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#### LIST OF PATENT CLAIMS

ISSUED FROM THE UNITED STATES PATENT OFFICE,

For the week ending August 20, 1850.

To T. Batty, of New York, N. Y., for improved Serving Mallets.

I claim, first, attaching friction rollers to the periphery of a serving mallet, substantially in the manner and for the purposes herein described.

Second, Making the groove or face deeper or larger at the part H, which fits the served part of the rope, in the manner and for the purpose substantially as herein described.

To Robt. Brown, of New London, Conn., for improvements in Gun Harpoons and Lances.

I claim attaching a tail of cords, or their equivalent, to gun lances, substantially in the manner and for the purpose herein set forth.

I also claim attaching the button to the shank of gun-harpoons or lances in such manner that when the lance or harpoon is discharged from the gun the button will drop off, being thereby prevented from retarding the flight and from deflecting the lance or harpoon from the line in which it is projected from the gun, substantially as described.

To F. H. Chase, of Clintonville, and A. Weston & Leander Babbit, of Ausable, N. Y., for improvement in Obstetrical Supporters.

We claim the combination in the manner described of the sliding plate, with the back pad, which is connected to the seat, for the purpose of enabling the bearing of the instrument to be moved higher up or lower down the back, without disturbing the patient.

To J. Dougherty, of Mount Union, Pa., for method of propelling boats in shallow water.

We claim, first, the combination and arrangement of the setting pole, sliding in the sheath, with the spring bolt and cords, for the purpose of shortening or lengthening the setting pole, substantially as herein fully described and shown.

Second, the manner herein described of checking or snubbing the boat by means of a chain or cord attached to the foot of the setting pole and passing over pulleys to a windlass placed in the stern of the boat near to the helm, as herein described.

To Imia Drake, of Mansfield, N. J., for improvement in compound wagon-boxes.

I claim making the fastenings of a compound wagon body by combining with screw-bolts so jointed to the axles, frame or body of the carriage as to be laid down, or set up at pleasure, two cross pieces to each pair of bolts, with pressure nuts above the upper, and sustaining nuts beneath the lower cross bar, whereby the whole load may readily and easily be secured, or the lower part may be released and withdrawn, without disturbing that which is above it, substantially as herein set forth.

To R. E. Dibble, of New York, N. Y., for improved Steam Boiler.

I claim the arrangement of pendent water vessels in the fire box, in connection with water tubes, which pass along the flue and are connected at one extremity with a water space near the back of the boiler and at the other with the water vessels at the fire box substantially as herein set forth.

To I. D. Garlick, of Lyons, N. Y., for improvement in changing rotary motion into reciprocating motion.

I claim the mechanical arrangement and combination of parts, by which I convert the rotary motion of the wheel into a reciprocating movement of the churn dasher rod, to wit, by means of the action of the lugs that project from the face of the said wheel upon the forked rocker, and the vibrating when aided by the inclined planes, substantially in the manner herein set forth.

To J. L. Hardeman, of Arrow Rock, Mo., for improvement in machines for cutting hemp.

I claim a series of blades upon an arm back to back in a V form their edges elevated in order to give a smooth glancing stroke upward through the stalk of hemp after the manner of cutting performed by the common scythe in hemp or grain.

I claim the introduction and use of a cleaning shear over the crotchet or junction of the blades (to remove such hemp as may be imperfectly cut or pulled up), substantially in the manner as herein set forth.

I claim the method of separating and bunching the hemp after it has been cut, by means of a wedge or inclined plane and a revolving cone.

I claim the invention and use of the revolving rack as a substitute for the over-head reel supporting the hemp while being cut.

To J. C. Millar, of Springfield, Mass., for improvement in Fulling Mills.

I claim so arranging a vertical fluted or ribbed concave that the rotation of the former on its axis shall cause the goods to be fulled to assume a cylindrical form and to rotate on its own axis by means of the friction of the two fluted or ribbed surfaces acting upon and sustaining in its position the cloth or goods, as set forth.

To L. V. Newton, of New York, N. Y., for improvement in preparing the face of metallic types, engraved plates, &c.

I claim the plating or coating of the surfaces of metallic printing types, stereotype plates or other printing plates whether cast or engraved, with an additional coat of metal by means of galvanic electricity in the manner and for the purpose described.

To George Pollock, of Roxbury, Mass., for improvement in hot-air Registers.

I claim the method of moving the dampers in registers or ventilators, by means of the slider and the oblique bars, with their several forms and parts, substantially as described, in combination with the oblong dampers hung in the middle of their width, in the manner and for the purposes set forth.

To J. D. Rice, of Philadelphia, Pa., for Register for steam boilers.

I claim connecting the gauge rods with the gauge cocks in such manner as herein described, that the pressure of steam and height of water shall be registered each time the gauge cocks are tried, the register indicating at the same time the period of time of trying of the gauge cocks by opening and closing them.

To S. P. Ruggles, of Boston, Mass., for machine for cutting sheet metal, &c.

I claim the toothed rack or its equivalent, applied to the bar, and a system of one or more gears, or the mechanical equivalents thereof (applied to the cutter wheel and made to engage with the said rack or equivalents thereof) in combination with the said bar, the cutter wheel and its sliding carriage; the same being substantially in the manner as above described, and for the purpose of causing the cutting periphery of the rotating knife to travel around faster than the knife moves horizontally, and to thereby make said knife cut with a drawing stroke.

I also claim the combination of the swinging frame and gauge contrivance or equivalents therefor, with a sliding carriage, its cutter wheel and the slide bar and straight cutting edge, as substantially specified, the same being for the purpose of enabling me to cut either circular or concave work, as described, and of any diameter or dimensions capable of being produced by the machine of whatever size it may be made.

To George Tingle, of New York, N. Y., for improved opening and closing bucket for paddle-wheels.

I claim, first, the formation of each of the blades composing the bucket, so that their inner or closing ends shall be heavier than the outer ends thereof when combined with a stop or stops, substantially as herein described, thus effecting the closing together of the same by the action of gravity before entering the water, as set forth.

Secondly, I claim curving the inner edges so as to insure the closing of said edges, together by the action of the water while backing, and thus complete a sufficient bucket for that purpose, substantially in the manner described herein.

To John Van Brocklin, of Middleport, N. Y., for improvements in machines for heading bolts, rivets, &c.

I am aware that spikes and bolts have been headed in a box, I therefore do not claim the box with the movable header therein, but I claim forming in the lower part of the box or holder a flaring or bell mouthed cavity, which embraces the tapered ends of the dies, when the box is down or in a vertical position, and clamps them firmly together, while at the same time the cavity acts as a guide to cause the heading box to assume its proper position, and prevents the metal from being forced out between the ends of the dies and bottom of the cavity in the box during the operation of heading.

To J. A. Winslow, of Roxbury, Mass., for improved method of carrying vessels over shoals.

I claim the mode of transporting a vessel across shoals or bars, by means of a camel, having an unyielding platform for the vessel to rest on, and likewise provided with a bow, as herein described, the vessel being partly water borne and partly supported by the camel.

To James Young, of Manchester, England, for improvement in processes for making stannates of potash or Soda. Patented in England Dec. 9, 1848.

I claim the mode of producing a stannate of soda by heating a mixture of tin ore and sulphuret of sodium, and a stannate of potash by heating a mixture of tin ore and sulphuret of potassium and afterwards separating the sulphur from these mixtures respectively, by means of a metallic oxide, in manner herein before described.

To Wm. R. Nevins, of New York, N. Y., for improvement in machines for cutting crackers.

I claim the combination of the three following elements: first, the constant velocity of the breaking rollers.

Second, the number of strokes of the cutters adjustable thereto, by means substantially as described, so that within certain limits they may be varied in relation to the number of revolutions of the feed rollers.

Third, an adjustable feed to the apron derived from the shaft carrying the cutters, so that it always makes the same number of strokes, but each stroke may be varied in length, by which, in the same machine, I am enabled to cut crackers of any given size.

[To show how things are managed in the Patent Office, and the competency of the officers employed therein, we will state that this claim of Mr. Nevins is not the one first set up by him, they were rejected, and "in cabinet council held," the above was made out by the examiner, and the applicant was told it would be granted, and would cover what he wanted. We will now give the old claim, the one set up by Mr. Nevins:

"I claim the employment of the cutters on the secondary shaft, substantially as described, whereby different speeds may be given to the cutters, while the dough rollers receive a uniform speed, for the purpose set forth.

I also claim the secondary cutter shaft Y<sup>2</sup> in combination with the crank M, the connecting rod, L, and rocking shaft E, as described, whereby a progressive intermittent motion is communicated to the endless apron, D, to correspond with the speed of the cutters, however varied the speed of the cutters may be, for different kinds of biscuit, &c., of various sizes."

Now we leave it to any attorney to say which of these claims are the best, and which of them should have been granted. We might lay on the critic's lash with no unsparring hand in this case, but we chose not to do so, lest it might be supposed some personal grudge had prompted us to the attack. What we have said proceeds from no other than an honest motive—we believe the Patent Office has done a great wrong. An engraving of the above machine will be found on page 57, Vol. 3, Sci. Am.

#### DESIGN.

To Robert Donovan, of Pittsburg, Pa., for design for stoves.

[For notices of the "Serving Mallet," of Mr. Batty, and Capt. Robert Brown's Whale Lance, see Nos. 32 and 39, Scientific American. These inventions are both valuable to nautical men, and should arrest their attention.

#### A Devoted Naturalist.

Probably one of the most curious examples of the apparently trifling pursuits of scientific men has been exhibited by one of the most esteemed members of the Academy of Science of Paris, M. Dureau de la Malle. He was anxious to ascertain at what hour different birds began their morning song; he, therefore, from the first of May to the 6th of July, made observations, which he regularly published. It appears that for thirty years this vigilant naturalist went to bed at seven o'clock in the evening and rose at midnight, during winter and summer, and that this eccentric habit was for scientific purposes. It seems that the concert is opened by the chaffinch, and the sparrow is the laziest bird, not leaving his nest until five o'clock. In the intermediate hours at marked intervals, which M. de Malle has carefully noted down, other birds commence their natural melody. He has shown, on more than one occasion, that different birds have mistaken artificial light for the dawning of day, and that a solar lamp have awakened the little choristers.

#### Ostrich Hunting.

A favorite method adopted by the wild Bushman of taking ostrich and other game, is to clothe himself in the bird's skin, in which he stalks about the plain, imitating the gait and motions of the ostrich, until within range, when he seals his fate with a poisoned arrow. These arrows consist of a slender reed with a sharp bone head, thoroughly poisoned. When a Bushman finds an ostrich's nest, and the parent birds away, he ensconces himself in it, and on the return of the old birds secures the pair. By these means are obtained the majority of the plumes which grace the heads of the fashionable world.

#### Kentucky Tobacco Crop.

From different parts of Kentucky accounts are gloomy as to the growing tobacco crop. In Mason county, the Maysville Eagle says, the amount planted was only about two thirds of last year, owing to the lateness of the planting, and the danger from frost, the yield will not be above two-thirds the usual product per acre; or, in other words, the crop of Mason this year will be about half that of last year.

The Hopkinsville (Ky.) Press says:—"On the subject of the tobacco crop, we have conversed with gentlemen who have visited a great portion of the Green river country, and they assure us that it is utterly impossible that a half crop can be made—indeed, in many cases, the planter will not realize one hundred pounds to the acre."

#### Boston As It Was.

The peninsula of Boston was originally owned by the Rev. Wm. Blackstone, who resided there alone when it embraced but seven hundred acres. He sold the entire peninsula for thirty pounds sterling, to John Winthrop and company, who founded Boston in 1630. Winthrop and his party, among their first acts, built a rude meeting-house on the south side of State street, founded the First Church, (which then embraced the people of Charlestown,) and settled Rev. Messrs. Williamson and Cotton as teacher and pastor.

#### Novel Suspension Bridge.—An Army of Monkeys.

There is a story going the rounds of the papers about a suspension bridge being formed by an army of monkeys, taken from Captain Reid's "Adventures in South America." We have never seen the correctness of the story doubted by any paper, and were it not too long for a falsehood we would publish it for a curiosity; but believing it to be a sheer untruth, we merely mention the circumstance to make some people put on their spectacles.

#### Mineral Paint Discovered in Massachusetts.

A quarry of mineral has been discovered near West Springfield, which consists of a reddish brown stone mixed with blue, which is ground, washed and dried, and then mixed with oil like lead, when it becomes an excellent fire and water-proof paint. It is considered to be a valuable discovery.

The Rice crop in Louisiana promises an abundant harvest.