April 21, 1942. D. FERRAGANO 2,280,767

UNIVERSAL GRIP HOLDER FOR RUBBING TOOLS

Filed June 12, 1941

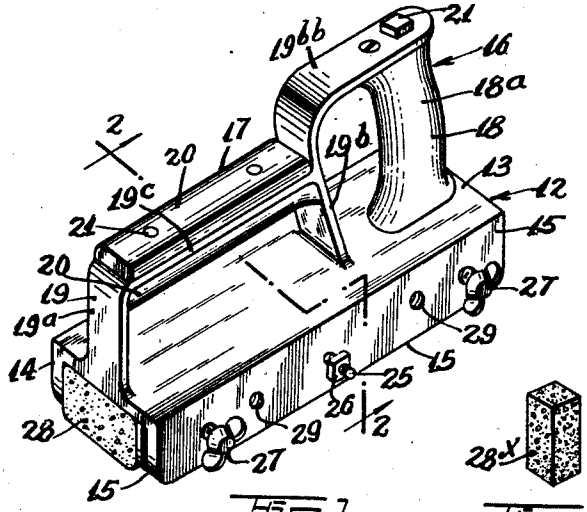


Fig. 1.

Fig. 8.

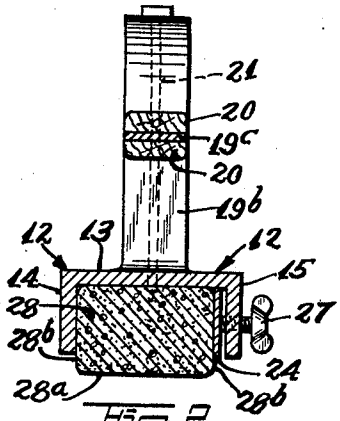


Fig. 2.

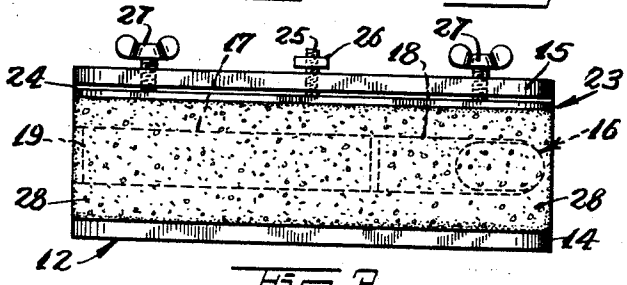


Fig. 3.

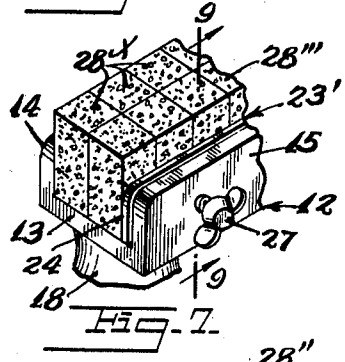


Fig. 7.

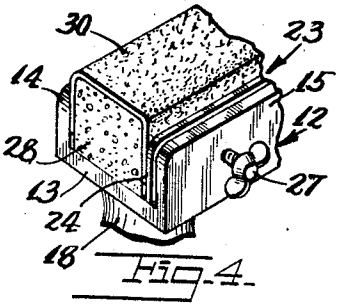


Fig. 4.

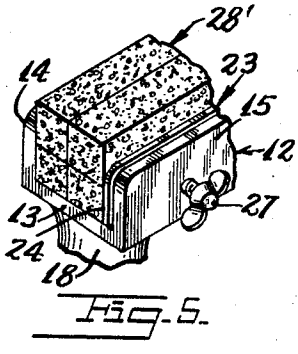


Fig. 5.

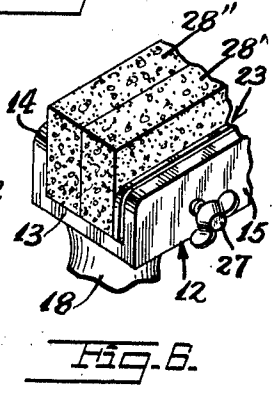


Fig. 6.

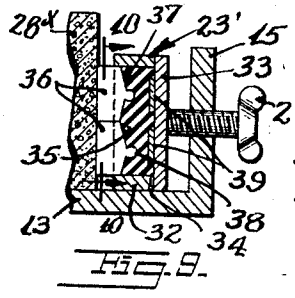


Fig. 9.

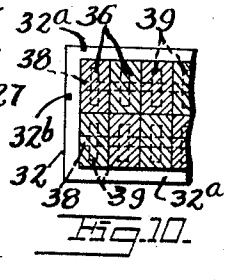


Fig. 10.

INVENTOR
Dominick Ferragano
BY
Fulton & Holcomb
ATTORNEY

Patented Apr. 21, 1942

2,280,767

UNITED STATES PATENT OFFICE

2,280,767

UNIVERSAL GRIP HOLDER FOR RUBBING TOOLS

Dominick Ferragano, Albany, N. Y.

Application June 12, 1941, Serial No. 397,709

6 Claims. (Cl. 51—187)

This invention relates to new and useful improvements in a universal grip holder for rubbers of concrete and wood finishing objects.

More specifically, the invention proposes to characterize the holder by a frame having a top wall and a pair of downwardly extending parallel side walls, and means for gripping and holding the rubbers of concrete, or wood working articles between said side walls.

More specifically, the invention proposes to characterize said holding means by a clamp mounted on the inner face of one of the side walls and adapted to clamp an object against the other side wall and constructed and arranged to be operable from the outside of said frame.

The invention also contemplates providing said frame with a handle by which the holder may be pressed downwards on work and simultaneously moved to and fro.

Still further the invention contemplates a novel construction of the clamp mechanism thereof to more effectively hold the rubbers of concrete, or other articles in position.

Another object of the invention is the construction of a device as mentioned which is simple and durable and which may be manufactured and sold at a reasonable cost.

For further comprehension of the invention, and of the objects and advantages thereof, reference will be had to the following description and accompanying drawing, and to the appended claims in which the various novel features of the invention are more particularly set forth.

In the accompanying drawing forming a material part of this disclosure:

Fig. 1 is a perspective view of a grip holder constructed in accordance with this invention.

Fig. 2 is a vertical sectional view taken on the line 2—2 of Fig. 1.

Fig. 3 is a bottom elevational view of the holder shown in Fig. 1.

Fig. 4 is a fragmentary perspective view of the grip holder previously illustrated but shown provided with a wood work finishing article.

Fig. 5 is a fragmentary perspective view of the grip holder shown provided with rubbers of concrete.

Fig. 6 is another similar fragmentary perspective view showing the grip holder provided with different rubbers of concrete.

Fig. 7 is another fragmentary perspective view showing the grip holder provided with additional rubbers of concrete, this grip holder being provided with a clamp of modified construction.

Fig. 8 is a perspective view of one of the rubbers of concrete shown in Fig. 7.

Fig. 9 is a fragmentary enlarged vertical sectional view taken on the line 9—9 of Fig. 7.

Fig. 10 is a fragmentary vertical sectional view taken on the line 10—10 of Fig. 9.

The universal grip holder for rubbers of concrete and wood work finishing objects, in accordance with this invention, includes a frame 12 having a top wall 13 and a pair of downwardly extending parallel side walls 14 and 15. A handle 16 is mounted on said top wall 13 and is provided with a front horizontal section 17 and a back vertical section 18. The front section 17 may be utilized to exert a downward pressure, while the back section 18 may be utilized to force the grip holder forwards and rearwards.

The handle 16 includes a metal portion 19 which has vertical side arms 19^a and 19^b and a horizontal top arm 19^c. This horizontal top arm is covered with wood or composition strips 20 which are secured in position by rivets 21 passed through these parts and through the horizontal top portion 19^c. The side arm 19^b has a top extension 19^{bb} which extends rearwards in a horizontal direction. The handle 18 includes a wooden or composition tubular member 18^a which is secured in position by a bolt 21 extended through the top horizontal portion 19^{bb} and the top wall 13 of the frame 12.

A clamp 23 is mounted on the inner face of the side wall 15 and is adapted to clamp an object against the side wall 14. This clamp comprises a strip of heavy rigid sheet metal material 24 which is provided at its center with a stud 25 passing through an opening in the side wall 15. A nut 26 is loosely mounted on the stud 25 to support the strip 24 freely so that it may be moved inwards and outwards. Several wing headed screws 27 are threadedly engaged through the side wall 15 and abut the strip 24 at points along its length by which the strip 24 may be urged into operative position.

A rubber of concrete 28 is shown mounted in the grip holder. This rubber of concrete has a flat side 28^a adapted to engage work. It is also provided with projecting side portions 28^b which may also be engaged against work when desired. The rubber of concrete 28 is firmly held in a fixed position by the clamp 23. The side wall 15 is provided with additional threaded openings 29 for receiving additional clamp screws 27, or for receiving the clamp screws 27 when it is desired to hold smaller rubbers of concrete.

In Fig. 4 a modified form of the invention is

disclosed which distinguishes from the prior form in the fact that a sheet of sand paper material 30 is shown engaged over the outer face in the side walls of the rubber of concrete 28 and is held in position by the clamp 23. In this condition of the parts it may be used to sand paper various objects.

In Fig. 5 another embodiment of the invention has been disclosed which distinguishes from the prior form in the fact that it is provided with rubbers of concrete 28' formed from a plurality of sections which are square in transverse cross section. Four such sections are being used. In Fig. 6 another embodiment is shown in which the rubbers of concrete 28'' are rectangular in transverse cross section. Two of these are being used.

In Figs. 7 to 10 inclusive a still further modified form is disclosed in which the rubbers of concrete 28''' comprise a plurality of small cubicle particles 28^x. These cubicle particles are arranged in several rows, each row comprising a plurality thereof. In this form of the invention a modified clamp 23' is illustrated, particularly adapted to effectively hold a plurality of the small rubbers of concrete, or similar materials 23^x. The clamp 23' includes a frame 32 having side walls 32^a and end walls 32^b. A back wall 33 is hingedly mounted on the back of the frame 32 by a hinge construction 34 located along one side. A resilient member 35 is mounted within the frame 32 and rests against the back wall 33. This resilient member 35 comprises a solid mass of rubber. A plurality of blocks 36 are mounted on the front of the resilient member 35. These blocks 36 are of a relatively small size in comparison with the rubbers 28^x so that one or more of the blocks 36 will engage each of the rubbers 28^x.

Each block 36 has an apex shaped inner side 37 which is provided with a horizontal cylindrical central portion 38. This cylindrical central portion 38 and the sloping parts of the inner side 37 facilitates horizontal pivoting of each of the blocks individually. This facilitates good contact of the front faces of the blocks 36 with the faces of the rubbers of concrete 28^x. A shim sheet 39 is provided for each block 36 and is removably mounted upon the rear face of the resilient member 35. These shims 39 are disposed within grooves formed in the rear face of the member 35. The shims 39 are removable and replaceable with thicker or thinner shims so as to properly adjust the individual blocks 36 to grip and hold each of the rubbers of concrete 28^x. In other respects this form of the invention is similar to the previous form.

The set screws 27 are turned inwards to close the clamp 23' against the plurality of rubbers of concrete 28^x. In the event that it is found that one or more of the rubbers of concrete are not properly gripped and held the screws 27 are loosened and the frame 22 is removed. The back 33 of the frame is opened and shims similar to the shims 39 are substituted for certain of the shims now in the rubber member 35 to properly "make up" the clamp so that it will effectively clamp all of the rubbers of concrete 28^x simultaneously.

The grip holder in other respects is used in the same fashion indicated for the prior forms.

While I have illustrated and described the preferred embodiments of my invention, it is to be understood that I do not limit myself to the precise constructions herein disclosed and the right is reserved to all changes and modifications coming within the scope of the invention as defined in the appended claims.

Having thus described my invention, what I claim as new, and desire to secure by United States Letters Patent is:

1. A universal grip holder for rubbers of concrete and wood work finishing articles, comprising a frame having a top wall and a pair of downwardly extending parallel side walls, a handle on said top wall and having a front horizontal section and a back vertical section, and a clamp mounted on the inner face of one of said side walls and adapted to clamp an object against the other of said side walls, comprising a frame having side and end walls, a back wall hingedly mounted on the back of said frame, a resilient member mounted in said frame and resting against said back wall, and a plurality of blocks mounted on the front of said resilient member.

2. A universal grip holder for rubbers of concrete and wood work finishing articles, comprising a frame having a top wall and a pair of downwardly extending parallel side walls, a handle on said top wall and having a front horizontal section and a back vertical section, and a clamp mounted on the inner face of one of said side walls and adapted to clamp an object against the other of said side walls, comprising a frame having side and end walls, a back wall hingedly mounted on the back of said frame, a resilient member mounted in said frame and resting against said back wall, and a plurality of blocks mounted on the front of said resilient member, said blocks having back walls of substantially convex form provided with cylindrical portions at their centers.

3. A universal grip holder for rubbers of concrete and wood work finishing articles, comprising a frame having a top wall and a pair of downwardly extending parallel side walls, a handle on said top wall and having a front horizontal section and a back vertical section, and a clamp mounted on the inner face of one of said side walls and adapted to clamp an object against the other of said side walls, comprising a frame having side and end walls, a back wall hingedly mounted on the back of said frame, a resilient member mounted in said frame and resting against said back wall, a plurality of blocks mounted on the front of said resilient member, and a plurality of shims removably mounted on the back face of said resilient member.

4. A universal grip holder for rubbers of concrete and wood work finishing articles, comprising a frame having a top wall and a pair of downwardly extending parallel side walls, a handle on said top wall and having a front horizontal section and a back vertical section, and a clamp mounted on the inner face of one of said side walls and adapted to clamp an object against the other of said side walls, comprising a frame having side and end walls, a back wall hingedly mounted on the back of said frame, a resilient member mounted in said frame and resting against said back wall, a plurality of blocks mounted on the front of said resilient member, and a plurality of shims removably mounted on the back face of said resilient member, there being one shim for each of said blocks.

5. A universal grip holder having a channel shaped frame for receiving a rubbing object between its side walls, a rigid strip of metal disposed between one of said side walls and the adjacent face of said rubbing object, spaced clamp screws threadedly engaged through said side wall

and abutting said strip of metal to clamp said rubbing object between said strip of metal and the other of said side walls, and means for loosely supporting said strip of metal upon said side wall, whereby when said clamp screws are turned all areas of said strip will move uniformly relative to said side wall to seat solidly against said rubbing object, comprising a threaded stud extended freely through an opening formed in said side wall at a point between said clamp screws, and a nut mounted on the outer end of said stud for engaging the outer face of said side wall to prevent complete disengagement of said stud from said opening when said strip of metal is urged away from said wall.

6. A universal grip holder having a channel shaped frame for receiving a rubbing object between its side walls, a rigid strip of metal disposed between one of said side walls and the adjacent face of said rubbing object, spaced clamp screws threadedly engaged through said side wall and abutting said strip of metal to clamp said rubbing object between said strip of metal and the other of said side walls, and means for loosely supporting said strip of metal upon said side wall, whereby when said clamp screws are turned all areas of said strip will move uniformly relative to said side wall to seat solidly against said rubbing object, comprising a threaded stud extended freely through an opening formed in said side wall at a point between said clamp screws, and a nut mounted on the outer end of said stud for engaging the outer face of said side wall to prevent complete disengagement of said stud from said opening when said strip of metal is urged away from said wall, said opening in said side wall having a diameter slightly greater than the diameter of said stud providing a tolerance for said stud permitting said strip of metal to move freely relative to said wall.

DOMINICK FERRAGANO.