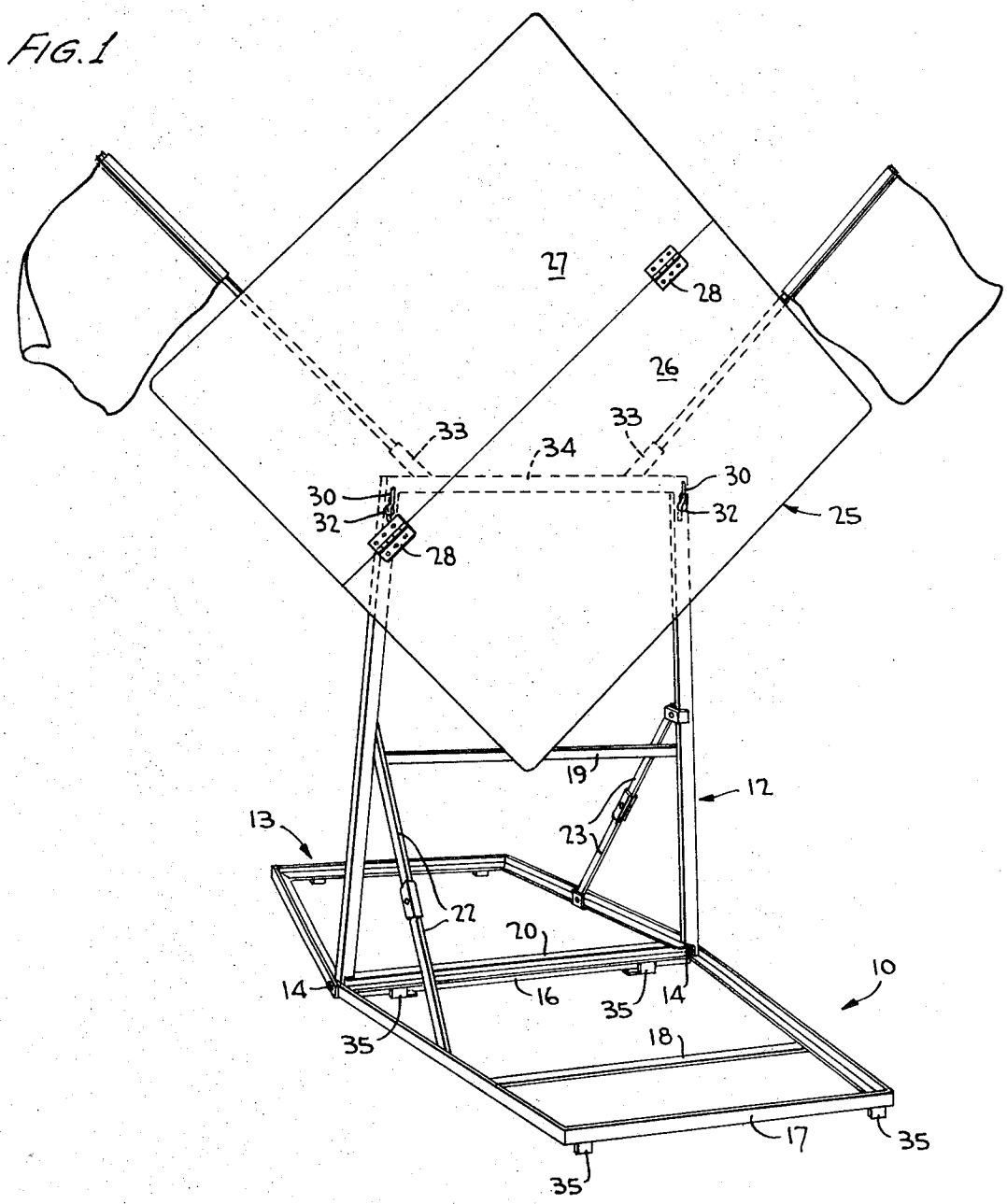
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PORTABLE ROAD SIGN UNIT

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FIG. 1



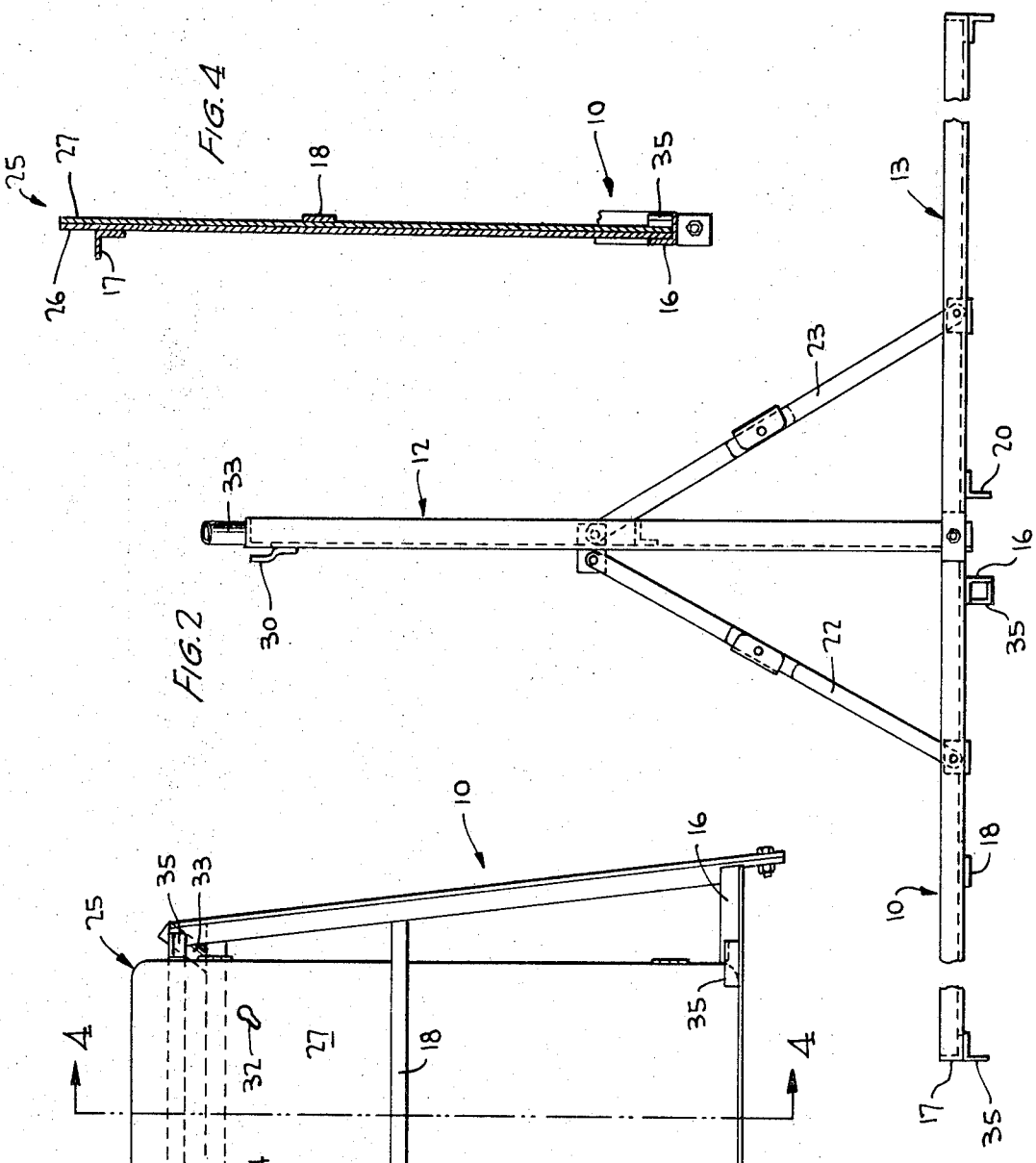
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PORTABLE ROAD SIGN UNIT

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U.S. Cl. 40—125 2 Claims

ABSTRACT OF THE DISCLOSURE

A portable road sign unit having three trapezoidal frames, the bases of said frames being pivotally connected on a common axis, so that when collapsed for transport the frames occupy substantially a common plane in juxtaposed relation to form a generally flat package, and when in use two of the frames extend in opposite directions from the said axis, resting flat on the ground, and the third frame occupies an erect position in which it is retained by toggle links or elbow struts connected between the third frame and each of the other two frames. Means are provided in the collapsed condition of the frames to receive a road sign within the flat package; in the extended position of the frames, means are provided to rigidly support and display the sign.

This invention relates to a portable road sign unit comprising a support which may readily be extended to mount for display a road sign of conventional size and shape, and as readily collapsed into a substantially flat structure for transport or storage. The road sign is preferably formed in separate portions, hinged together, so that its area may be reduced by folding, for reception within the collapsed support.

It is an object of the invention to provide a simple but sturdy support structure, capable of extension for use and collapse for transport with a minimum of effort, on which a road sign may be either mounted for display or assembled for storage. Preferably flag sockets, aiding in the support of the sign, are also provided.

Further objects and features of the invention will be apparent from the following description, taken in connection with the accompanying drawings, in which:

FIG. 1 is a view in perspective of a road sign unit embodying the invention, with the support extended and the sign displayed;

FIG. 2 is a side elevation of the support structure shown in FIG. 1;

FIG. 3 is a front elevation showing the support frames collapsed and the sign folded and stored; and

FIG. 4 is a section on the line 4—4 of FIG. 3, taken through the front frame and the stored sign only.

As shown in FIG. 1, the support comprises three trapezoidal frames, a front frame **10**, a back frame **13**, and a middle frame **12**. The frames are of comparable, although not necessarily equal, dimensions, and are pivoted together on a comon axis by bolts **14**, one at each side of the structure. Actually, the three frames require only one common base member, a transversely extending bar or strut **16** secured at its ends to the lateral members of front frame **10** adjacent the pivotal axis of the three frames. For added strength, however, back frame **13** may also be provided with a base member **20**, extending transversely and located adjacent the pivotal axis of the frames.

Further transversely extending bars or struts **18** and **19** are secured at their ends to the lateral members of front frame **10** and middle frame **12** respectively at points intermediate the length of the frames. In addition to stiffening the frames **10** and **12**, bars **18** and **19** perform other functions hereinafter described.

The frame members thus far described are preferably of ferrous metal and L-shaped in section. Securing of the several frame members is best achieved by welding.

The three frames are held in operative relation for the display of a road sign by conventional elbow struts or toggle links. A pair of such struts or links **22**, pivoted to each other, is pivotally connected between the front and middle frames at one side, and a second pair **23** similarly extends between the back and middle frames at the other side. When the struts are extended as shown in FIGS. 1 and 2, the middle frame is held rigidly in an erect position, while the front and back frames are flat on the ground. When the struts **22**, **23** are collapsed, the three frames may be swung about their pivotal axis and folded together, as shown in FIG. 3.

A sheet metal road sign **25** of generally rectangular shape formed of separate elements **26** and **27** hinged together at **28**, is provided with an appropriate legend (omitted in the drawings), such as "Men Working". Hooks **30** welded to the forward face of the middle frame **12** at each side of the latter are dimensioned for reception in keyhole apertures **32** in sign **25**. When the sign is so supported, it is prevented from swinging by engagement of its lower corner with strut **19** and by engagement of its upper portion with sockets **33**, welded to member **34** of middle frame **12**. Sockets **33** project above the middle frame and thus effectively prevent swinging of the upper portion of the sign in a rearward direction. The sockets may receive flags, commonly used in conjunction with road signs, and thus perform a dual function.

To prepare the structure for shipment or storage, sign **25** is lifted off hooks **30** and folded flat with elements **26** and **27** in face-to-face relation, thereby reducing the area of the sign to one-half its displayed area. The elbow strut **22** is then collapsed and the front frame **10** is swung upwardly to an erect position. The folded sign is then slid downwardly in front of member **17** of front frame **10** and in back of strut **18** of frame **10** until the lower edge of the sign seats on strut **16**, as shown more particularly in FIGS. 3 and 4.

Guide lugs **35** welded to the ends of frame **10**, i.e., to frame member **17** and strut **16** at each side, prevent lateral displacement of the inserted sign. The crating of the sign is then completed by collapsing elbow strut **23** and folding back frame **13** against the other two frames to form a flat, readily transportable package within which the road sign is securely held.

To promote an understanding of the principles of the invention, the preferred embodiment illustrated in the drawings has been specifically described. It is not intended, however, to exclude by specific language such alterations and modifications of the illustrated embodiment as would occur to those skilled in the art to which the invention relates.

We claim:

1. A portable road sign unit comprising three trapezoidal frames having their bases pivotally connected on a common axis, whereby said frames may be folded together to form a flat package for transport or storage or swung apart so that two of said frames may rest flat on the ground, extending in opposite directions from said axis in coplanar relation, and elbow struts pivotally connected between the third frame and each of the remaining two frames, the length of said elbow struts being such that when extended they retain said third frame in generally

erect position, a road sign, and coacting means on said sign and said third frame to removably mount said sign on said third frame for display.

2. A portable road sign unit as claimed in claim 1 in which said sign is hinged for folding, and in which said coacting means mounts said sign in opened position for display on said third frame and in which one of said frames is provided with means for receiving said folded sign in face-to-face relation following disengagement of said coacting means, said last named frame engaging both the front and rear face of said sign to retain the sign against unintentional displacement when so received, for transport or storage of the entire unit, including said sign, as a substantially flat package.

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