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### LIST OF PATENT CLAIMS

Issued from the United States Patent Office FOR THE WEEK ENDING OCTOBER 28, 1851.

To Myron Cory, of Jerseyville, Ill., for improvement in Seed Planters,

I claim the employment of the Indicator, having its ends bent as described, or in any other manner substantially the same, and secured on the main shaft, in such a manner that it can be disengaged, or thrown into connection with the wheel, as desired, for the purpose of indicating the place where the corn has been planted, in the manner and for the purpose substantially as set forth.

To Merritt S. Brooks, of Chester, Ct., for improved means for attaching fingers, &c., to their handles.

I claim the method of securing augers and other implements to handles, by means of a socket, ferrule, or cylindrical slide, constructed as described, viz., the socket being placed underneath a mortise hole in the handle, and perforated with an oblong slot, the edges of the slot being bevelled to correspond to notches in the shank of the implement, the upper surface of the socket being inclined, and the shank moved along the slot by means of the ferrule or cylindrical slide, by which the bevelled edges of the slot bind or wedge in the notches, and the taper form of the shank drawn firmly in the hole through the ferrule slide, substantially as described.

To A. C. Gallahue, of Metamoras, O., for improvement in machines for Pegging Boots and Shoes.

I claim splitting the peg from the peg-wood and driving it into the sole of the shoe, by a single blow of the plate, acting on the peg-wood, and forcing it upon the knife, substantially as described.

I also claim mounting the peg-wood or block in a vertical sliding carriage, or the equivalent thereof, in combination with the stop plate, knife, and fingers, operated substantially as set forth.

To S. H. Gilman, of Cincinnati, for improvement in machines for Drying Bagasse.

I wish it to be understood that I do not claim, for such purposes, a heated cylinder, revolving upon an inclined axis, such cylinders, in various forms, having been long in use; but I claim, first, the arrangement, substantially as described, of two cylinders, one so secured by hollow bolts or rivets, concentrically within the other, as to leave between them an annular steam space, crossed by ventilating apertures, and the whole made to revolve around an inclined axis, for the expeditious drying, free from the danger of accidental ignition of bagasse and the like substances.

Second, the steam and condensed water pipes revolving together, one within the other, within a common journal bearing, and entering the steam space of the cylinder, in oppositely oblique directions, as described, for facilitating, at the same time, the discharge of the water and the admission of steam, during the revolution of the cylinder.

To Selden W. Knowles, of Middletown, Ct., for improvement in Swinging Cradles.

I claim the combination of a cradle with pendulum rods and balls, or weights, attached thereto, and set in a frame so as to swing therein in the manner and for the purpose set forth.

To D. L. Latowrette, of St. Louis, Mo., for improvement in Oil Presses.

I claim the combination of the heating plates with the steam chamber, substantially as set forth, the plates being moved parallel, and the steam tubes connecting them with the steam chamber, sliding in stuffing boxes, in a line with the motion of the plates, as above set forth, said steam chamber being placed in a

proper relative position with the plates for that purpose.

To Frederick Mathushek, of New York, N. Y., for improvement in Pianofortes.

I claim the manner, substantially as described, of placing or arranging the strings of pianofortes, to wit, the shorter strings, or strings of the higher octaves across the narrow portion of the instrument, and the longer strings, or those of the lower octaves, crossing them in the direction of the greatest length of the instrument, so as to include the greatest possible size of string within the instrument, for the purposes specified.

To W. H. Pease, of Dayton, O., for improvement in the method of Moulding Kettles with Spouts.

I do not claim any peculiarity either in dividing the pattern, or using a green sand core; but I claim providing the pattern, B, with two projections, or solid pieces, one, on the under side of the spout portion, to prevent sand entering the spout, when forming the green core of the body; and the other on the upper side of the spout for forming a print in the sand to receive the projection of a dry sand core, by the use of which, in connection, the said dry sand spout core can be inserted in the drag portion of the mould, after the removal of B, but before the removal of A, and be held firmly in its required position, by which means the pattern, A, is made to adjust the spout core, and greater truth secured in setting the spout core, and fewer defective casts result, in the manner set forth.

To Joel Stevens & H. J. Ruggles of West Poughkeepsie, N. Y., for improvement in Dairy Stoves.

We claim the arrangement of the flues and valves, in combination with a water pan and fire, substantially in the manner and for the purpose set forth.

We also claim the combination of flues and valves, for the purpose specifically as described.

To T. B. Stout & J. F. Morell, of Keyport, N. J., for improvement in machines for taking Yeas and Nays.

We claim the method of dividing the yeas and nays votes and showing the vote, by weighing the yeas and nays balls, or their equivalents, in the opposite pans of a scale beam, substantially as set forth.

We also claim the method of enumerating the votes upon a question, by weighing the balls, or their equivalents, by spring balances, or their equivalents, whose indexes indicate the number of ballots in their respective scale pans, substantially as set forth.

We also claim the combination of the scale beam and spring balances, or the equivalent thereof, arranged substantially as described, for the purpose of showing, simultaneously, both the number of votes taken on each side of the question, and the relative values of the two sets or classes of votes, as set forth.

We also claim the employment of mechanism, for the purpose of recording the vote and showing whether it is yeas or nays, at a single operation, substantially as described.

We also claim the employment of mechanism for the purpose of recording the vote and showing the enumeration thereof, at a single operation, substantially as described.

And lastly, we claim the employment of mechanism for the purpose of recording and enumerating the vote, and showing whether it is yeas or nays, at a single operation, substantially as described.

To Jacob Stephan, (assignor to P. A. Schwartz & J. Stephan), of Boston, Mass., for improvement in Cements for Grinding Cylinders.

I claim the composition described consisting of the whey of milk, vinegar, glue, spirits of wine, and ether, substantially in the manner and for the purpose set forth.

I also claim the combination thereof, with emery, to construct a grinding cylinder, or other surface, in the manner described.

To R. S. Weaver, of Maysville, Ky., for improvement in machines for Printing in Colors.

I claim, in combination with receiving, distributing, and inking rollers, arranged as described, the adjustable ink trough, provided with removable partitions and perforated side, so as to give out the ink in lines or belts, corresponding with the lines or size of the type in the form, for the purpose described.

To H. W. Adams, of Boston, Mass., for improvement in the use of steam to make Zinc White.

I claim mixing the vapor or gases of water or steam, with the heated vapor of zinc or of

its ores, as set forth, for the purpose of manufacturing zinc white for commercial uses.

I also claim, in combination with the process for manufacturing zinc white, substantially as described, the making of hydrogen gas for light, heat, or motive power, as set forth.

To Euclid Rice, of Elizabethtown, N. J., for improvement in Baby Jumpers.

I claim the combining of springs with a frame and seat, in the manner described, forming an apparatus for teaching children to stand and walk, and, at the same time, to prevent the child from bearing its whole weight upon its feet, as it sits upon the seat or saddle, and can, at its option, either stand upon its feet or sit down, and at the same time move itself in any direction with its feet, and its body securely sustained in an upright position, after the upper top is locked around its waist, in the manner described: and it can, at its option, either move by a motion of its limbs, or use the machine as a jumper for amusement, as represented.

To S. W. Wood, of Rochester, N. Y., for improvement in Apparatus for Watering Cattle.

I claim, in combination with a pump, worked by an endless chain of elastic balls, and operated upon by the weight of cattle, the spiral spring operating between a stationary collar and the movable cogged and threaded sleeve, for the purpose of more certainly running the sleeve into gear, when the cattle step upon the platform, and for gradually stopping the platform as it rises, and the buckets as they run back into the stock or pipe, for the purpose of carrying back the water, as described.

To Cyrus Roberts & John Cox, of Belleville, Ill., for improvement in Threshing and Separating Grain.

First, we claim the method described, of constructing threshing cylinders with curved knives, or otherwise shaped, in the end, for the purposes described.

Second, also the method already described of working the separator by means of the jumping wheels and concave tracked brackets, or by any modification of it, whereby the action is substantially the same.

#### DESIGN.

To Ezra Ripley, of Troy, N. Y., (assignor to Chollar, Sage, & Dunham, of West Troy, N. Y., for Design for Stoves.

#### American Clippers---Cotton Sails.

McMakin's Model Courier has an excellent article on this subject, in which it attributes the most prominent advantages possessed by our clippers (and the yacht America) over others to the use of cotton canvas. It says:—

We hear it stated, that at the recent Royal yacht race at Cowes, the English yachts, to increase their speed with the America, had recourse to wetting their sails. Should Captain De Blaquiere, the present owner of the America, adopt the hemp duck, as used by all the British Yacht Squadron, and have her sails cut on the old fashioned balloon principle, there is fear that the laurels she so gallantly won might soon wither in a contest with the Titania, in a suit of cotton sails made properly. The English method of cutting fore and aft sails differs materially from ours. For instance, they give the foot of their sails a greater circular sweep, which hangs below the foot-ropes. The leeches are exceedingly hollow, caused by the stretching of the bolt-ropes, thereby sustaining an extra extent of spar. The America's sails, like all cut here, are straight in leech and foot.

The cotton canvas has now almost entirely superseded all other duck. It was invented by Mr. James Maull, of this city, and first manufactured for him by Mr. John Simpson, then residing at Wilmington, Delaware, during the late war with England, at which time, Russian, or any foreign canvas, it is well known to those in the trade, was selling at forty-five to fifty dollars per bolt.

The canvas was at first made by the handloom, which rendered it exceedingly soft and pliable; this was obviated by Mr. John C. Colt, of New York, who some thirty years since commenced its manufacture with the power-loom. Mr. Colt, and Messrs. Craig and Sergeant, were well aware of the difficulty Mr. Maull experienced in securing its introduction, and it was several years before it was at all noticed by other sail-makers,

with the exception of Lambert Tree, who subsequently brought it into notice among our smaller vessels. Among the first who used the cotton canvas, was Capt. Parker, for the sloop Trial, of Trenton, and Capt. Stokes, now of the sloop Planter, of Wilmington.—After a few years' wear, Captains Stokes and Parker both became dissatisfied, particularly Captain Stokes, who stated that the disadvantages were that the cotton canvas was liable to continual ripping and expense of re-sewing; and notwithstanding its advantages in other respects, would renounce its use, if there was no method of obviating this defect—which was eventually a general objection. After some reflection, Mr. Maull, suggested to Messrs. Craig and Sergeant—the then agents of Mr. Colt—the adoption of cotton twine as a ready means to remedy the objection, impressing on them the ill effects of hempen twine. They induced Mr. Colt, on these representations, to make the cotton twine for the first time. It was made, and used with the most complete success, not only for cotton canvas, but for Russian duck—its efficiency consisting in its superior durability. It was then considered as an innovation, and condemned by many as visionary. Its present and general adoption in the United States is the best commentary on the success of Mr. Maull's efforts.

Mr. Maull early imbibed the impression that a vessel sailing against the wind would sail faster if her sails were constructed upon the principle of his Patent Horizontal system wherein the least resistance to the action of the wind is practically obtained—the seams being horizontal, or in the line of direction of the wind.

The celebrated Yacht Maria, owned by John C. Stevens, Esq., of New York, has been provided with these sails, and, although nearly four years in use, they are admitted to be the best fitting sails in New York. Her contest with the world-renowned "America," the victress of Johnny Bull, has settled her superiority even over that famous Yacht, a fact admitted by Mr. Schuyler and other members of the Yacht Squadron. Mr. Stevens has stated that he was under the impression, ten years before Mr. Maull obtained his patent, that the principle was the best method of cutting sails, and he was the first to introduce them in New York on the "Maria." His other schooner, the Uncle John, of one hundred and fifty tons, has been provided with the Patent Sails, which have been in constant use four years, and from a statement of Captain Baldwin, who commands her, we have learned that they have not been repaired, with the exception of roping, and that he expects they will last two or three years longer."

[On page 20, Vol 4, of the Scientific American, will be found a defence of the claims of Mr. Maull, as the inventor of cotton duck for sails, and "the horizontal sail."]

#### A New Cotton Plant.

The editor of the New Orleans Orleanian has seen a boll of cotton which deserves the attention of cultivators, on account of its growth and early maturity. On the first of June last a lady planted in her garden a few cotton seeds presented her by a gentleman. On the 25th of July a boll was ready for picking; and at the end of sixty days from the time of planting the cotton had arrived at maturity; being in less than one half of the time it takes the species now raised by our planters to do so. The lady was totally unacquainted with the cultivation of the great Southern staple. The seeds were introduced by Mr. Hayams, from Youcatan, and are styled the Alica.

#### Oil from Poppies.

In Switzerland, large fields of the poppy are cultivated, not for the purpose of making opium but oil. From the poppy a beautiful transparent oil is made, which is extensively used in house-painting. It is almost as colorless as water, and possesses so many advantages over the flax seed oil that it may ultimately supersede that article.—Where flax cannot be grown poppies can be in poor sandy soil. Linseed oil is becoming dearer, and the demand for paint is increasing. With white lead, poppy leaves a beautiful surface, which does not afterwards change, by the action of light, into a dirty yellow.