United States Patent

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[72] Inventor **Donald L. Wilkerson**
739 Lily Flagg Drive, Huntsville, Ala. 35802

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[54] **TROLLING MOTOR MOUNTING BRACKET**
6 Claims, 3 Drawing Figs.

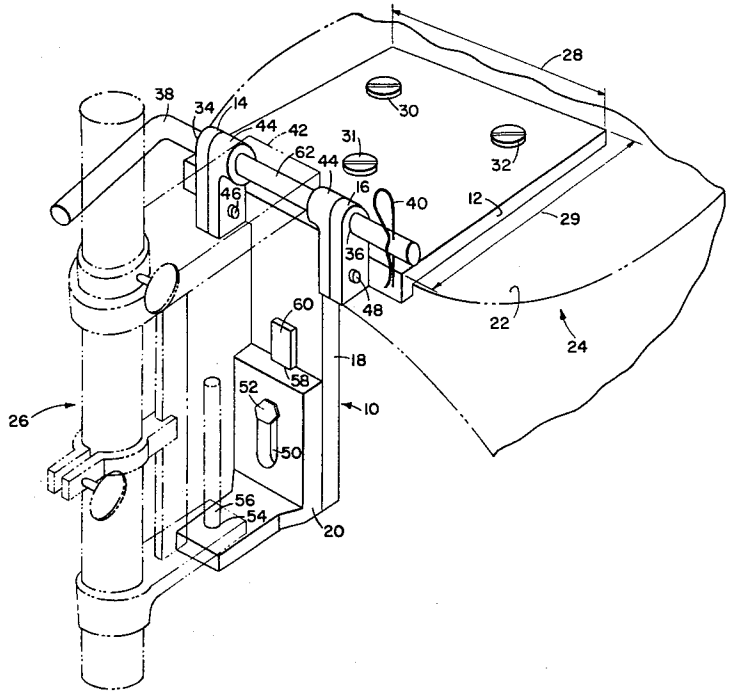
[52] **U.S. Cl.** **248/4,** 115/17
[51] **Int. Cl.** **B63h 21/26**
[50] **Field of Search** 248/4, 291; 115/18, 17

[56] **References Cited**
UNITED STATES PATENTS

871,459	11/1907	Thorsen	248/4 X
2,429,774	10/1947	Schultz et al.	248/4 X
3,269,351	8/1966	Shimanckas	115/18
3,424,412	1/1969	Gayle	248/4

Primary Examiner—J. Franklin Foss
Attorney—C. A. Phillips

ABSTRACT: A trolling motor mounting bracket adapted to be permanently affixed to a boat and adapted to pivotally mount a trolling motor outboard of the boat whereby the trolling motor may be raised to a horizontal stored position or lowered to a vertical drive position. The bracket also permits the mounting of various-dimensioned trolling motors to the boat.



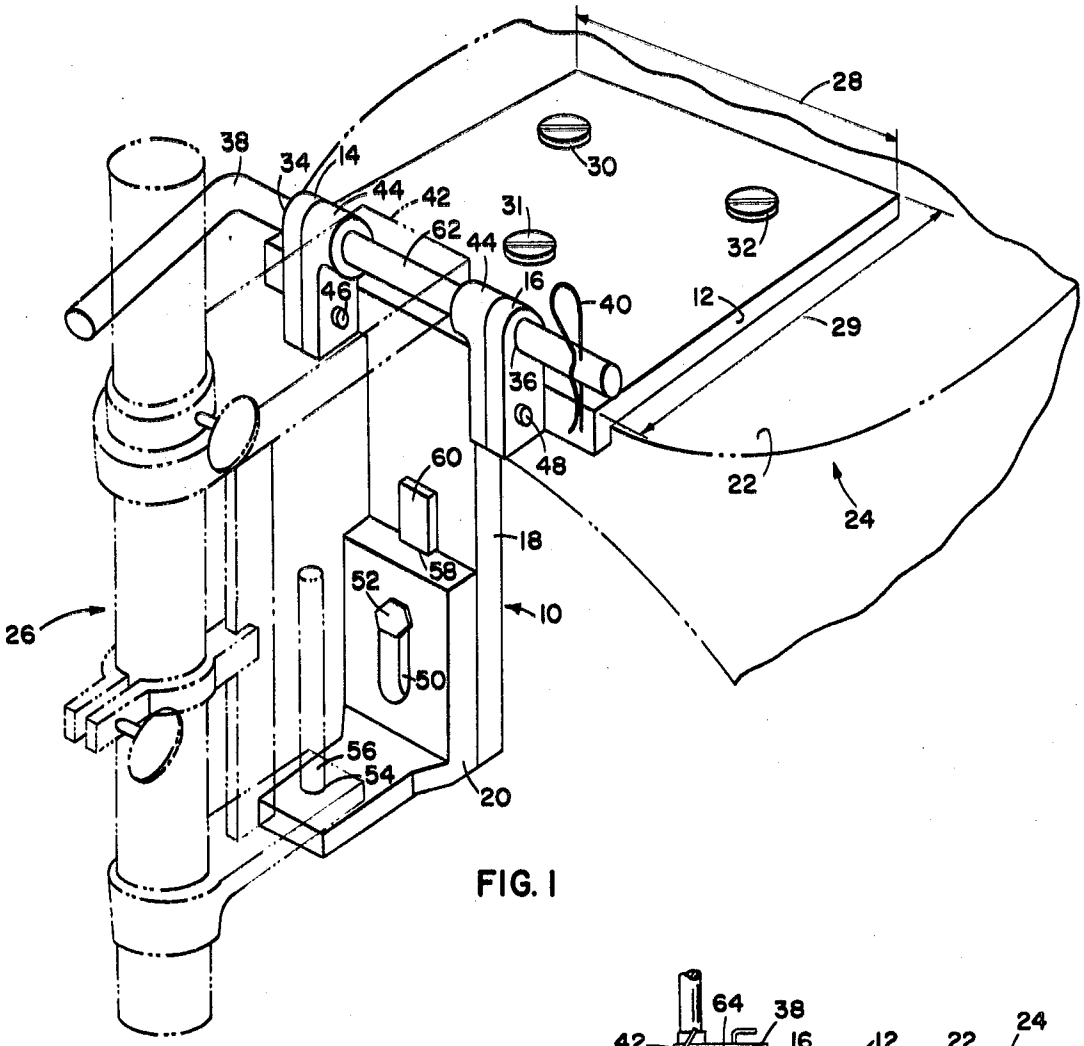


FIG. 1

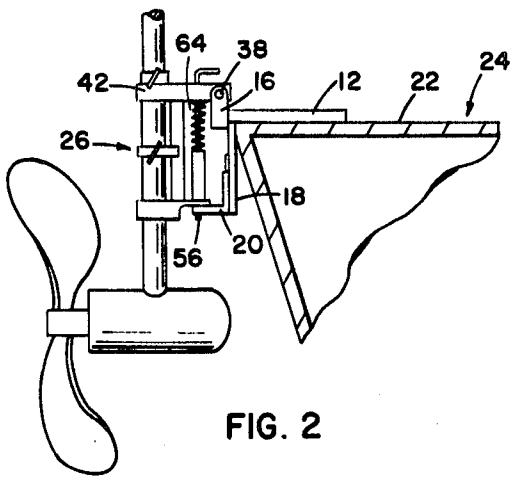


FIG. 2

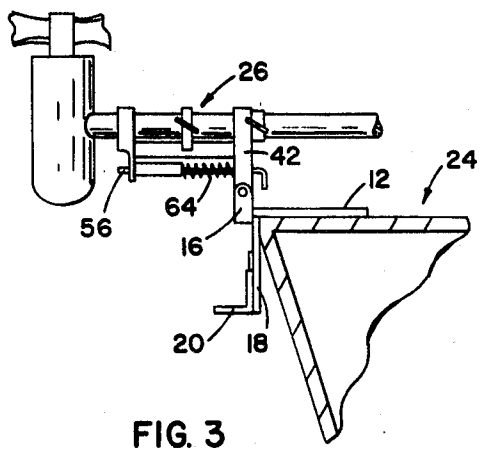


FIG. 3

Donald L. Wilkerson,
INVENTOR.

BY
E. A. Phillips
ATTORNEY.

TROLLING MOTOR MOUNTING BRACKET

This invention relates to mounting means for auxiliary electric outboard motor drive units, generally referred to as trolling motors, and commonly used by fishermen to propel a small boat at low speeds.

Auxiliary electric outboard motor drive units of this type typically comprise: an electric outboard motor of the submersible type having a propeller mounted on the projecting end of the drive shaft of the motor, and a vertically elongated pipe having its lower end connected to the motor, its upper end provided with a steering handle, and its intermediate portion secured by some type of mounting means. The mounting means included with the drive unit usually include a horizontally drilled arm or sleeve for swivel mounting to a boat bracket and a vertically movable pin for locking the drive unit in a vertical, drive position, to the boat bracket.

Trolling motors are made by perhaps 20 or more manufacturers and there are, of course, dimensional and structural differences between makes. Accordingly, a boat manufacturer or boat distributor, must, or should be able to provide a mounting bracket adaptable to mount any or most of the different trolling motors to a given motor.

This invention has as an object to provide a mounting bracket for trolling motors which is rugged but of simpler design than other known types. A further object of this invention is to provide a bracket which is substantially universal in application to, that is, is adaptable to mount trolling motors of a number of designs and dimensions.

These objects of my invention are met by a bracket constructed as follows:

A. a mounting plate is made of metal and of sufficient size to be securely attached horizontally to the gunwale of a boat,

B. two parallel arms extend outward from an edge of the plate, which edge conforms the outer edge of the gunwale on which the plate is mounted. These arms also extend upward and include aligned openings which are adapted to receive a shaft which in turn supports the trolling motor,

C. a vertical leg is securely attached to the outer edge of the mounting plate and it extends downward to provide support for

D. an outwardly extending arm which has a vertical recess for receiving a retractable locking pin from the trolling motor to lock the motor in a vertical, or drive position or, to allow the motor to be swung back to a horizontal, or stored position.

These and other objects, features and advantages of the invention will become more apparent from the following description when considered together with the drawings in which:

FIG. 1 is a perspective view of an embodiment of the invention coupling a boat and trolling motor;

FIG. 2 is a side elevation view with the trolling motor in a vertical, or drive position; and

FIG. 3 is a side elevation view with the trolling motor in a horizontal, or stored position.

Referring now to the drawings, the complete bracket shown is designated by the numeral **10**. It consists basically of horizontal plate **12**, shaft-supporting arms **14** and **16**, vertical leg **18** and L-shaped arm **20**. As shown, bracket **10** is mounted on the gunwale **22** of boat **24** and it supports trolling motor **26**.

Plate **12**, arms **14** and **16** and vertical leg **18** are typically constructed of a single casting e.g. of aluminum. Plate **12** is rectangular and of approximately equal width and length, e.g. 5 inches in length along edge **28** and 4¼ inches in width along width **29**. Good rigidity with this configuration is obtained with a thickness of about three-eights inch. Bracket **10** is attached to boat **24** by bolts **30**, **31** and **32** through holes drilled through plate **12** and gunwale **22**, at the time of installation.

Shaft-supporting arms **14** and **16** extend outward and upward and include horizontal holes **34** and **36** which are aligned to receive L-shaped shaft **38** which supports motor **26** on bracket **10**. Pin **40** provides a safety latch to secure shaft **38** in place. To accommodate different widths of mounting arms **42**, selected width bushings **44** are attached, when needed, by bolts **46** and **48** to arms **14** and **16**, respectively.

L-shaped arm **20** includes a slot **50** through which locking bolt **52** is passed into vertical leg **18** and in this manner arm **20** is supported at the proper elevation to receive in hole **54**, locking pin **56** of motor **26**. Movement of arm **20** is restricted to vertical movement by slot **58** which meshes with ridge or raised surface **60** on leg **18** to thus maintain positional alignment of hole **54** with a pin **56**.

To install motor **26**, shaft **38** is removed, hole **62** of arm **42** of motor **26** is aligned with holes **34** and **36** and shaft **38** reinserted as shown. In the resting or storage position, motor **26** is laid back in a generally horizontally position as shown in FIG. **3**. Next, bolt **52** is loosened and L-shaped arm **20** moved to its lowermost position. Motor **26** is then tilted to a vertical position and arm **20** moved up until locking pin **56** passes into hole **54**. This thus determines the position for arm **20**, and bolt **52** is tightened with the result that motor **26** is ready for use as shown in FIG. **2**.

To move motor **26** from an operating position, pin **56** is raised against spring **64** out of hole **54** and the motor tilted forward until it rests in the position shown in FIG. **3**. Of course then to remove motor **26** from bracket **10** it is only necessary to remove pin **40** and shaft **38**.

Bracket **10** thus provides in a simple but rugged structure a trolling motor mounting bracket which is easy to install and use and which accommodates a number of different-type motors wherein arm **42** may vary in size and the vertical position of pin **56** may vary. Experience indicates that the configuration is adaptable to take care of most trolling motors now available. Once arm **20** is set and bushings **44** positioned (if needed), no further adjustments are necessary when mounting or dismounting a given motor.

What is claimed is:

1. A bracket for mounting an electric outboard motor drive unit on a boat and for accommodating said drive unit in either a drive position, wherein it is submerged, or in a storage position, out of the water, comprising:

A. a mounting plate adapted to be horizontally mounted on the gunwale of a boat and including an edge adapted to be positioned adjacent an outer edge of the gunwale;

B. first and second arms mounted on said edge of said mounting plate, said arms being spaced apart and extending in a generally parallel relation outward and upward from said mounting plate and gunwale, said arms having an aligned opening position to receive a horizontally oriented shaft extending between said openings, whereby a said drive unit is pivotably supported by said shaft on said arms;

C. a vertical leg extending from said edge of said mounting plate and adapted to extend downward over the outer side of a boat; and

D. a third arm supported by and extending outward from said vertical leg (and including a recess positioned to receive a locking pin adapted to secure) to support a said motor drive unit in a drive position; wherein a said motor drive unit is pivotally mounted about an axis outboard of a boat and readily operated between a vertical (locked) drive position and a horizontal stored position, and wherein said vertical leg and said third arm include coating means for locked positioning of said third arm with respect to said vertical leg at selected levels.

2. A bracket for mounting an electric outboard motor drive unit as set forth in claim **1** therein said coacting means comprise interlocking surfaces of said vertical leg and third arm.

3. A bracket for mounting an electric outboard motor drive unit as set forth in claim **2** wherein:

A. said vertical leg includes a raised and vertically extending ridge; and

B. said third arm includes a vertically extending slot adapted to mate with said ridge.

4. A bracket for mounting an electric outboard motor drive unit as set forth in claim 2 wherein said third arm includes a vertically extending elongated opening and said means for locked positioning includes a bolt adapted to extend through said opening and extend into said vertical leg.

5. A bracket for mounting an electric outboard motor drive unit as set forth in claim 4 further comprising first and second bushings adapted to be affixed to and removable from said first and second arms, respectively, and including openings for receiving said shaft to support varying-dimensioned drive units horizontally between said first and second arms.

6. A bracket for mounting an electric outboard motor unit as set forth in claim 4 further comprising a shaft adapted to be inserted through openings in said first and second arms and including locking means for locking said shaft in position.