

ladder or way, with its foot flush with the face of said auxiliary dam, and thence extending into the canal above or around the head of the main dam or cliff and into the upper stream, substantially as described.

No. 29,654. Jute and Hemp Softening Machine. (*Machine à adoucir le chanvre.*)

John Cheyne, Paterson, N.J., U.S., 7th August, 1888; 5 years.

Claim.—The combination, with the oil receptacle *a*, rollers *c*, shaft *f* and apron *g*, of the box *B*, the pipe *C* provided with valve *D* and float *D*, the pipe *E*, the pipe *E*, having perforations *E*, the pipe *F*, having perforations *F*, valve *g* and wheel *q* thereon, pipe *H*, pipes *I*, having perforations *i*, exhaust *L*, and valve *E*, all arranged to operate substantially as described and shown.

No. 29,655. Carding Machine.

(*Machine à carder*)

John Cheyne, Paterson, N.J., U.S., 7th August, 1888; 5 years.

Claim.—The combination, with rollers *c*, *e* and gears thereon, of the roller *B* and gears thereon, gear *d*, the roller *C* and gear on said roller, the roller *D*, roller *E*, the rolls *D*, spring *D*, the screw *D*, gear *C*, the bar *C*, having slots *C*, bolt *C*, the gears *g*, *e*, gears *g*, *g* and pinion *g*, all arranged and operating substantially as described.

No. 29,656. Joint for Extension Handles.

(*Joint pour manches à rallonge.*)

Charles A. Bartliff, Memphis, Tenn., U.S., 7th August, 1888; 5 years.

Claim.—1st. A joint or coupling for handles, comprising a socket provided with a longitudinal extension, and transverse adjustable bands or wires connected at their ends to the opposite side edges of the said extension, substantially as set forth. 2nd. The combination, with a socket formed or provided with a semicircular extension having oppositely arranged lugs on its side edges, of the cable bands, each connected at one end to one lug on one side of the extension, and adjustably connected at its other end to the opposite lug, substantially as set forth. 3rd. The combination, with the tubular socket, having an opposite extension curved in cross section and provided on its opposite side edges with lugs of spring bands or wires, each secured at one end to one of said lugs, the opposite ends being screw-threaded and passed down through the opposite lugs, and adjusting nuts on the said threaded ends, substantially as set forth.

No. 29,657. Composition of Matter to be used in Vaporized Form for the Preservation and Restoration of anything in the Animal and Vegetable Kingdom. (*Composition de matières pour être employée à l'état de vapeur pour la conservation et la restauration d'une chose quelconque dans le règne animal et végétal*)

Samuel H. Daniels, Pontiac, Mich., U.S., 8th August, 1888; 5 years.

Claim.—The composition, made up of the materials or ingredients named, and in the proportions named, or in relatively like proportions, as named, and mixed together, as described.

No. 29,658. Electrical Connector.

(*Connecteur électrique.*)

Frederick Stitzel, Charles Weinedel, Adolph Routlinger, Henry J. Engelhoff, Moses Schwartz and Otto E. Mueller, Louisville, Ky., U.S., 8th August, 1888; 5 years.

Claim.—1st. In an electrical connection, the combination, with two sections of railroad rail, each of which is provided with a perforation, of collars, each having a central opening for the reception of one end of a wire, and adapted to closely fit within the perforation in the track section, and a wire passing through both collars and secured thereto, substantially as set forth. 2nd. In an electrical connector, the combination, with two sections of a railroad rail, each of which is provided with a tapering opening, of the collars shaped externally to closely fit within said openings, and a wire, the ends of which are secured within openings formed in said collars, substantially as set forth.

No. 29,659. Telegraphic Relay.

(*Relai télégraphique.*)

Frederick Stitzel, Charles Weinedel, Adolph Routlinger, Henry J. Engelhoff, Moses Schwartz and Otto E. Mueller, Louisville, Ky., U.S., 8th August, 1888; 5 years.

Claim.—1st. In a relay, the combination, with an electro-magnet and a pivoted lever, of a series of yielding abutments arranged in the path of said lever, and adapted to be engaged in regular order, substantially as set forth. 2nd. In a relay, the combination, with an electro-magnet and a pivoted lever, of a series of yielding abutments in the path of said lever, and a spring contact with which said lever makes contact, substantially as set forth. 3rd. In a relay, the combination, with an electro-magnet, and a pivoted lever carrying an armature at one end, and a contact point near the other end, of a series of yielding abutments mounted therein, a curved spring secured to a suitable post and adapted to engage said lever, and an arm with which the lever makes contact, substantially as set forth.

No. 29,660. Improvements by means of which an Ordinary Wooden Pump may be Converted into a Force Pump, or used as an Ordinary Pump, and for Attaching Hose to Pump or other Spouts, and for Attaching other Tubes where a Water-Tight Attachment is Required. (*Perfectionnements au moyen desquels une pompe ordinaire de bois peut être convertie en pompe foulante ou utilisée comme pompe ordinaire, et par lesquels un boyau peut être assujéti aux dutois de pompes ou autres et d'autres tuyaux exigeant un raccordement étanche peuvent être assujéti.*)

Henry Dennis, John Maunder and R. A. Bradshaw, Lindsay, Ont., 8th August, 1888; 5 years.

Claim.—1st. The combination of the attachment 1, the body 2 and the arm 3, substantially as and for the purposes hereinbefore set forth. 2nd. The combination of the caps 4 and 5, with the body 2, substantially as and for the purposes hereinbefore set forth. 3rd. The combination of the attaching cap A, the lever C, the eccentric D, the dog E and the coupling strap F, substantially as and for the purposes hereinbefore set forth.

No. 29,661. Pattern for Pickets and Balusters. (*Patron pour piquets et balustres*)

William Miller, (assignee of Samuel D. Reigel), Thomasville, Ga., U.S., 8th August, 1888; 5 years.

Claim.—1st. The pattern comprising the forms A, B arranged side by side, secured together, and having their edges formed by sinuous lines, the opposing curved edges of the forms being concentric and at a slight distance apart, and thereby forming sinuous kerfs or channels. 2nd. The pattern comprising the forms A, B arranged side by side, and having their edges formed by sinuous lines, the opposing edges of the forms being concentric and at a slight distance apart, and thereby forming kerfs or channels F between the said forms, and the cross bars connecting said forms together and bridging the kerfs or channels, substantially as described. 3rd. The method of sawing balusters or pickets, consisting in marking on a board the curved outlines of pickets, which are adapted to the contour of each other, so that their curved edges will snugly fit together without intervening spaces when the pickets are arranged side by side, and sawing the said board on the said curved lines to separate the pickets from the board, substantially as described.

No. 29,662. Ventilating Apparatus. (*Appareil de ventilation.*)

Mann's Boudoir Car Co., (assignee of William D. Mann), New York, N. Y., U.S., 8th August, 1888; 5 years.

Claim.—1st. In a device for purifying air, the combination of the air-tank, a mass of fibrous material placed therein for intercepting the current of air as it passes therethrough, means for keeping said material saturated, and a removable reticulated receptacle in which said material is contained, substantially as set forth. 2nd. In a device for purifying air, the combination of the air-tank, the grating G placed across said trunk for the support of ice, reheating medium consisting of a mass of fibrous material placed across said air-trunk beneath the grate G, and a removable reticulated receptacle containing said fibrous material, substantially as and for the purposes set forth. 3rd. In an air-purifying device, the combination, with a mass of fibrous material and reticulated receptacle within which it is contained, an air-trunk within which said receptacle fits having an opening for the insertion and removal of said receptacle, a door closing said opening, and means for keeping the fibre saturated, substantially as set forth.

No. 29,663. Improvements for Attaching Ventilation Break-Syphon and Water Supplies to Earthenware Closets. (*Perfectionnements dans le mode d'ajustage des tuyaux de ventilation et d'eau aux cuvettes des latrines.*)

Booth and Son (assignees of John O. Parker), 8th August, 1888; 5 years.

Claim.—The metal clamp figure 4, and letter M in figure 1, having the four lugs A, B, B, the taper rubber packing E and the metal follower F, and loose tail-piece G enlarged at one end, all in combination with the horn of earthen closet C, said horn having a projection O at its mouth, all as and for the purpose specified.

No. 29,664. Bolting Reel. (*Blutoir.*)

H Ezekiah Bridenbath, Vincennes, Ind., 13th August, 1888; 5 years.

Claim.—1st. The combination of the shaft D, the arms B, the collars C on said arms, some distance from their extremities, the longitudinal ribs A, perforated for the passage of said arms and bearing against the collars C, the impervious material G, supported by said ribs, the circular hoops K, supported at the extremities of said arms, and the bolting material L, stretched over said hoops, substantially as set forth. 2nd. The combination of the shaft D, the arms B, the collars or shoulders C on said arms, some distance from their extremities, the longitudinal ribs A, perforated for the passage of said arms and bearing against the collars C, the impervious material G