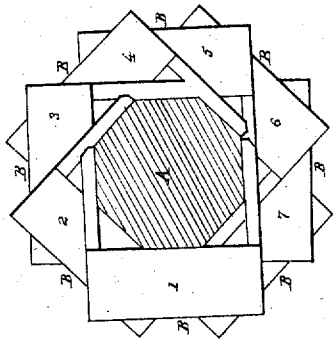
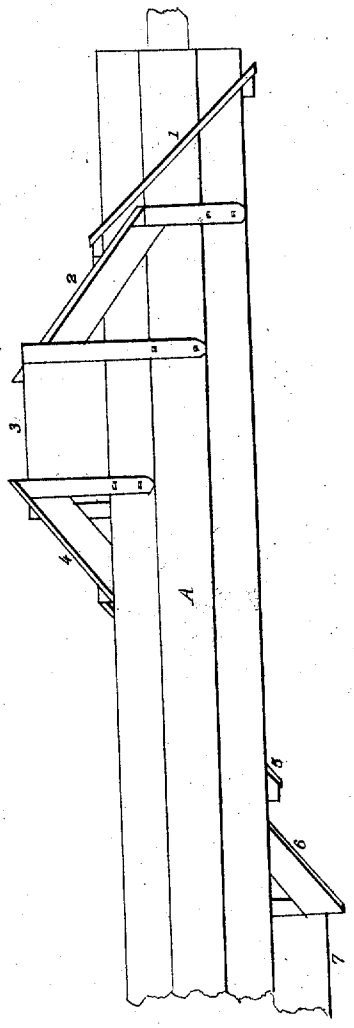
9684X

H. Allen.

Water Wheel.

Patented June 2, 1836.





N. PETERS, PHOTO-LITHOGRAPHER, WASHINGTON, D. C.

Henry Allen, of Lincoln, Tennessee.

Letters Patent — Patented June 2, 1836.

The schedule referred to in these Letters Patent and making part of the same, containing a description in the words of the said Henry Allen himself of his improvement in the current wing wheel.

To all to whom these Presents shall come. Be it known, that I Henry Allen in the County of Lincoln, State of Tennessee, have invented a new and useful horizontal, current-water wheel, and that the following is an exact and full description thereof — I have a horizontal shaft sufficiently long to contain as many sets of wings as may be deemed necessary for the power required — The shaft is dressed to eight or ten squares, to each set of wings there are two sets of arms, locked round the shaft sufficiently strong to support the wings when in operation — The front or upper set of arms commence from the lower square of the shaft, the second set from the top of the shaft and are so arranged as to form an angle of forty five degrees with the horizon, when the arm is levelled off to receive the wing, in this way the arms are carried round the shaft until the wheel is completed — with the first set of wings — The second set is shifted half a square and framed round the shaft in the same way, the third set is again brought to the square as the first, and so on till the number required be framed to the shaft — The wheel is strongly confined down by cast iron pedestals, the one at the lower end is so cast as to support the end of the gudgeon, at the upper end of the shaft there is a crank working a pitman, which is connected to a lever resting on a fixture in the centre, which works another pitman and crank of the size of the first, and carries the power to the machinery — A set of mitre wheels with an upright shaft will supersede the necessity of the lever and pitmans. The framing for this wheel, should be strong and heavy and confined to the bottom

1684

of the stream, with bolts sufficiently strong to prevent it's being moved by high water — The inside of the frame is made concave to fit the wing as high as the centre of the wheel, or the wheel may be rimmed and lined on the inside of the running so as to receive the full force and pressure of the current — A wing dam, to throw a sufficient quantity of water into the wheel is all that is necessary, it will run at all stages of the water, if a level is taken at low water mark, strong penn gates the posts of which extend above high water mark will put it on motion, and stop the whole at pleasure.

What I claim as my invention, and which I desire to secure by Letters Patent is the water wheel as first described

Witness

Hy. Allen

Hy. Ellis

Tho. Johns

Exd. H.J.B.

Drawings filed (572 ans)