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EASELS

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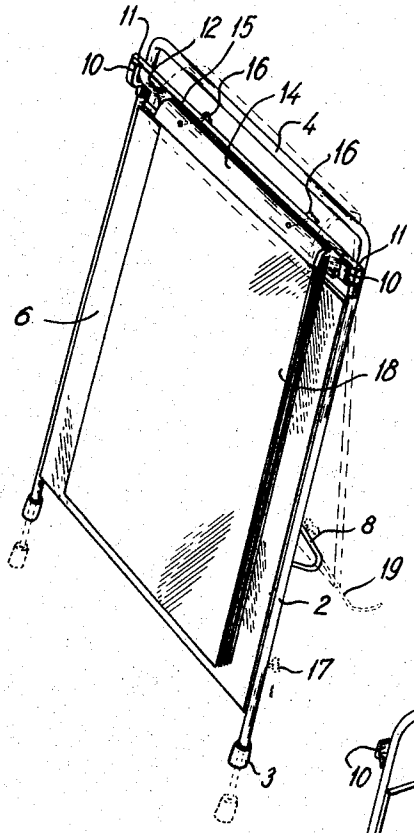


Fig. 1.

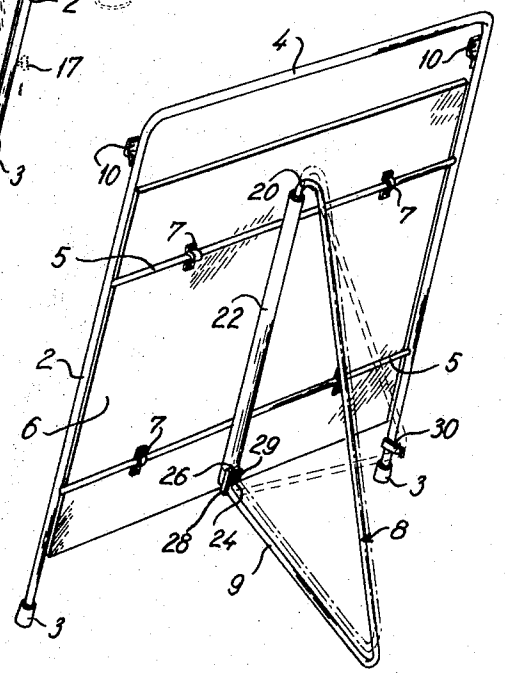


Fig. 2.

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ABSTRACT OF THE DISCLOSURE

The invention relates to an easel having an easily movable base plate and means for releasably holding a cross bar holding a bunch of paper sheets containing the informative material to be demonstrated. The invention specifies the manner in which the cross bar holds the paper and is held releasable on the said base plate.

The present invention relates to a teaching or illustrating device of the easel type, comprising an upright frame having adjacent the top thereof means for releasably holding the top portion of a pad of paper sheets hanging down therefrom. The paper sheets are prepared with the desired informative matter, and during a lecture or address the lecturer may show the different illustrations to the audience by successively swinging the single sheets over the top edge of the frame and down at the rear side of the frame to thereby uncover the next paper sheet in the pad.

Usually, each pad of paper sheets contains illustrative matter for a specific lecture object, and thus it is desired to have a possibility of archivating the different pads. Furthermore, the frames should be easily movable.

One object of the present invention is to provide an easel in which means are provided for facilitating the operation of interchanging different sheet pads in the frame.

A further object of the invention is to provide an easel in which the holding means referred to are adapted to cooperate with separate suspension means for the top edge of the sheet pad in order to make the suspension means including the paper sheets easily releasable from the holding means and correspondingly easily mountable in and removable from the archives.

Still a further object of the invention is to provide an easel in which the suspension means are of simple and cheap construction and designed to cooperate with correspondingly simple holding means on the frame and simple carrying means in the archives.

A still further object of the invention is to provide an easel adapted to stand on a surface such as a table in a stable manner, the frame being provided with a stay leg which is easily moved between a completely stable stay position and a position in which it is packed together with the frame in order to allow the frame including the stay leg to be tightly packed for transport and storage.

Another object of the invention is to provide an easel, the supporting legs of which—including the stay leg—are adjustable in order to allow the holding means for the sheet pad to assume a desired height above the supporting surface.

These and other objects and advantages will appear from the following description, reference being made to the accompanying drawing, in which:

FIG. 1 is a perspective view of a preferred embodiment of an easel according to the present invention, seen from the front side, and

FIG. 2 is a corresponding view of the easel seen from the rear side.

The easel shown in the drawing comprises a frame **2** having a transverse top portion **4** and a pair of cross rods **5** (FIG. 2). The lower ends of the frame **2** are provided with tip cups **3**. A plate member **6** is mounted inside the

frame by means of mounting bows **7** around the cross rods **5**. A vertical middle tube **22** is secured by welding to the cross rods **5**. In this rod a triangular stay member **8** is mounted in the manner to be described below.

Adjacent the top portion **4** the frame **2** is at each side provided with carrying brackets **10** adapted to releasably receive laterally protruding portions **11** of a cross rail or plate **12**. Preferably the brackets **10** are made from resilient material such as spring steel and dimensioned so as to hold the rail portions **11** pressed against the frame portions therebehind.

The cross plate **12** is at the front side thereof provided with a clamping member **14** having an upper edge portion **15** bent inwardly to engage the front surface of the plate member **12**. To the clamping member **14** there is secured a pair of bolts extending rearwardly through holes in the plate **12** and adjacent the rear side thereof provided with finger screws **16**. It will be understood that the clamping member **14** will be tilted around its upper edge and drawn towards the plate **12** when the screws **16** are tightened. Between the clamping member **14** and the plate member **12** there is inserted the top edge portion of a pad **18** of paper sheets or sheets of another suitable material capable of having written, printed, formed or otherwise deposited thereon such informative characters, pictures, etc., that are wanted to be shown to an audience. The sheet pad **18** is tightly clamped to the plate **12** by means of the clamping member **14**.

In use the easel is placed on a surface such as a table with the front side of the sheet pad facing the audience. When the lecturer has shown the audience the illustrations on the first sheet he can show the next sheet simply by turning the first sheet over the top portion **4** of the frame **2** as indicated with dotted lines in FIG. 1. In this manner he can successively uncover and expose all the sheets.

After the use the entire pad **18** of information sheets may be lifted up from the brackets **10** together with the plate and clamp members **12** and **14**, and this unit may thereafter be placed in holding means in an archive among other similar units. Due to the laterally protruding portions **11** of the plate **12** the unit may simply be hanged crosswise on two parallel rails in the archive, so that no special installation apart from two ordinary rods will be required for this purpose. In order to guide the units on such rods in the archive the underside of the portions **11** may advantageously have a configuration corresponding to the cross section of the upper part of the rods, for example a round recess for resting on a cylindrical rod in an archive. It will be noted that the sheet pads may be easily put down and taken up between such a pair of archive rods.

The plate **6** between the side portions of the frame **2** is preferably made as a so called flannel table, i.e. a plate surface covered by flannel or a similar material enabling cut out pieces of felt or similar material to be held on the flannel surface when pressed thereagainst even in vertical position of the table. Such tables per se belong to the known art, but it will be appreciated that the use in an easel of such a table as a backing means for the sheet pad is particularly advantageous since the easel may then be used alternatively as a flannel table, i.e. there will be no need for schools etc. to procure special flannel table units when they work with easels according to the invention.

The stay member **8** has a triangular form, one side **20** of which is mounted slidable and turnable in the tube **22** referred to herein before. The stay member side **20** preferably consists of the outer ends of a rod from which the stay member is made by bending the rod, said end extending some distance into both ends of the tube **22**.

Adjacent its lower end the tube **22** is provided with a vertical slot **24** of a breadth corresponding to the thick-

ness of the stay member rod. Along the edges of this slot there is mounted a bent edge rib **26** having branch **28** extending downwardly beyond the end of the tube **22** and an opposite branch **29** extending a shorter distance down from the top edge of the slot **24**. When the stay member side **20** is assuming a lowermost position on the tube **22**, wherein the top bend of the stay member **8** rests against the top edge of the tube **22**, the lower side **9** of the stay member is situated beneath the lower edge of the tube **22** and beneath the lower end of the rib branch **29** but in level with the lower end portion of the rib branch **28**. In this position which is shown in full lines in FIG. 2 the stay member **8** will be free to be swung around the side **20** out to a position shown in dotted lines in which it may be releasably arrested by means of a spring member **30** secured to the frame and cooperating with the outer bend of the stay member. In this position the stay member is situated quite close to the plane of the frame so that the easel will have small space requirements when stored or transported.

When the easel is wanted to be used the stay member **8** is pulled out of engagement with the spring member **30** and swung outwardly until it is stopped by the rib branch **28**. From this position—again corresponding to the position shown in full lines—the stay member **8** is lifted up to the position shown in dot-and-dash-lines in which the lower stay member portion **9** is lifted up into the slot **24**. This lifting may be caused simply by placing the easel in the desired position on a table and letting it tilt slightly backwardly whereby the stay member will automatically be lifted in the tube **22**. It will be seen that the stay member will be completely stable in this last mentioned position of use, since it will be locked between the two rib portions **26** and **29** as long as the easel is standing on the table. However, it is easy to release from this position as soon as the outer end of the stay member is lifted from the table.

This arrangement is very simple to operate, cheap to manufacture, and durable in use. The tube **22** need not necessarily have a slot **24**, since it may end adjacent the upper portion of the rib member **26** as indicated by a dotted line, whereby the slot **24** will be formed by the rib branches **28** and **29** extending downwardly from the end of the tube **22**.

The side portions of the frame **2** may consist of tubes enclosed therein a downwardly protruding rod carrying at its outer end the tip cup **3**. Screws of which one is shown in dotted lines in FIG. 1 and designated with **17** may serve to hold the rods in a desired position in the frame **2**, whereas the rods as shown in dotted lines in FIG. 1 may be pulled out telescopically from the frame and fixed in any position by means of the screws **17** so that the frame may be height adjusted relatively to its supporting surface. A similar arrangement may be provided in the rear part of the stay member **8**, where a rod **19** shown in dotted lines in FIG. 1 may be pulled telescopically out from the rear stay member branch through a hole situated in alignment with an interior cylindrical passage therein. Since also the lower branch of the stay member is inclined, the arrangement may alternatively be provided with this branch.

I claim:

1. An easel comprising a plate member having supporting means for standing on a base surface in a substantially vertical position and bracket means located at each side of said plate member adjacent the top thereof, said brackets having a substantially horizontally protruding bottom portion and a front portion extending upwardly from the outer end thereof, a cross bar having a substantially plane front side being removably supported in said brackets by resting with the lower surface of opposite end portions on said bottom portions of said brackets, said cross bar being provided with protruding surfaces facing opposite side edges of said brackets respectively in order to prevent substantial lateral displacement of said cross bar in said brackets, said cross bar further being provided with an elongated paper holding rail having a plate portion and a backwardly protruding rib located adjacent the upper edge of said plate portion, the rear edge of said rib engaging said front surface of said cross bar, a number of clamping bolts being interposed between said cross bar and said paper holding rail in the space between said rib and the lower edge of said plate portion of said paper holding rail so as to enable said lower edge to be pressed against the top edge portion of a bunch of paper sheets inserted between said cross bar and said paper holding rail underneath said clamping bolts in response to these bolts being tightened.

2. An easel in accordance with claim **1** which includes a substantially U-shaped tubular frame member, having a transverse upper portion, said plate member being secured to said U-shaped frame member at a position spaced from said transverse upper portion, said bracket means being affixed to said frame member at locations between said transverse upper portion and the top of said plate portion, and which includes a triangular stay member swingably mounted at the rear of said plate portion and being swingable from a position flat against said plate portion to a position perpendicular to said plate portion for erection of said easel.

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