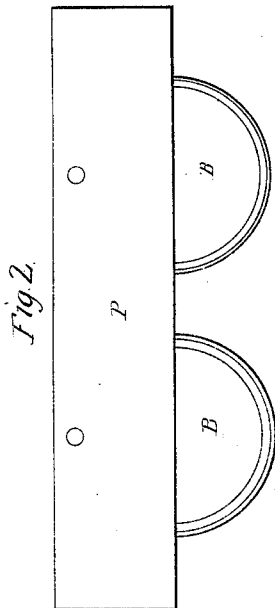
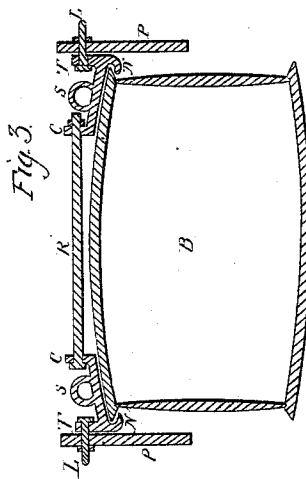
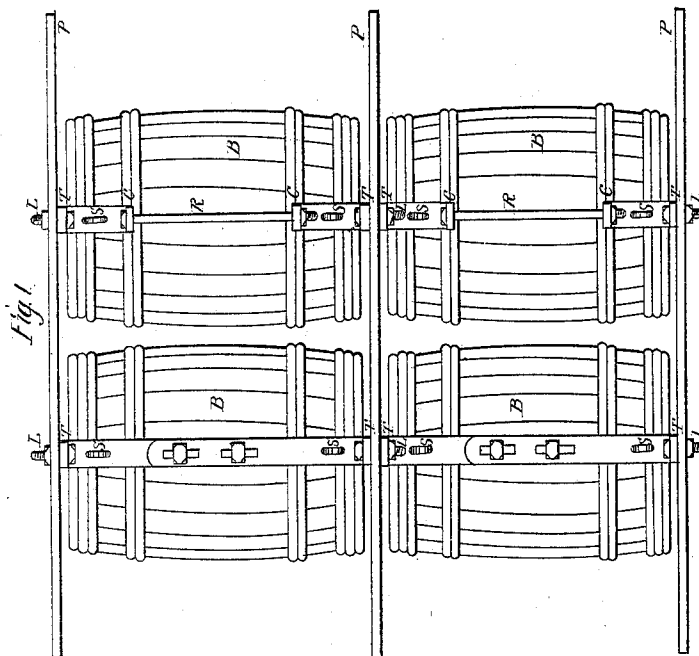


R. W. Park.
Rafting.

Patented May 3, 1864.

No. 42,594.



Witnesses:

Josiah W. Ellis.
Ed. Williams Jr.

Inventor.

R. W. Park

UNITED STATES PATENT OFFICE.

ROBERT W. PARK, OF PITTSBURG, PENNSYLVANIA.

IMPROVED CONNECTION FOR FLOATING BARRELS.

Specification forming part of Letters Patent No. **42,594**, dated May 3, 1864.

To all whom it may concern:

Be it known that I, ROBERT W. PARK, of the city of Pittsburg, in the county of Allegheny and State of Pennsylvania, have invented a new and useful Improvement in Connections for Floating Barrels; and I hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings, forming part of this specification, and to the letters of reference marked thereon.

The invention I have made consists of an improvement in that kind of clamps used for holding floating barrels wherein the hooks are extensible—that is, capable of being expanded or contracted—so as to fit barrels of different sizes. These hooks are also furnished with rings or eyes, through which a rope can be passed for drawing the barrels together; and holding them in proper position to form a raft. This kind of clamp answers very well in still water, from the fact that but little force is required to keep the barrels together; but where the water is rough the eyes of the clamps cut the ropes to such an extent as to endanger their separation. To obviate this difficulty and insure the barrels being well kept together in proper place, and at the same time prevent their abrasion, is the object of my invention. For this purpose I construct my clamps with an ear or lug having a hole therein at that part directly above the hooks that catch over the chine, when by placing aboard on its edge between the heads of the barrels after the clamps have been placed hereon, and passing a bolt secured by a nut through the lugs and board, the barrels are formed into a strong and permanent raft, the boards not only assisting to hold the barrels, but tend to prevent their being injured, which must be the case if the heads are permitted to touch each other.

To enable others to make and use my improvement, I will proceed to describe its construction and operation by reference to the accompanying drawings, in which—

Figure 1 represents four barrels fastened together according to my improved plan. Fig. 2 is an end view of the same. Fig. 3 represents a vertical section of the clamps attached to one barrel.

All the drawings are lettered, and similar letters denote corresponding parts in the several views.

I construct my clamp of iron (or any other metal that will answer the purpose) similar to those already in use, but having in addition to the hooks, N, Fig. 3, for catching over the chine of the barrels B, an ear or lug, T, just above the hook N, having a hole therein for the passage of the bolt L for the purpose of holding the barrels together. Part of this clamp extends along the top of the barrel a short distance, the end being turned up so as to form another ear or lug, C, also having a hole through it for the purpose of drawing the clamps together on the barrel by means of a long bolt, R, secured by a nut at one end. Between the lugs or ears so formed is a ring or eye, S, which enables the barrels to be held by a rope until the clamps are united by a bolt, L, as seen in Fig. 1. Two of these clamps, as seen in this figure, are made extensible by means of short screws working in slots, as in my former application for a patent.

To apply the clamps so constructed to the barrels B B, the nut on the long bolt R must be unscrewed so as to allow the hooks N N, Fig. 3, to pass freely over the chine of the barrel, when by screwing up the nut the clamps will be rigidly and firmly affixed thereto. A number of barrels having the clamps so attached are then floated together, end to end, and held in that position by a rope passed through the rings or eyes S S S S, until a board, P, is placed between them, as shown at Fig. 1, when by passing a short bolt, L, through the lugs and board so placed the whole will be firmly secured together by screwing up of the nuts on said bolts, forming a raft of more than ordinary strength.

By constructing clamps in this manner it is not necessary to place a clamp on every barrel, for by securing a barrel between the ends of two long boards a number can be kept sufficiently safe for transportation by allowing them to float between the boards and barrels secured to the ends thereof.

Having thus described my invention, what I claim, and desire to secure by Letters Patent of the United States, is—

1. The combination and arrangement of

the lugs or ears T T with the eyes or rings S S, long bolt R, ears C C, and hooks N N of a clamp for holding floating barrels, constructed and operating as herein shown and set forth.

2. Securing the barrels together by means of the screw-bolts L L, passing through the lugs or ears of the clamps, in combination with

a board or its equivalent placed between the heads of the barrels, held and supported in the manner as herein set forth.

R. W. PARK.

Witnesses:

JOSIAH W. ELLS,
EB. WILLIAMS, Jr.