

No. 10,139. Improvements in Dumb Stoves.*(Perfectionnements aux poêles-sourds.)*

Joseph Moreau, Jr., Windsor Mills, Que., 10th September, 1879, for 5 years.

Claim.—1st. In a dumb-stove, the combination of the oven C with the shell or body A, air-flues B, arches-sheet E and pipe D; 2nd. In a dumb-stove, the warming oven C.

No. 10,140. Improvements in Rock Drills.*(Perfectionnements aux forets de mines.)*

Thomas B. & Thomas R. Jordan, London, Eng., 10th September, 1879, for 5 years.

Claim.—1st. In a machine for drilling rocks and other hard substances the employment or application of an air or pneumatic cylinder a and piston b; 2nd. A machine for drilling or perforating rocks or other hard substances and in which the action is due to pneumatic pressure upon a piston working in a cylinder, providing the said cylinder with means for taking into the same at each stroke of the piston a small additional supply of air, and for regulating and controlling the pressure therein; 3rd. In, and forming part of a machine for drilling rocks and other hard substances, the mechanism comprising the long nut g secured in the lifting block f and fitted to a screw thread on the drill bar e, and arranged to slide through and turn with a wheel A; 4th. In the said machine and in combination with the other parts of the same, the mechanism for regulating the angular position of the drilling or other implement or of its movement around its axis; 5th. In a machine for deep boring, and similar operations, the means whereby pneumatic pressure may be employed alternately with hydraulic pressure for raising or driving down or forward the drill or perforating implement; 6th. In a machine for hammering, forging and laminating metals, crushing minerals and other like operations, the construction, combination and arrangement of parts.

No. 10,441. Improvements on Valves. *(Perfectionnements aux soupapes.)*

Freeman Brown, Haverhill, Mass., U. S., 10th September, 1879, for 5 years.

Claim.—1st. A conical plunger-valve closing by a longitudinal movement into a surrounding seat of the same form; 2nd. A conical plunger-valve closing by its longitudinal movement into a surrounding seat and being free to turn on its own axis; 3rd. A conical plunger-valve, closing by its longitudinal movement into a seat surrounding it, in combination with two or more eduction pipes or passages, either at its sides or at its inner end, or both; 4th. A conical valve-plug A swivelled to its stem a; 5th. A valve-plug A made detachable from its cap or holder g.

No. 10,442. Improvements on Magazine Guns.*(Perfectionnements aux fusils à répétition.)*

Andrew Burgess, Owego, N. Y., U. S., 10th September, 1879, for 5 years.

Claim.—1st. A reciprocating bolt to close and open the breech, a link or links L pivoted to said breech bolt on a line with the bore of the barrel and in combination therewith, the guard lever pivoted to the other end of the link or links L and operating to open, close and lock the bolt through said link connection without intermediate part; 2nd. The continuous breech bolt B pivoted to and operated by the links L and lever G, all in combination, so that the breech is locked against the frame A; 3rd. The link or links L, pivoted directly to the reciprocating bolt, a guard lever pivoted to the other end of said link or links and operating thereby to move and lock the breech, in combination with the spring T for holding said lever and parts in position; 4th. The breech bolt, links and pin p combined to operate the slide F; 5th. The pivoted extractor having a projection below the pivot or toward the centre of breech block that, closing against the head of a cartridge, turns the hook down over the flange; 6th. A breech bolt, or attachment thereto, having an inclined surface at the lower front end, whereby a cartridge is given a tendency to move forward when raised against the bolt; 7th. A bolt having or carrying an incline at its front end in combination with a vibrating carrier; 8th. In a vibrating cartridge carrier pivoted at its rear and extending forward through or by the operating lever, a spring to press the front of the carrier downward to stop the delivery end of the magazine when the breech is closed, a projection W on the guard lever to operate the carrier and a curved surface C' concentric with the movement of the lever, all in combination to operate as specified.

No. 10,443. Saw Sharpening Machine. *(Machine à affûter les scies.)*

Milo Corel, Chicago, Ill., U. S., 13th September, 1879, for 5 years.

Claim.—1st. The head piece B, having a lateral movement on a curved plane, in combination with the vertical inclined sliding gate C; 2nd. The inclined guides b b in combination with the sliding emery wheel gate C; 3rd. The combination, with the emery wheel F, of the collar E provided with the flange or bead a, or its equivalent; 4th. The combination, with the emery wheel arbor D, of the collar E provided with the flange or bead a; 5th. The combination with the emery wheel gate C, of the adjustable pitman rod G, the sleeve H provided with the set screw h and the loose joint c; 6th. The combination of the adjustable eccentric rod L having a segmental slot, eccentric rod K, the horizontal perforated lever J, loose joint c, sleeve H, pitman rod G, emery wheel gate C and the adjustable stop a; 7th. The combination, with the driving shaft R, of the eccentric and the eccentric rod d, lower feed lever P, pin c, the irregular shaped cam piece o, the vertical feed arm M, the adjustable slide O and the feed finger N; 8th. The combination of the pinion R with the shifting gear T, flange or disk d' having the openings d, d' on the rim of said flange, the guides or wings e e and the pin P; 9th. The combination of the perforated lever U, having the pin P inserted in the loose end, with the rod V and the head piece B.

No. 10,444. Improvements in Carriage Jacks.*(Perfectionnements aux chèvres de voitures.)*

Edwin Prescott, Hampton Falls, N. H., and George W. Gregory, Boston, Mass., U. S., 12th September, 1879, for 5 years.

Claim.—1st. A carriage jack provided with an upright a and a lifting bar C connected together by links e f which are independent of the handle or lifting lever g, the said links working in parallel planes in all positions of the

lifting bar, so as to direct the lifting bar in substantially a straight line and keep it free of the upright; 2nd. The improved carriage jack consisting of an upright a, a lifting bar g connected with it by links e f, at two or more points, and a lifting lever g on a fulcrum independent from the fulcrum of the links.

No. 10,445. Improvements on Folding Boats.*(Perfectionnements aux bateaux composés de plusieurs parties.)*

John W. D. McDonald, Banbridge, Eng., 12th September, 1879, for 5 years.

Claim.—1st. The combination, in a folding boat or vessel, of longitudinal sections or parts or stiff bendable elastic material having the juxtaposed edges of similar shape or curvature, and continuous water proof hinges or joints connecting the said longitudinal sections or parts together; 2nd. The combination, in a folding boat or vessel, of a bottom l, of wood or other stiff bendable elastic material, curved at both its longitudinal edges, two sides 4 of similar material and having their lower edges similarly curved, and two continuous hinges or joints of leather 3 connecting said sides to said bottom; 3rd. The combination, in a folding boat or vessel, of a bottom l, of wood or other stiff bendable elastic material, curved at both its longitudinal edges, two sides 4 of similar material and having their lower edges similarly curved, two continuous hinges or joints of leather 3 connecting said sides to said bottom, risings or ledges 13 fastened to said sides, tapered pieces or guides 14 fixed above said risings or ledges and thwarts or cross seats with recessed ends; 4th. The combination, in a folding boat or vessel, of a bottom l, of wood or other stiff bendable elastic material, curved at both its longitudinal edges, two sides 4 of similar material and having their lower edges similarly curved, two continuous hinges or joints of leather 3 connecting said sides to said bottom, means for keeping said boat or vessel open and spreaders or openers 9 secured by hinges to the bottom of the boat; 5th. In a folding boat or vessel composed of a bottom l, of wood or other stiff bendable elastic material, formed in two parts curved at their outer edges and connected together by a straight central longitudinal water proof hinge or point, two sides 4, of wood or other stiff bendable elastic material, having their edges curved like those of the bottom, two continuous water proof hinges or joints 3 connecting said sides to said bottom and means for keeping said boat open.

No. 10,446. Process for Preserving Butter.*(Procédé de conservation du beurre.)*

Gustave Bischof, London, Eng., 12th September, 1879 for 5 years.

Claim.—The process of preserving butter, or other organic substances, by the application of spongy iron impregnated with water.

No. 10,447. Barbed Wire Fences. *(Clôtures de fil de fer barbelé.)*

Thomas J. Clark, John Forrest, and John G. Short, Woodstock, Ont., (Assignees of George W. Allen, Creston, Ill., U. S., 12th September, 1879, for 5 years.

Claim.—Two short pieces of wire B placed on opposite sides of a twisted double wire A and having their ends twisted together, so as to grip the wire between them and their pointed ends set at four different angles, the whole being japanned.

No. 10,448. Water Meter. *(Hydromètre)*

William B. Mounteney, Chicago, Ill., U. S., 12th September, 1879, for 5 years.

Claim.—1st. The double elastic packing thimble e; 2nd. The strip or rib d in combination with the diaphragm A and the casing of a water meter; 3rd. The improved moulded diaphragm for water meters composed of two or more strata of vulcanized rubber b b and the interposed stratum of textile fabric.

No. 10,449. Combined Hay Rake and Loader.*(Râteau et élévateur à foin combinés.)*

David W. Bovee, Richland Centre, Wis., U. S., 12th September, 1879, for 5 years.

Claim.—The combination, with the main frame D E and elevator F G, of the notched arms H pivoted to the frame, the coiled spring wire catches I fastened to the elevator, arranged to pass over the arms H and by spring pressure take into the notches thereon, thus prevent any accidental displacement of the elevator and at the same time impart a certain degree of flexibility or elasticity to the elevator.

No. 10,450. Underground Telegraph Conductor. *(Conducteur de télégraphe souterrain.)*

Philip Arbogast and Thomas J. McTigue, Pittsburgh, Penn., U. S., 12th September, 1879, for 5 years.

Claim.—1st. The mode of enclosing wires in vitreous material consisting in inserting the wire in a solid mass of molten vitreous material, and then drawing the wires or mass of vitreous material away; 2nd. The mode of forming rods of glass-coated wires by first drawing said wires through a solid mass of molten glass and then through a suitable shaping die; 3rd. The mode of forming rods of glass-coated wires by passing said wires through a guide plate, then through a solid mass of molten glass and finally through a suitable shaping die; 4th. The mode of forming rods or lengths of glass-coated wires by laying the wires between two separate layers of glass or vitreous material and consolidating the whole by heat or pressure, or both; 5th. The mode of forming sections of enoaved glass coated wires by inserting a lining of glass in a metal trough, then laying the wires on said lining, next inserting a top layer of glass and consolidating the whole by heat or pressure, or both; 6th. A fluted glass rod having wires, passing through the same, corresponding to the flutings; 7th. A system glass-coated wires or wires coated with vitreous material encased in a metallic shell open at one side; 8th. In a system of glass-coated wires, the glass having moulded ends; 9th. The detachable perforated guide plate f, as a means of moulding the ends of the lengths and aligning the wires; 10th. As a means of connecting the sections of underground telegraph conductors, two flanged sleeves having enlargements at the middle and embracing the sections with