

Technical and Bibliographic Notes / Notes techniques et bibliographiques

The Institute has attempted to obtain the best original copy available for scanning. Features of this copy which may be bibliographically unique, which may alter any of the images in the reproduction, or which may significantly change the usual method of scanning are checked below.

L'Institut a numérisé le meilleur exemplaire qu'il lui a été possible de se procurer. Les détails de cet exemplaire qui sont peut-être uniques du point de vue bibliographique, qui peuvent modifier une image reproduite, ou qui peuvent exiger une modification dans la méthode normale de numérisation sont indiqués ci-dessous.

- Coloured covers /
Couverture de couleur
- Covers damaged /
Couverture endommagée
- Covers restored and/or laminated /
Couverture restaurée et/ou pelliculée
- Cover title missing /
Le titre de couverture manque
- Coloured maps /
Cartes géographiques en couleur
- Coloured ink (i.e. other than blue or black) /
Encre de couleur (i.e. autre que bleue ou noire)
- Coloured plates and/or illustrations /
Planches et/ou illustrations en couleur
- Bound with other material /
Relié avec d'autres documents
- Only edition available /
Seule édition disponible
- Tight binding may cause shadows or distortion
along interior margin / La reliure serrée peut
causer de l'ombre ou de la distorsion le long de la
marge intérieure.
- Additional comments /
Commentaires supplémentaires:

Continuous pagination.

- Coloured pages / Pages de couleur
- Pages damaged / Pages endommagées
- Pages restored and/or laminated /
Pages restaurées et/ou pelliculées
- Pages discoloured, stained or foxed/
Pages décolorées, tachetées ou piquées
- Pages detached / Pages détachées
- Showthrough / Transparence
- Quality of print varies /
Qualité inégale de l'impression
- Includes supplementary materials /
Comprend du matériel supplémentaire
- Blank leaves added during restorations may
appear within the text. Whenever possible, these
have been omitted from scanning / Il se peut que
certaines pages blanches ajoutées lors d'une
restauration apparaissent dans le texte, mais,
lorsque cela était possible, ces pages n'ont pas
été numérisées.

The Canadian Patent Office

RECORD




Vol. XXIII.—No. 8.

AUGUST 31st, 1895.

Price free by post in Canada and the United States, \$2.00.
SINGLE NUMBERS, - - - 20 Cts.

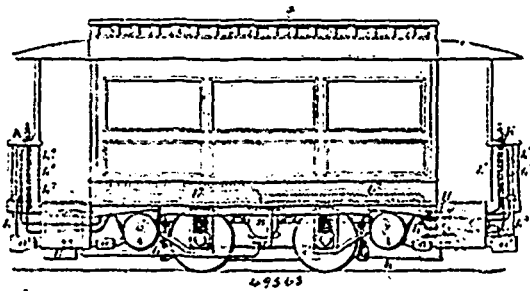
NOTICE.

All solicitors, agents or attorneys who, in circulars or advertisements, or otherwise, refer to the Commissioner or Deputy Commissioner of Patents, or to any other official of the Patent Office, for evidence of their professional standing, do so without authority.

INVENTIONS PATENTED.

NOTE.—Patents are granted for 18 years. The term of years for which the fee has been paid, is given after the date of the patent.

No. 49,568. Gas Motor. (Moteur à gaz.)

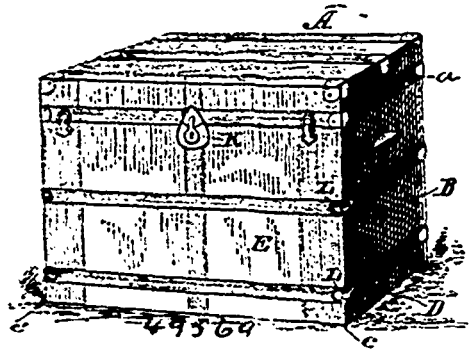


Henry Percy Holt, No. 22 Chancery Lane, London, England, 1st August, 1895; 6 years.

Claim.—1st. A horizontal gas motor engine fixed at one side of the lower part of the car and working a vertical crank shaft carrying a horizontal fly wheel under the car. 2nd. A primary countershaft driven by bevel gearing from the fly wheel shaft and having loose on it a pair of toothed wheels of different diameters provided with clutches by which either wheel can be engaged with the countershaft. 3rd. A pair of secondary countershafts each carrying a pair of toothed wheels gearing with those on the primary countershaft and carrying also sprocket-wheels which are connected by chains to sprocket wheels on the axles of the car, or connected to the axles by equivalent gear. 4th. A pair of clutches on the primary countershaft, each consisting of friction plates which are pressed together by inflation of a coil of flexible pipe or its equivalent with gas under pressure. 5th. A brake cylinder having its piston subjected to the pressure of compressed gas on the movement of a valve for the purpose of putting on the brakes. 6th. A set of reservoirs containing compressed gas communicating through suitable reducing valves with the clutch coils, and the brake cylinder and from an expansible part of the latter with the engine cylinder. 7th. For

working the exhaust valve and the gas supply valves, also the ignition apparatus, a compound cam on the valve countershaft driven by stops arranged to suit the revolution of the shaft in either direction. 8th. The apparatus for lubricating the engine cylinder wherein an oil valve is partially opened by the reduction of pressure due to suction of the gas charge operating on a piston of its equivalent to which the oil valve is connected. 9th. The arrangement on a platform at each end of the car of a lever for moving the valve of the brake cylinder, and of a valve communicating by supply and discharge pipes with the flexible pipe coils with the two clutches. 10th. The method described of reversing the engine by stopping the gas supply and so reducing the speed to a certain point, the giving supply of combustible charge and igniting the charge before the crank attains its back centre, thus propelling it in the reverse direction.

No. 49,569. Trunk. (Coffre.)



Florence Irene Leonard, Arlington, Georgia, U.S.A., 1st August, 1895; 6 years.

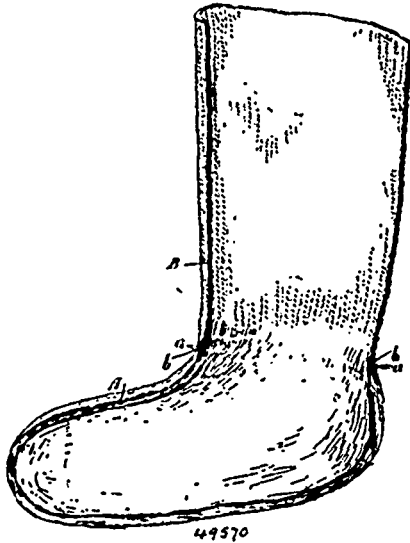
Claim.—The trunk herein described consisting of the fixed back, bottom and ends, the series of drawers sliding in and out above the bottom and extending from end to end of the trunk and cross plate or partition extended between the ends of the trunk above the lower series of drawers, the hat box fixed on said partition at one end, thereof and extended upward to the top line of the trunk ends said hat box being closed at front and provided with a hinged lid, the box-like fixed tray extended between the upper edge of the inner side of the hat box and the opposite end of the trunk and fixed rigidly to both such parts and to the back of the trunk forming with the hat box at all times a box-like brace for the upper part of the trunk, the hinged lid for the fixed tray, the short drawer sliding in the space below such fixed tray and above the cross partition the hinged front and the top, all substantially as and for the purpose set forth.

No. 49,570. Manufacture of Seamless Woolen Boots. (Fabrication de chaussure de laine sans couture)

Edward Ross, Elmira, Ontario, Canada, 1st August, 1895; 6 years.

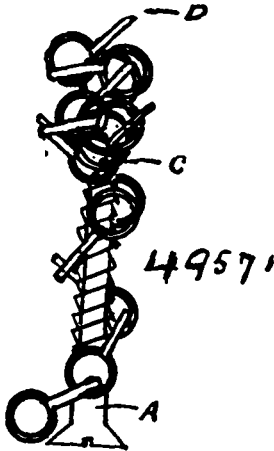
Claim.—A seamless woolen boot comprising a felt foot portion

and a woven or knitted upper or leg portion extending down between thinned out layers at the top of the combined felt portion and



hardened and felled into the recess so formed as and for the purpose specified.

No. 49,571. Puzzle. (Jeu de patience.)



Thomas Paterson, Peterborough, Ontario, Canada, 1st August, 1895; 6 years.

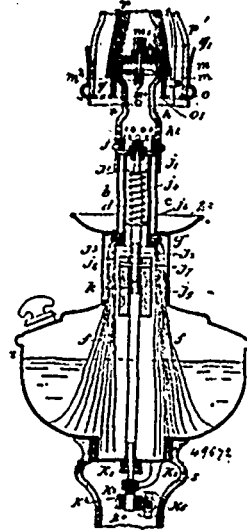
Claim.—A puzzle composed of a screw and a chain operated, substantially as shown and described.

No. 49,572. Vapour Lamp. (Lampe à vapeur.)

Victor Simonet, 25 Untere Donaustrasse, Vienna, Austrian Empire, 1st August, 1895; 6 years.

Claim.—1st. In a vapour lamp, the combination with the reservoir for the liquid volatile hydrocarbon of a chamber, so arranged upon the reservoir that the inner hollow space of the said chamber forms an upward extension of the inner hollow space of the said reservoir, the said chamber having metal sides and an orifice at its top, a porous lining of the sides of the chamber, and a sucking wick extending downward from the lower edge of the said lining into the liquid hydrocarbon, the said wick consisting of loose threads or an open-worked tubular fabric, substantially as shown and described. 2nd. In a vapour lamp, the combination with the hydrocarbon reservoir the metal-sided chamber arranged upon and freely communicating with the same, the porous lining of the said chamber and the wick depending from the lining into the liquid hydrocarbon of a tube extending from the bottom of the reservoir up into the said chamber and a valve for controlling the top aperture of the said chamber, the rod of the valve extending downward within the said tube, substantially as shown and described. 3rd. In a vapour lamp, the combination with the vapourizing chamber having an outlet in its top side

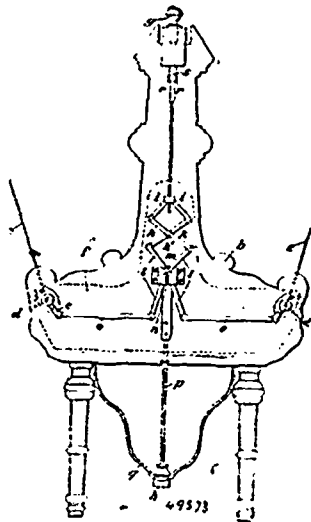
of a vertically movable valve controlling this outlet, a spring so arranged as to tend to close the valve, a weight connected with the



valve and exceeding the force of the spring, and a rod upon which the valve rests under the action of the weight, and which is adapted to be displaced endwise, substantially as shown and described. 4th. In a vapour lamp, the combination with the hydrocarbon reservoir, the vapourizing chamber arranged upon and communicating with the same, the inner porous lining of the said chamber and the sucking wick of a Bunsen burner seated upon the said metal-sided chamber and having so short and thick metal sides as to be enabled sufficiently to heat the vapourizing chamber by conduction, substantially as shown and described. 5th. In a vapour lamp, the combination with the hydrocarbon reservoir, the vapourizing chamber arranged upon and communicating with the same, the inner porous lining of the said chamber, the sucking wick depending from the lower edge of the porous lining into the liquid hydrocarbon, a tube extending from the underside of the reservoir up into the vapourizing chamber, a valve controlling the outlet-orifice at the top of the said chamber, the rod of the said valve extending downward through the said tube, and gear for raising and lowering the said valve rod, of a Bunsen burner seated upon the said metal-sided vapourizing chamber and having so short and thick metal sides as to be enabled sufficiently to heat the vapourizing chamber by conduction, substantially as shown and described. 6th. In a vapour lamp, the combination with the hydrocarbon reservoir, the metal-sided vapourizing chamber arranged upon and freely communicating with the same, the porous lining of the said chamber, the sucking wick, the tube extending through the bottom of the reservoir up into the vapourizing chamber, a valve controlling the outlet-orifice of the said chamber and having its rod guided in the said tube, a spring so arranged as to tend to keep the said valve closed, a weight connected with the said valve, and endwise movable rod guided in the said tube below the valve-rod, and gear for operating the said endwise movable rod of a Bunsen burner seated upon the vapourizing chamber and having so short and thick metal sides as to be enabled sufficiently to heat the vapourizing chamber by conduction, substantially as shown and described. 7th. In a vapour lamp, the combination with a Bunsen burner of a fan wheel so arranged within the top portion of the burner as to be rotated by the current of vapour and air, substantially as and for the purpose set forth. 8th. In a vapour lamp, the combination with a Bunsen burner having a closed, perforated top side of a pin extending downward from the centre of the said top side and a fan wheel having its boss adapted to revolve round and to slide along the said pin, substantially as shown and described. 9th. In a vapour lamp, the combination with a metal-sided vapourizing chamber of a Bunsen burner seated upon the said chamber, and having so short and thick metal sides as to be enabled sufficiently to heat the vapourizing chamber, and a fan wheel so arranged within the top portion of the burner as to be rotated by the current of vapour and air, substantially as and for the purpose set forth. 10th. In a vapour lamp, the combination with a metal-sided vapourizing chamber of a Bunsen burner seated upon the said chamber, this burner being closed and perforated at its top and having so short and thick metal sides as to be enabled sufficiently to heat the vapourizing chamber by conduction, a pin extending downward from the centre of the top side of the burner, and a fan wheel having its boss adapted to revolve round and to slide along the said pin, substantially as described. 11th. In a vapour lamp, the combination with the hydrocarbon reservoir, the vaporizing chamber arranged upon and communicating with the same, and porous lining of the said chamber, the sucking wick and the short, thick-sided Bunsen burner seated upon the vapourizing chamber of a fan wheel so arranged within the top portion of the burner as to be rotated by

the current of vapour and air, substantially as and for the purpose set forth. 12th. In a vapour lamp, the combination with the hydrocarbon reservoir, the metal-sided retort arranged upon the reservoir, the inner porous lining of the retort, the sucking wick depending from the lower edge of the lining into the reservoir, the valve controlling the outlet of the retort, the guide-tube of the valve rod extending downward through the bottom of the reservoir, gear for operating the said valve and the short thick-sided Bunsen burner seated upon the retort of a fan wheel so arranged within the top portion of the burner as to be rotated by the current of vapour and air, substantially as shown and described and for the purpose specified. 13th. In a vapour lamp, the combination with the hydrocarbon reservoir, the retort arranged upon it and having a porous lining, the sucking wick connecting the lining with the liquid volatile hydrocarbon, the valve controlling the outlet of the retort, the tube wherein the valve-rod is guided and which extends downward through the bottom of the reservoir, the spring arranged to urge the valve to its seat, the weight connected to the valve, the valve operating rod guided in the said guide-tube, the gear for operating the said rod and the short thick-sided Bunsen burner seated on the retort of a fan wheel so arranged within the top portion of the burner as to be rotated by the current of vapour and air, substantially as shown and described and for the purpose set forth. 14th. In a vapour lamp, the combination with the hydrocarbon fount, the retort arranged upon the same and having a porous lining, the sucking wick connecting the said lining with the liquid hydrocarbon, and the Bunsen burner seated upon the metal-sided retort, and having so short and thick well conducting sides as to be enabled to sufficiently heat the retort, and a closed perforated top, of a pin extending downward from the centre of the top side of the burner, and a fan wheel having its boss adapted to revolve round and to slide along the said pin, substantially as described. 15th. In a vapour lamp, the combination with the hydrocarbon fount, the metal sided retort arranged upon the same and having a porous lining, the sucking wick depending from the lining into the fount, the thick-sided short Bunsen burner seated upon the retort and having a closed and perforated top, the valve controlling the communication between the retort and the burner, the guide-tube of the valve-rod extending downward through the bottom of the fount and gear for operating the said valve-rod, of a pin extending downward from the centre of the top side of the burner, and a fan wheel having its boss adapted to revolve round and to slide along the said pin, substantially as and for the purposes set forth. 16th. In a vapour lamp, the combination with the hydrocarbon fount, the retort arranged upon the same and having a porous lining, the sucking wick connecting the lining with the liquid hydrocarbon, the thick-sided short Bunsen burner seated upon the retort and having a closed, perforated top, the valve controlling the passage between the retort and the burner, the guide tube of the valve rod extending downward through the bottom of the fount, the spring arranged to urge the valve to its seat, a weight connected with the valve, the valve operating rod guided in the said guide tube and gear for operating the said rod, of a pin extending downward from the centre of the top side of the burner, and a fan wheel having its boss adapted to revolve round and to slide along the said pin, substantially as shown and described and for the purposes specified.

No. 49,573. Spittoon (Crachoir.)

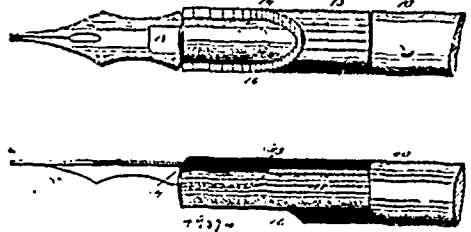


Fredinand Diederich, Halle on the Saale, Germany, 1st August, 1895; 6 years.

Claim.—A hygienic spittoon in the form of a stand, characterized by a vessel *a*, adapted to be closed within a cover *c* and removably supported in a frame *b*, the opening of the vessel taking place by

pressing with the hand upon the knob *g* or by pressing with the foot upon the foot lever *h* through the intervention of a lever mechanism *i, k, l, o*, and the cranks *c*, and the closing taking place on the cessation of the pressure with the hand or foot while the vessel is caused to remain open continuously by turning the knob *g*, so that on the turning back of the knob and the cessation of the pressure the closing takes place automatically, substantially as herein described and shown and for the purpose set forth.

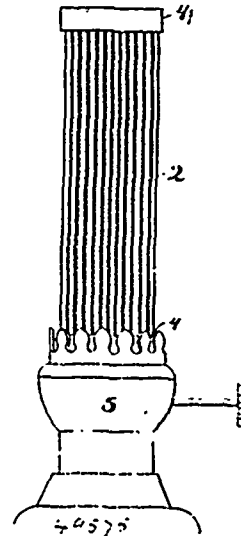
No. 49,574. Pen Holder. (Porte-plume.)



Bertram John Young, Sheffield, England, 1st August, 1895; 6 years.

Claim.—1st. The combination, with the pen holder, of a pen holding sheath mounted thereon, the sheath having a longitudinal opening in one side, substantially as described. 2nd. The combination, with the pen holder, having a reduced end, of the revoluble sheath on the reduced end, the sheath having a longitudinal opening on one side, substantially as described. 3rd. The combination, with the pen holder, having at one end and on one side a pen-holding recess, of the sheath mounted on the holder so as to cover the recess, the sheath having a longitudinal opening on one side, substantially as described.

No. 49,575. Chimney. (Cheminee.)



Samuel Bernheim, New York, State of New York, U.S.A., 1st August, 1895; 6 years.

Claim.—1st. A chimney for gas or other burners, composed of separate glass rods held in position, substantially as shown and described. 2nd. A chimney for gas or other burners, composed of separate tubular glass rods, provided with heads having annular U-shaped chambers, by which the rods are held in the proper form, substantially as shown and described. 3rd. A chimney for gas or other burners, composed of tubular rods united, substantially as and for the purposes set forth. 4th. A chimney for gas or other burners, composed of separate glass rods held in the required form by means of heads having annular U-shaped chambers filled with cement, substantially as shown and described.

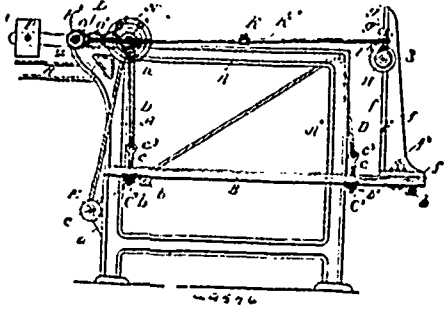
No. 49,576. Paper Feeding Machine.

(Machine d'alimentation de papier.)

Nelson E. Funk, Elkhart, Indiana, U.S.A., 1st August, 1895; 6 years.

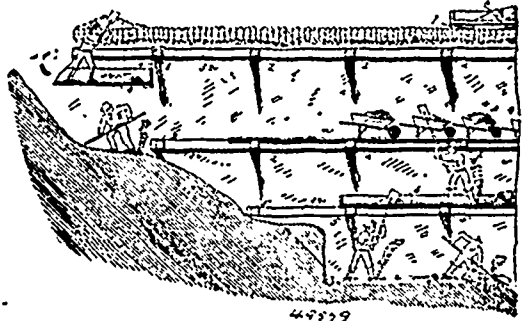
Claim.—1st. A paper feeding machine comprising a table to receive a quantity of sheets of paper or similar material, a roller adapted to rest and revolve upon the material at the forward end of the machine, and a rotary cutting disc to rest upon the rear edges of said sheets, substantially as described. 2nd. A feeding machine

comprising a table to receive a quantity of sheets of paper or similar material, two or more rollers driven positively at a uniform speed



and terminating in a valve controlled head which directs the volatilized gasoline downwards, and a flue in said cover extending vertically down into said deflector in which it ignites and by which it is spread directly against said base-plate. 2nd. The combination in a self-heating sad-iron, of a base-plate, and an inverted saucer-shaped deflector having an opening in its top and secured directly to but elevated slightly above said base-plate, with a hollow cover fitting over and removably secured to said base-plate, and having its upper interior surface protected by a suitable insulating material, a gasoline tank supported by and having pipes extending therefrom into said cover and passing up therethrough to and terminating in a hand controlled head which directs the volatilized gasoline downwards, and a flue in said cover extending vertically down to and discharging the said volatilized gasoline down into said deflector in which it ignites and by which it is directly against said base-plate.

No. 49,579. System of Excavating and Refilling Trenches. (Système de creuser et remplir les fossés.)



Bernard J. Coyle, Washington, Columbia, U.S.A., 1st August, 1895; 6 years.

Claim. 1st. The method of excavating, constructing and refilling trenches, which consists in excavating a desired length to the bottom in advance, constructing the sewer or other structure, and conveying the material thereafter excavated upon ways within the excavation, and below the ground surface to the rear, and refilling with it upon the constructed work, as set forth. 2nd. In a system of underground excavating and refilling, the combination with the beams located across the trench at its surface, of the dependent tray suspended therefrom, within the trench, substantially as specified. 3rd. In a system of excavating and refilling trenches, the combination with the elevated timbers, firmly secured against the sides or suspended from above, of the way of track supported thereon, substantially as specified. 4th. A system of bracing open trenches, consisting of a series of horizontal stringers or timbers, placed along the same, with cross beams firmly driven and secured to them, thus supporting the sides without vertical planks or sheathing boards, as set forth. 5th. The combination with the cross beams and horizontal stringers which brace the sides of the trench, of the ways and, the tray located below the same, whereby the earth from the lower portion of the trench may be elevated and conveyed to the point of deposit, substantially as specified. 6th. In a system of excavating and refilling, the combination with the beams arranged across the trench in which the operations of excavating and refilling are being conducted of the platform whereon the concrete is prepared, and the chute, whereby it is delivered to the trench below, substantially as specified.

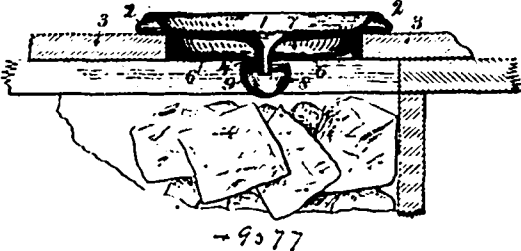
No. 49,580. Fare Box. (Boîte à billets.)

John Maitland Smith, Toronto, Ontario, Canada, 1st August, 1895; 6 years.

Claim.—1st. In a fare box, the combination with a plunger having a lateral projection, of a spring hammer having the end extending normally in the path of the projection on the plunger and a bell located opposite the hammer, as and for the purpose specified. 2nd. In a fare box, the combination with the receiving flaps, of means connected to the plunger for opening and closing the flaps, as and for the purpose specified. 3rd. The combination, with the receiving flaps pivoted at their upper edges, as specified, and having pins extending outwardly from one end of their lower ends, of a spring held plunger having a limited movement and an arm provided with a downwardly extending fork with broad V-shaped notches arranged, as shown and for the purpose specified. 4th. In a fare box, in combination with the receiving flaps, of a receiving slot in the top of the box located obliquely to the edges thereof, as and for the purpose specified. 5th. In a fare box, the combination with the receiving slot, of a closing plate suitably supported and means for throwing it from beneath the receiving slot, as and for the purpose specified. 6th. In a fare box, the combination with the receiving slot, of a closing plate suitably supported and means connected to the plunger for throwing the plate from beneath the slot upon the downward depression of the plunger and restoring it to its normal position upon the plunger springing upwardly, as and for the purpose specified.

and supported to move freely and independently upon the paper in different planes of rotation, substantially as described. 3rd. A paper feeding machine comprising a table to support separate sheets of paper or similar material, two or more rollers driven uniformly and supported upon arms having independently adjustable pressure attachments to act with greater or less force upon the paper by either roller, substantially as described. 4th. A paper feeding machine comprising a vertically adjustable table to support a quantity of sheets of paper or similar material, a swinging rubber roller at the forward end, and a gravity paper holder at the rear end to rest upon feed and hold the paper and follow the irregular vertical adjustment of the table, substantially as described. 5th. A paper feeding machine comprising a frame, a vertically adjustable table, cords extending over rollers to each corner of the table and over a winding shaft and pulleys to elevate the table, adjustable connections between the cords and corners of the table, and friction feed rollers upon the frame of the machine, substantially as described. 6th. A paper feeding machine comprising a vertically adjustable table to support a quantity of sheets of paper, a revolving paper roller at the forward end of the frame, and an adjustable guide standard carrying a gravity paper holder at the rear end of the table, substantially as described.

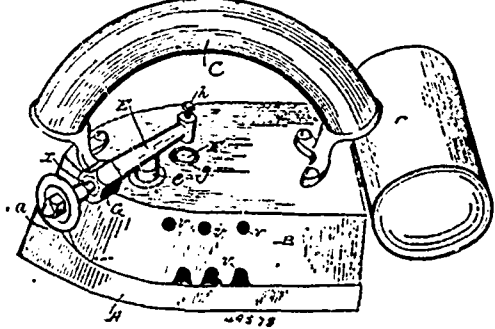
No. 49,577. Drinking Fount. (Fontaine)



Benjamin Fletcher, Toronto, Ontario, Canada, 1st August, 1895; 6 years.

Claim.—In drinking founts, a drip pan having an upper and a lower bottom forming a chamber between and through which an outlet from above the upper bottom is provided, and having a trap bowl on the lower end of said outlet beneath the lower bottom, substantially as shown and described.

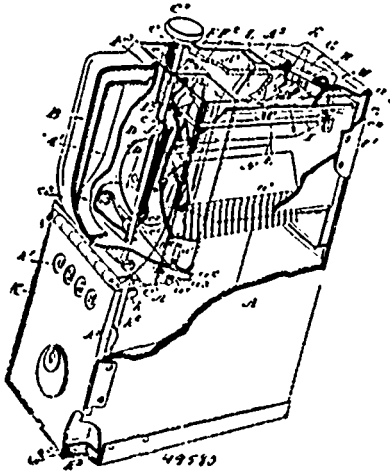
No. 49,578. Sad-Iron. (Fer à repasser.)



Charles M. Coates and Charles E. Corlett, both of Aurora, Illinois, U.S.A., 1st August, 1895; 6 years.

Claim. 1st. The combination in a self heating sad iron of a base-plate, and an inverted saucer-shaped deflector, with a hollow cover fitted over and removably secured to said base plate, a gasoline tank supported by and having pipes extending therefrom into said cover

7th. In a fare box, the combination with the receiving slot, of a closing plate suitably supported by a loop shaped rod held in guid-



ing brackets attached to the side of the fare box and a plunger having a plate secured thereto, provided with a slot, partially oblique, formed to operate against the end of the loop, as and for the purpose specified. 8th. The combination, with the receiving slot and closing plate and means for operating such closing plate, of a ridge plate pivoted below the closing plate and having an upwardly extending end with the closing plate is designed to come in contact, as and for the purpose specified. 9th. The combination, with the receiving slot and closing plate having fingers *h*, and means for operating such closing plate, of a ridge plate pivoted below the closing plate and having an upwardly extending end with which the closing plate is designed to come in contact and slots in the ridge plate to permit of its free upward movement past the fingers *h*, as and for the purpose specified. 10th. The combination, with the receiving slot, closing plate and ridge plate operated from the closing plate and having a narrow end *m'* as specified, and cut away end portions *m''*, of a diaphragm *L*, provided with a notch *l*, as and for the purpose specified. 11th. In combination, the top having a transparent glass plate *A'* receiving slot made in top, the ridge plate *M*, and the transparent diaphragm *M* all arranged, as and for the purpose specified. 12th. The combination, with the top hinged at one end as specified, of the retaining bolts *a'* passing down through the lower ends of the bolts rigidly, as and for the purpose specified. 13th. The combination with the top hinged at one end as specified, of the retaining bolts *a'*, passing down through the fare box below the plate *A''*, and key slots *a''*, and tapered keys *a''*, constructed as shown and for the purpose specified. 14th. The combination with the plunger having an outwardly extending arm at its bottom end, of the dog *k*, designed to be pressed by the arm at the bottom of the plunger, so as to operate the registering mechanism, as and for the purpose specified. 15th. In a fare box a locking flap having the lunge consisting of loops *l'* and lips *l''*, fitting beneath loops *l'*, at the edge of the opening and a pin to extend through the loops, as and for the purpose specified. 16th. In a fare box a locking flap having a hinge consisting of loops *l''* and lips *l''*, and an inwardly extending edge *k'*, extending around the flap into grooves *k''*, made at the edge of the opening and in the casing, as and for the purpose specified. 17th. In a fare box the combination with the final receiving chamber, of a ridge plate extending throughout the length of the chamber at the top thereof and a series of flat fingers pivoted beneath the edge of the ridge plate and abutting each other and arranged, as and for the purpose specified. 18th. The combination with the plunger having notches *c'*, of a forked plate *O*, held in suitable guides and designed to be brought when desired so that the members of the fork will extend into the notches of the plunger, as and for the purpose specified.

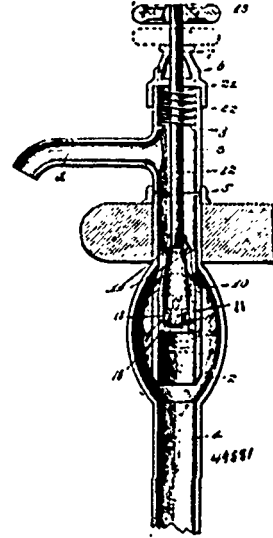
No. 49,581. Self Closing Cock or Faucet.

(*Robinet ou fausset automatique.*)

George S. Murphy, Sherman, Texas, U.S.A., 1st August, 1895; 6 years.

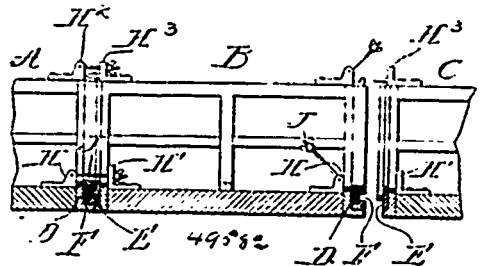
Claim.—1st. A self-closing cock or faucet, comprising a section of pipe having an elongated chamber formed therein, a nozzle fixed to the upper end of said pipe, an inner pipe vertically arranged within the chamber, and constructed with a series of apertures in its upper end, a cylindrical valve with a conical upper end located and operating within the upper end of the inner pipe, a spring-actuated plunger, rod fixed to and extending upwardly from the upper end of the cylindrical valve, a handle fixed to the upper end of the plunger rod, and a perforated drop valve arranged to automatically form and close the passage through the lower end of the cylindrical valve.

2nd. A self closing cock or faucet, comprising a length of pipe having an elongated chamber formed adjacent to the upper end thereof, a pipe



having a faucet-nozzle and fixed to the upper end of the first mentioned pipe, an inner pipe having a slightly conical upper end and provided with a series of perforations in said conical upper end, said pipe being vertically arranged within the chamber in the first mentioned pipe, a cylindrical valve having a slightly conical upper end and constructed to fit snugly within the upper end of the inner pipe, said cylindrical valve having a series of perforations in its conical upper end, a spring-actuated plunger-rod attached to, and extending upwardly from the cylindrical valve, and a drop valve held to move vertically within the lower end of the cylindrical valve and provided with a series of perforations in its lower end. 3rd. In a self-closing cock or faucet, the combination of a vertically arranged valve-seat or inner pipe located within the supply pipe and provided with a series of perforations in its upper end, a vertically moving cylindrical valve having perforations in its upper end, the same lying in a plane above the upper end of the valve-seat, a plunger-rod for operating the cylindrical valve, and a drop-valve constructed with a series of perforations in its lower end and held to move vertically in the lower end of the vertically moving valve. 4th. In a device of the class described, a vertically moving valve having a plurality of apertures in its upper end and provided at its lower end with an annular cutaway portion, and a drop-valve constructed with a closed bottom, a series of apertures above said closed bottom, and an annular flange at its lower end to engage the annular cutaway portion in the vertically moving valve. 5th. In a device of the class described, the combination of a cylindrical valve operating vertically within a cylindrical valve-seat to close the passage of water from the supply pipe to the faucet, and a drop valve located and held to move vertically in the lower end of the vertically moving valve and operated by the water pressure to cut off the passage through the vertically moving valve.

No. 49,582. Boat. (Vaisseau.)



Charles C. Heimbaugh, Moline, Illinois, U.S.A., 1st August, 1895; 6 years.

Claim.—1st. A sectional boat having joining members at the ends of the sections, one of which joining members provided with a receptacle in which is placed a gasket and the other joining member having a projection for engaging said receptacle and gasket, combined with means for fastening the parts together in the manner shown for the purpose described. 2nd. In a sectional boat the combination of joining members for the ends of the sections, one of which joining members having a receptacle in which is placed a

gasket and the other joining member having a projection for engaging the said receptacle and gasket with fastening devices for holding the parts together, said fastening devices consisting of lugs fastened to the frame of the boat, and the lugs on one part provided with a pivoted bolt and the lugs on the other part provided with a slot adapted to receive the bolt in the manner shown and for the purpose described. 3rd. In a sectional boat the combination of a fastening device having the projections K and K1, with the pivoted bolt J and slot J1 for engaging the bolt, substantially as shown and described.

No. 49,383. Cypher Combination for Telegraphing.
Etc. (Combinaison de dépêche chiffrée pour le telegraphie, etc.)

PRICE	10 Barrels	20 Barrels	50 Barrels	100 Barrels
12/-	abcd	abus	adiev	appor
13/-	atech	accar	adiev	apput
14/-	atequ	aceed	adjur	agac
15/-	ablu	uccot	admir	agenc
16/-	abot	accus	addon	agiot
17/-	abard	accir	adoss	agnel
18/-	aboz	actiel	adoub	agray
19/-	abreg	activ	appam	agreg
20/-	abrit	adapt	appil	alian
	e	e	e	e

+ 4553

Clement W. Bowman, Ingersoll, and Granville S. Decatur, Hamilton, both in Ontario, Canada, 1st August, 1895; 6 years.

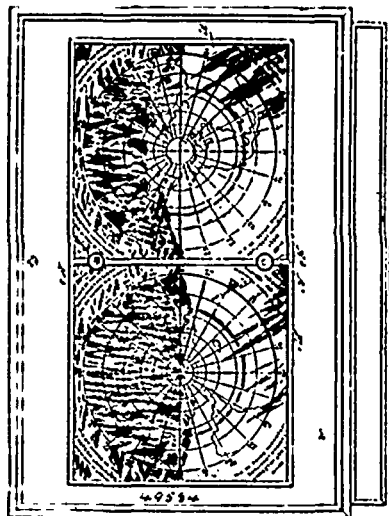
Claim.—1st. In a cypher combination for telegraphic or cable communications, consisting of separating the stem or root part of words having common endings from such endings and combined again to represent meanings, substantially as described and set forth. 2nd. In a cypher combination for telegraphic or cable communications, a system of separating the root or stem part of words having common endings from such endings and assigning to each separated part an arbitrary meaning, and then in cabling, join the separated parts to form one word with all the meanings assigned to the individual parts, substantially as described and set forth. 3rd. A system of dividing the stem, or root part of words having common endings, from such endings and having the stem, or root part to represent any sentence, price, quantity, quality, material, etc., or any combination of the same, also the common endings to represent any other sentence, price, quantity, quality, material, etc., or any combination of the same, and the two parts joined together in one, forming a complete word, and representing the sentences, prices, quantities, qualities, materials, etc., as may be indicated by the different parts of the words separately, substantially as described and set forth.

No. 49,584. Map. (Carte.)

Miguel Arriaga, Mexico City, Mexico, 1st August, 1895; 6 years.

Claim.—1st. A map provided with a revoluble disc, a fixed board to represent the night zone, and a movable band for representing the twilight zone, substantially as described. 2nd. A map provided with a day zone and a night zone, and a twilight zone movable relatively thereto, substantially as described. 3rd. A map, comprising two revoluble transparent discs representing hemispheres, and a fixed shaded board below the said discs, substantially as shown and described. 4th. A map, comprising two revoluble transparent discs representing hemispheres, a fixed shaded board below the said discs, and a movable band representing twilight, below the said revoluble discs and over the said fixed boards, substantially as shown and described. 5th. A map, comprising two revoluble transparent discs representing hemispheres, a fixed shaded board below the said discs, a movable band representing twilight, below the said revoluble discs and over the said fixed boards, and means, substantially as described, for imparting motion to the said band in opposite directions, as set forth. 6th. A map provided with a movable zone representing twilight, substantially as shown and described. 7th. A map provided with a revoluble transparent disc, and a fixed dark board below the said disc, substantially as described. 8th. A map, comprising a transparent revoluble disc, and a fixed India-rubber sheet below the said disc to represent the

night zone, substantially as described. 9th. A map, comprising two revoluble discs representing hemispheres, an operative comec-



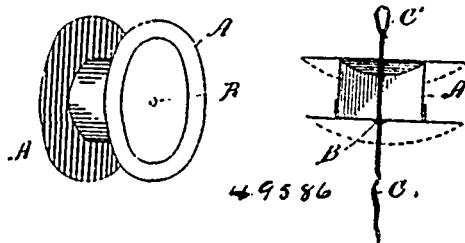
tion between the said discs whereby they are compelled to rotate in opposite directions, and a clock-work mechanism for actuating the discs, substantially as described.

No. 49,585. Crypto-Malt. (Drêche.)

The Chicago Crescent Company, assignee of Charles Lehman Hart, both of Chicago, Illinois, U.S.A., 1st August, 1895; 6 years.

Claim.—1st. The method of obtaining koji for starch conversion, which consists in subjecting a moist granular inert supplemental base having a nutrient base coating thereon in admixture with the requisite spores, to humid air circulating at proper temperature, (occasionally stirring the granular mass if necessary) and when the resultant plant growth has attained its diastase stage, separating the koji product from its inert base, substantially as described. 2nd. The method of obtaining koji for starch conversion, which consists in subjecting a moist granular inert supplemental base such as sand having a nutrient base coating of gelatinized starch thereon in admixture with the requisite spores, to humid air circulating at proper temperature (occasionally stirring the granular mass if necessary) and when the resultant plant growth has attained its diastase stage, separating the koji product from its inert base, substantially as described. 3rd. In production of koji for starch conversion, the method of growing a spore-crop which consists in subjecting a moist granular inert supplemental base having a gelatinized nutrient base coating thereon in admixture with the requisite spores, to humid air circulating at proper temperature, (occasionally stirring the granular mass if necessary) and when the resultant plant growth and its scrupito-spores are suitably matured, separating the crop from the inert supplemental base, substantially as described.

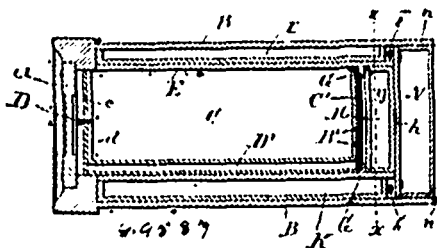
No. 49,586. Device for Catching Flies and other Winged Insects. (Attrape-mouche.)



Elh Marshall, High Street, Henfield, England, 1st August, 1895; 6 years.

Claim.—1st. A fly catcher consisting of a hollow reel or barrel having a perforation in each head and adapted to hold viscous matter, substantially as set forth. 2nd. In a fly catcher, the combination of a receptacle A having a perforation in each head and adapted to hold viscous matter, and a looped funicle C passing through said perforations, substantially as and for the purposes herein specified.

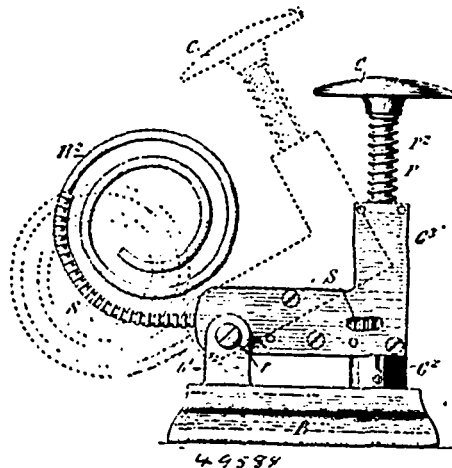
No. 49,387. Drawer for Safes. (Tiroir pour coffres-forts.)



Alonzo B. Eastman, assignee of Murray E. Hart, both of Wellsborough, Pennsylvania, U.S.A., 2nd August, 1895; 6 years.

Claim. 1st. The combination with a burglar-proof safe drawer having a door at its front end, of the skeleton casing secured to the sides of the drawer upon the inside of the latter so as to leave an opening or space between the said skeleton casing and drawer at the top, bottom, sides and rear end, for the purpose set forth. 2nd. The combination with a drawer having a door at its front end, and the removable box closing its rear end, of the skeleton casing secured to the said skeleton casing and the drawer, for the purpose set forth. 3rd. The combination with a drawer, of the central telescoping compartment or cash drawer having a receptacle or compartment in its bottom, of the removable false ends, and the slidable lock with which one of the said ends is provided, as set forth. 4th. The combination with a drawer, of the central telescoping compartment or cash drawer having a receptacle or compartment in its bottom, the removable rear end, and the slidable lock with which the said end is provided, for the purpose set forth. 5th. In a drawer, the parts B, and C, telescoping each other, and the false ends of the latter part, one of which being provided with a slidable lock, combined with the skeleton casing located between the said two parts, and secured to the part B, substantially as and for the purpose set forth. 6th. In a drawer, the parts, B and C, telescoping each other, the latter part having a bottom compartment, the divided end adapted to give access at the front end of the said bottom compartment, and the false end provided with a slidable lock and adapted to be removed to give access to the said bottom compartment at its rear end, as set forth. 7th. In a burglar-proof drawer, the combination of the skeleton casing, the central compartment or cash drawer inclosed by the said casing, combined with the trays, the receptacles, the box located in the end of the casing, and the box located in and closing the end of the drawer, substantially as set forth. 8th. The combination with a burglar-proof drawer, of the skeleton frame inclosed by the drawer and having top and bottom flanges to which the drawer is secured, the central compartment and rim with which the said casing is provided, substantially as shown and described, and for the purpose set forth. 9th. The combination with a burglar-proof drawer, of the skeleton casing secured in the drawer so as to leave a series of openings or spaces, the compartment inclosed by the said casing, the boxes, one located in the end of the casing and closing it, and the other located in the end of the drawer and closing it, and the tapes with which the said boxes are provided for removing them, substantially as shown and described.

No. 49,388. Stapling Machine. (Machine à cramper.)

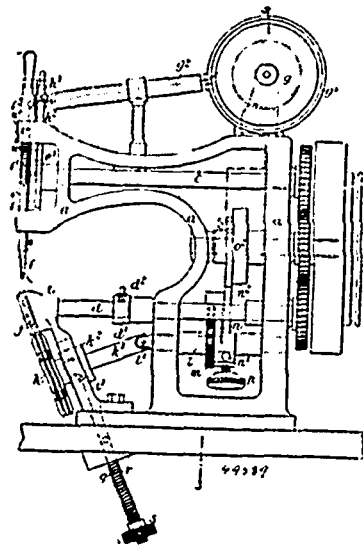


Edwin T. Greenfield and Charles J. Kuntner, both of New York, State of New York, U.S.A., 2nd August, 1895; 6 years.

Claim. 1st. In a stapling machine a spirally disposed support adapted to sustain a strip of united staples, the distance between

the convolutions of said support being such as to prevent the legs of the staples from interfering with each other as the material is fed forward. 2nd. In a stapling machine a spirally disposed support adapted to sustain a strip of united staples in combination with feeding mechanism adapted to feed the material forward and a plunger adapted to shear off and drive a single staple at each operation, the distance between the convolutions of the spirally disposed support being such as to prevent the legs of the staples from interfering with each other as the material is fed forward. 3rd. A stapling machine provided with mechanism for feeding forward a strip of completed staples, a single plunger for severing and driving one staple at a time and a clenching anvil for clenching the staple upon the underside of the material to be bound, said feeding mechanism being carried by an arm pivoted to the base of the machine and provided with means for preventing the forward movement of the completed strip of staples, and additional yielding means which is brought into action after the strip of staples is checked in its forward movement and is thereby adapted to feed the strip forward only after each complete operation. 4th. A stapling machine provided with mechanism for feeding a strip of completed staples forward as they are used one at a time, a single staple severing and staple driving plunger, said feeding mechanism and plunger being carried by an arm pivotally secured to the base of the machine, in combination with a yielding supported anvil adapted to bend the inner ends of the staple inward as they are driven through the material to be bound, a stationary or fixed anvil adapted to clench the ends into the under surface of the material at the completion of the stroke of the plunger, means for preventing the forward movement of the staple strip after the staple has been placed in position beneath the plunger, and a yielding attachment in connection with the feeding mechanism which permits said feeding mechanism to yield after the staple strip has been checked in its forward movement. 5th. A stapling machine provided with a single plunger adapted to sever and drive one staple at a time from a strip of completed staples, a clenching anvil for clenching the free ends of the staples upon the under side of the material to be bound, checking or holding means for preventing forward movement of the completed strip of staples when a staple is in position to be severed and driven therefrom, additional yielding means acting in conjunction with the feeding mechanism and adapted to prevent the latter from forcing the staple strip forward after it is held by checking or holding means.

No. 49,589. Sewing Machine. (Machine à coudre.)

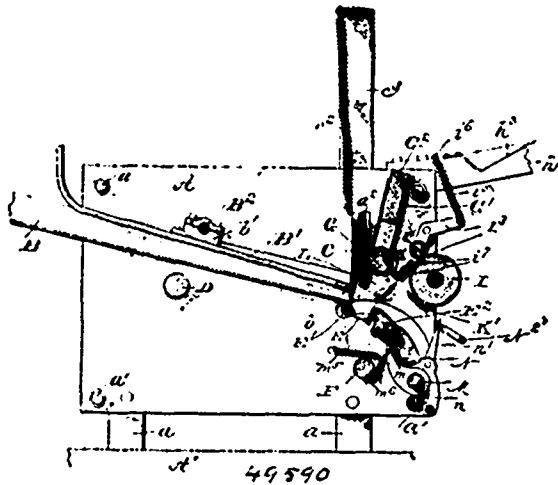


The Cutlan Patent Sew Round Machine Syndicate, assignee of John Cutlan and James Cutlan, both of London, England, 2nd August, 1895; 6 years.

Claim.—1st. In a sewing machine the combination with the work support, of the feeding chains and operative mechanism therefor and a tension spring for said chains to hold them taut, substantially as described. 2nd. In a sewing machine the combination with the work support and feeding chains, of an actuating wheel for said chains, said wheel being movable towards and from the work support and the tension spring for said wheels and chains, substantially as described. 3rd. In a sewing machine the combination with the work support, of the feeding chains, the wheel for actuating said chains, said wheel being movable towards and from the work support, a mechanism for actuating said wheel including a shaft with a universal joint, and means for drawing said wheel downward to tighten said chains, substantially as described. 4th. In a sewing machine the combination with the head of the machine and the needle-bar, of the bell-crank lever forming part of a thread grip, the spring and adjusting means, substantially as described. 5th. In a

sewing machine the combination with the head of the machine and needle-bar having a thread opening above the said head, of the bell-crank lever forming part of a thread gripping device, the spring and adjusting screw, substantially as described. 6th. In a sewing machine the combination with the head of the machine, of the needle-bar having a thread opening above the said head and a thread groove in its lower portion, of the bell-crank lever forming a part of a thread gripping device, the spring and adjusting screw whereby the needle-bar guides and controls the thread, substantially as described. 7th. In a sewing machine the combination, with the inclined work support, of feeding chains having teeth provided with upper faces having a greater angle of inclination than the incline of the work support, substantially as described. 8th. In a sewing machine the thread guide and controlling devices including a grooved needle-bar, the thread lying on the said groove, substantially as described. 9th. In a sewing machine the combination with the grooved needle-bar, of thread guiding and tension devices holding the thread in the groove of the needle-bar, substantially as described. 10th. In a sewing machine the combination with the head of the machine and the longitudinal recessed needle-bar having a cam at one end of said recess, the said head of the machine being provided with two thread guides in different horizontal planes, and an aperture intermediate the said thread guides communicating with the needle recess, of a spring actuated tension arm located intermediate said thread guides and provided with a projection extending through said aperture in line with said cam, said projection having a thread guide therein normally held out of line with the thread guides on the head of the machine, substantially as described.

No. 49,590. Cigarette Machine. (Machine à cigarettes.)



The Wood International Cigarette Machine Company, assignee of James Nelson Wood, Richmond, Virginia, U.S.A., 2nd August, 1895; 18 years.

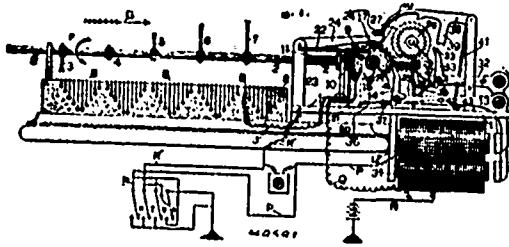
Claim. 1st. In a cigarette machine, the combination with tobacco supplying devices, of the blanket or apron, the travelling cigarette forming device secured to one end and the movable table secured to the other end of said blanket or apron, substantially as described. 2nd. In a cigarette machine, the combination with the blanket, of the pivoted table having the broad rear side, and the travelling roller, said blanket being mounted in operative relation to said roller and table, said roller in one extreme of its movement lying in a position relatively to the said table to form a pocket for the reception of the filler, between said roller and the said rear side of the table, substantially as described. 3rd. In a cigarette machine, the combination with tobacco and wrapper supplying devices, of the rolling blanket mounted in operative relation to the roller and the table, the travelling roller, the movable table having a broad rear side normally held in the path of said roller and means for moving the said roller to clamp the wrapper against the rear side of the table, substantially as described. 4th. In a cigarette machine, the combination with tobacco and wrapper supplying devices, of the rolling blanket, mounted in operative relation to the roller and the table, the travelling roller, the movable table having a broad rear face in the path of the roller, means for moving the roller and means for withdrawing the table from the path of the roller, substantially as described. 5th. In a cigarette machine, the combination with tobacco and wrapper supplying devices, of the rolling blanket, the travelling roller secured to one end of said blanket and having a broad rear face in the path of said roller, and means for tilting said table to withdraw it from the path of said roller, substantially as described. 6th. In a cigarette machine, the combination with tobacco and wrapper supplying devices, of the rolling blanket, the travelling rotating roller secured to one end of said blanket, the pivoted table secured to the other end of said blanket and having a broad rear face in the path of said roller, means for tilting said table to with-

draw it from the path of said roller, and means for rotating said roller in a direction to wind up the blanket, substantially as described. 7th. In a cigarette machine, the combination with the rolling blanket, of the travelling rotating roller secured to one end of said blanket, the movable table said blanket being mounted in operative relation with said table, means for moving said table in and out of the path of the roller, and means for rotating said roller in a direction to wind up the blanket, substantially as described. 8th. In a cigarette machine the combination with the rolling blanket, of the rotating travelling roller secured to one end of said blanket and adapted to move in a curved path, the table having its upper face of the same curvature as the path of the roller and a broad rear face lying at an angle to said curved face, said blanket being mounted in operative relation to said table, means for moving said roller and for rotating it to wind up the blanket, means for holding said table in position with its broad rear face in the path of the roller, and means for moving said table out of the path of the roller to allow said roller to pass over said curved face, substantially as described. 9th. In a cigarette machine the combination with the wrapper supplying devices, of the rolling blanket, the roller, the movable table provided with a broad rear side normally in the path of the movable roller, means for moving the roller to clamp the paper between different portions of the blanket against the rear side of the table, a knife and means for operating it to cut the paper when so held by roller, blanket and table, substantially as described. 10th. In a cigarette machine the combination with the cigarette rolling devices adapted to grasp one end of the wrapper, or the wrapper supplying devices adapted to feed the wrapper into the bite of the rolling devices, a pasting device, cutting mechanism for severing the paper while held in the rolling devices, and means for carrying the severed end of the wrapper into engagement with the pasting device while the other end of the wrapper is held in the rolling devices, substantially as described. 11th. In a cigarette machine the combination with the cigarette rolling devices adapted to grasp one end of the wrapper, of the wrapper supplying devices adapted to feed the wrapper into the bite of said rolling devices, a pasting device, cutting mechanism for severing the paper while held in the rolling devices, a pasting blade for carrying the severed end of the wrapper into engagement with and past the pasting device, and means for holding said blade in its extreme position until the wrapper is withdrawn therefrom by the rolling of the cigarettes, substantially as described. 12th. In a cigarette machine the combination with the rolling blanket, of the travelling roller adapted to move in a curved path, the pivoted table secured to one end of the blanket and having a face of the same curvature as the path of the roller, said face lying normally away from the path of the roller, and means for bringing said face into operative relation with the path of the roller, substantially as described. 13th. In a cigarette machine, the combination with the rolling blanket, of the travelling roller adapted to move in a curved path, the pivoted table secured to one end of the blanket and having a face of the same curvature as the path of the roller, a spring holding said table in position with said curved face away from said path, and operative means for moving said table from an eccentric to a position concentric with the path of the roller, substantially as described. 14th. In a cigarette machine, the combination with the rolling blanket, of the travelling roller adapted to move in a curved path, the pivoted table having a curved face, of the same curvature as the path of the roller, said face lying normally away from the path of the roller, devices for moving said table into a position to bring said face concentric with the path of the roller and devices for moving said table out of said concentric position toward the rollers to compress the pasted portions of the cigarette, substantially as described. 15th. In a cigarette machine, the combination with the rolling blanket mounted in operative relation to the roller and the table, the travelling roller, the pivoted table and devices for moving said table toward the roller to compress the pasted edges of the wrapper against the cigarette, substantially as described. 16th. In a cigarette machine, the combination with the compression feeding chute comprising among its members the stationary trough having guiding recesses, and the movable feed plate disposed at an angle to said trough and provided at one end with studs engaging said guiding recesses, of an operating crank shaft connected to said feed plate adjacent to its other end, substantially as described. 17th. In a cigarette machine, the combination with the cigarette rolling devices, of tobacco feeding devices, a tobacco separating plunger and operating means for the same, giving said plunger a forward movement, then a retrograde clearing motion and a further forward movement to press the tobacco into the rolling devices, substantially as described. 18th. In a cigarette machine, the combination with the cigarette rolling devices, of the trimming mechanism including among its members, the pivoted arms for receiving a cigarette and discharging it from the machine, a knife blade pivotally secured to each arm for trimming the cigarette and stops for engaging said knives to force them into engagement with the cigarette during the movement of said arms to eject the cigarette, substantially as described.

No. 49,591. Electrical Exchange. (Echange électrique.)

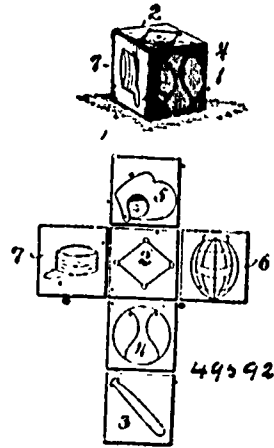
The Strowger Automatic Telephone Exchange, assignee of Alexander E. Keith, Frank A. Lundquist, John Erickson and Charles J. Erickson, all of Chicago, Illinois, U.S.A., 2nd August, 1895; 6 years.

Claim. 1st. An automatic electrical exchange comprising the combination of a switch-board having mounted thereon a series of



rows of contact points, the contact points of a row being in electrical connection, a series of connectors arranged for co-operation with the switch-board, a series of subscribers' lines connected with the respective connectors and through them to the contacts of the switch-board, and means for operating the connectors to interconnect said lines, substantially as set forth. 2nd. An automatic electrical exchange comprising the combination with a switch-board provided with a series of rows of electrically interconnected contact points, a series of connectors arranged parallel with the switch-board, and means for operating the connectors to interconnect the wires of the system, substantially as set forth. 3rd. An automatic electrical exchange comprising the combination of a flat, continuous non-sectional switch-board having mounted thereon a series of rows of electrically interconnected contact points, a series of connectors arranged parallel with the switch-board, and means for operating the connectors to interconnect the wires of the system, substantially as set forth. 4th. An automatic electrical exchange comprising the combination of a flat, continuous, non-sectional switch-board having parallel wires mounted thereon, a series of rotatable conductors arranged transversely with the wires, each conductor being provided with means for making and breaking electrical contact with each and every one of the wires, and means for operating the connectors, substantially as set forth. 5th. An automatic electrical exchange comprising the combination with a flat switch-board having parallel wires mounted thereon, a series of longitudinally movable, rotatable conductors arranged transversely with the wires, said conductors being each provided with a series of spirally arranged arms, the free ends of the arms being adapted to be moved into and out of electrical contact with the wires, and means for operating the conductor, substantially as set forth. 6th. An automatic electrical exchange comprising the combination of a flat switch-board having parallel wires mounted thereon, a series of longitudinally movable, rotatable conductors arranged transversely with the wires, each conductor being provided with laterally projecting arms, the free end of said arms being adapted to be moved into and out of contact with the wires, and means for preventing the longitudinal movement of the conductor when any arm is in contact with its respective wire, and means for operating the conductors, substantially as set forth. 7th. An automatic electrical exchange comprising the combination of a switch-board provided with parallel wires mounted thereon, said wires being arranged in groups, a series of longitudinally movable, rotatable connectors arranged transversely with the wires, each connector being provided with a series of radially projecting arms, one for each group, and means for moving each arm of the connector into and out of electrical engagement with each wire of its respective group, substantially as set forth. 8th. An automatic electrical exchange comprising the combination of a switch-board provided with parallel wires mounted thereon, a series of longitudinally movable, rotatable connectors arranged transversely with the wires, each connector being rotatable at all times and normally in electrical connection, with but one of the wires, and means for moving each connector step by step, the electrical connection being broken at the first rotary step, and a longitudinal movement being possible only after the first rotary step, substantially as set forth. 9th. An automatic electrical exchange comprising the combination with a switch board provided with parallel wires, a series of connectors arranged transversely with the wires, each connector being provided with means for making electrical connection with the wires by a rotary and a longitudinal movement, two levers for operating the connectors, one of which controls the rotary movement and the other the longitudinal movement, substantially as set forth. 10th. An automatic electrical exchange comprising the combination with a switch-board provided with parallel wires, a series of connectors arranged transversely with the wires, each connector being provided with means for making electrical connection with the wires by a rotary and a longitudinal movement, of two levers for operating each other, one of which controls the rotary movement and the other the longitudinal movement, a magnet for each lever, and means under the control of the subscriber for placing the rotary magnet in the circuit at any time and the longitudinal magnet only after the rotary magnet has been operated one time, substantially as set forth.

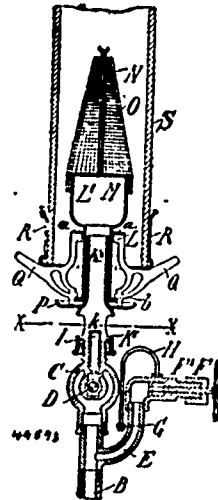
No. 49,598. Game Device. (Appareil de jeu.)



The C. Arthur Novelty Company, assignee of Charles A. Fetters, Cincinnati, Ohio, U.S.A., 2nd August, 1895; 6 years.

Claim.—1st. A game cube or die provided with pictorial representations of the articles employed in playing a game of base ball, substantially as set forth. 2nd. A game cube or die provided with the pictorial representations of the base ball diamond, the bat, the ball, the glove, the mask, and the cap applied to its six faces, substantially as set forth.

No. 49,598. Oil Gas Lamp. (Lampe à gaz à huile.)



Louis Friedländer and Albert Schonfeld, assignees of Louis Friedländer and Theodor Muller, all of Berlin, Prussia, 2nd August, 1895; 6 years.

Claim.—1st. In oil gas incandescent lamps of that kind where the liquid fuel is, before igniting, vaporized by a temporary flame, whereupon the vapours are mixed with atmospheric air and conducted against an incandescent body, a device for vaporizing the liquid fuel and mixing the gas with air, consisting of a check valve whose inlet is connected by a tube with a vessel containing the fuel, which inlet has an upwards down S-shaped by-pipe upon whose end is put a check valve having a narrow outlet pipe down downwards and directed with its nozzle against the inlet and the by-pipe, whilst into the outlet of the main valve is put a pipe with very narrow bore whilst the outlet is surrounded by a tube connected with two strips with another tube forming a lengthening of the lower tube, substantially as set forth. 2nd. In oil gas lamps as specified, a device for vaporizing the liquid fuel consisting of a check valve C, to whose inlet is provided an upwards down by-pipe E, whose top bears a check valve F, F', whose outlet pipe H, is down downwards and provided with a nozzle G, directed against the inlet B, and the by-pipe, substantially as set forth. 3rd. In oil gas lamps as described, a device for mixing with atmospheric air the vapours generated in the vaporizer C, E, F, consisting of a pipe I, put into the outlet of C, and having a narrow bore, and a tube k', surrounding the outlet whose top is connected by small strips k, with a second tube k'', forming a lengthening of k', substantially as set forth.

No. 49,594. Manufacture of Ferments.

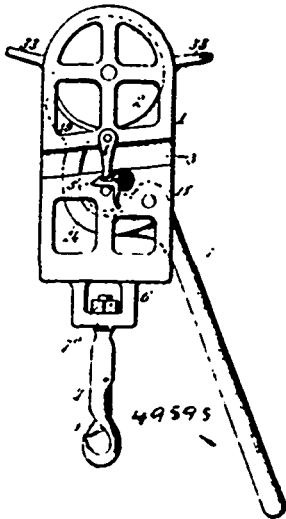
(Fabrication d'effervescences.)

The Chicago Crescent Company, assignee of George Drury Hart and Charles Lehman Hart, both of Chicago, Illinois, U.S.A., 2nd August, 1895; 6 years.

Claim.—1st. The method of leaven making which consists in admixing koji and a starch carrier with water excess maintaining the mass at suitable temperature to cut the starch and promote fermentation and as the alcoholic flavour develops checking the incipient fermentation throughout the dough to finish and preserve the leaven active, substantially as described. 2nd. The method of leaven making which consists in admixing koji, a starch carrier and a yeast starter with water excess maintaining the mass at suitable temperature to cut the starch and promote fermentation and as the alcoholic flavour develops checking the incipient fermentation throughout the dough to finish and preserve the leaven active, substantially as described. 3rd. The process of manufacturing a leaven ferment adapted for brewery or distillery use which consists in soaking koji with its steamed starch carrier in water excess, maintaining the mixture thus formed at proper temperature to both cut the starch and promote fermentation and with the alcoholic flavour develops, holding or otherwise, in readiness to apply the same to the converted wort or mash at the ferment vat, substantially as described. 4th. The method of leaven making which consists in admixing koji with water excess and a cooked (preferably steamed) starch carrier, maintaining the mass at suitable temperature to cut the starch and promote fermentation and as the alcoholic flavor develops checking the incipient fermentation throughout the dough to finish and preserve the leaven active, substantially as described. 5th. The method of making leavens which consists in separately soaking koji with excess of water and when proper fermentation ensues admixing the steamed starch carrier in bulk therewith, maintaining the mass at suitable temperature to cut the starch by the koji diastase and to promote fermentation and as the alcoholic flavour develops gradually arresting the incipient fermentation throughout the dough to finish and preserve the leaven active, substantially as described. 6th. The method of making leavens which consists in admixing the selected converter and ferment herein described with a moist, steamed starch carrier addition, maintaining the comparatively dry mass at a suitable temperature to cut the starch and promote fermentation, and as the alcoholic flavour develops checking the incipient fermentation throughout the dough to preserve the activity of the leaven, substantially as described. 7th. A finished leaven comprising koji and a starch carrier in incipient homogeneous fermented admixture comparatively dry (that is, in cake or dough form) and free from alcohol excess, substantially as described.

No. 49,595. Life-Saving Apparatus.

(Appareil de sauvetage.)



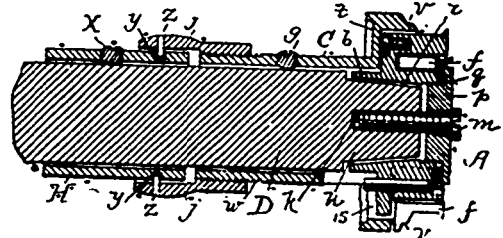
Robert Bustin and Robert Keltie Jones, both of St. John, New Brunswick, 2nd August, 1895; 6 years.

Claim.—1st. In a life-saving apparatus, a traveller having a pulley adapted to ride upon a shore line or hawser, and provided with an opening in one of the sides enclosing said pulley to admit said hawser, a movable gate to close said opening, and means for attaching a life-belt, or other suitable support, to said traveller, substantially as described. 2nd. In a life-saving apparatus, a traveller adapted to carry a life-belt, or other support, and provided with a pulley which will ride upon the shore-line, or hawser, one of the two sides enclosing the pulley having an opening through which the hawser, or shore-line may pass, in order to place the traveller thereon, or re-

move it, after said line is attached at both ends, substantially as described. 3rd. In a life saving apparatus, the combination with a traveller adapted to carry a life belt, or other support, of a pulley enclosed between the side and adapted to ride on the shore-line, or hawser, one of the sides having an opening to admit said hawser, and a friction-brake consisting of a lever fulcrumed on the traveller and having a shoe adapted to compress the hawser on the pulley, substantially as described. 4th. In a life-saving apparatus, the combination with a shore-line, or hawser, of a tension device adapted to yield to the rolling or other movement of the ship and thus prevent the breaking and violent surging of the hawser, substantially as described. 5th. In a life-saving apparatus, the combination with a shore-line, or hawser, of a tension device consisting of a series of elastic strands arranged in apertures in separating heads, or spreaders, their ends being brought together and fastened, substantially as described. 6th. In a life-saving apparatus, the combination with a traveller adapted to move upon a shore-line, or hawser, of a life-belt attachable to and detachable from said traveller, and an auxiliary belt or strap pivotally connected to the life-belt at one point and normally lying in loops, or keepers, on the outer face of the same, whereby a person sitting in the life-belt may be securely strapped therein, substantially as described. 7th. In a life-saving apparatus, the combination with a series of individual travellers, each having a pulley adapted to move upon a shore line, or hawser, and each being provided with an opening in one of the two sides supporting said pulley in order to permit the traveller to be placed upon and removed from the hawser, of means for temporarily linking or connecting together a plurality of said individual travellers, and an out-haul and in-haul, substantially as described. 8th. In a life saving apparatus, a traveller consisting of parallel sides, a pulley journaled to revolve between the sides and adapted to ride upon the shore-line, or hawser, and means for detachably connecting a series of said travellers to each other and to the out-haul and in-haul, substantially as described.

No. 49,596. Rotary Trimmer. (Chevêtre rotatoire.)

Ambrose Stevens Vase, Boston, Massachusetts, U.S.A., 2nd August, 1895; 6 years.



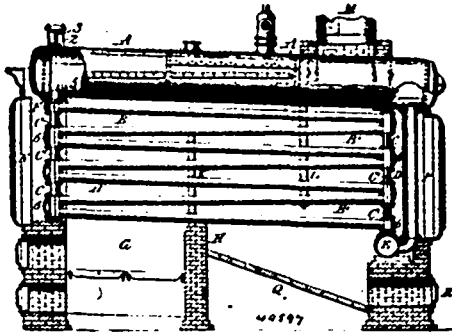
Claim.—1st. The combination, with the shaft provided with the taper spindle, of the head A, having the taper spindle opening and a screw connecting said head and shaft. 2nd. The combination, with the shaft and head of a sleeve fitted to slide on said shaft and provided with the cap-flange overlapping said head and mechanism for adjusting said sleeve. 3rd. The combination, with the shaft and cutter-head secured thereon, of the sleeve fitted to slide on said shaft and provided with the cap-flange overlapping said head and a nut fitted to rotate on said shaft and actuate said sleeve. 4th. The combination, with the shaft and cutter head of the fixed collar or said shaft provided with an annular groove, a nut fitted to rotate on said shaft and having a projection entering said groove, the threaded sleeve on said shaft turned into said nut and provided with the cap-flange overlapping said head. 5th. The combination, with the shaft and head of the sleeve C, on said shaft provided with the flange t, overlapping said head and having an annular shoulder r, and mechanism for adjusting said sleeve, substantially as described. 6th. The combination with the cutter-head and knives of the shaft, nut and screw and the flanged guide cap held by the screw and overlapping said head, substantially as and for the purpose set forth. 7th. The combination, with the cutter-head and knives having cutting flanges, of the flanged guide-cap and mechanism for securing the same to the head. 8th. The shaft and cutter-head, in combination with the detachable knives having lips 16, the cap E, provided with flanges 19 and 20, and mechanism for securing said cap and head to the shaft. 9th. The combination, with the wheel having an interiorly screw-threaded hub, an annular groove in its face, and inclined throats, of knives provided with pins, the ring slotted to receive said pins and devices for rotating the ring whereby the cut of the knives may be adjusted. 10th. In a trimmer the wheel having the throats and cutters and an annular groove in one of the faces in combination with the flanged nut p, and the notched ring held thereby.

No. 49,597. Water Tube Steam Boiler.

(Chaudière sectionelle.)

John Wesley Van Dyke, Lima, Ohio, U.S.A., 2nd August, 1895; 6 years.

Claim. 1st. A water tube boiler comprising in connection with an elevated steam and water drum having its lower part exposed to



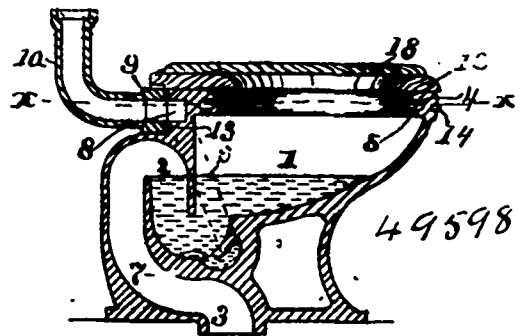
the fire, oppositely inclined water tubes arranged under and lengthwise of said drum, headers through which extend vertical passages corresponding in section with said tubes, and an independent return conduit from the water space of said drum, substantially as described whereby short circulating systems are provided through said vertical passages and water tubes in addition to the general circulation through the said drum, conduit, water tubes and headers, as set forth. 2nd. A water tube boiler comprising in connection with a steam and water drum, oppositely inclined water tubes at different levels, the intermediate tubes being connected by passages of corresponding size at one end with the lower ends of higher and lower level tubes and at the other end with the upper ends of higher and lower level tubes, and an independent return conduit from the water space of said drum, substantially as described, whereby in addition to the general circulation through the said drum, return conduit and water tubes, a succession of short circulating systems is provided with the said intermediate tubes common to adjoining systems as a connecting link between them, as set forth. 3rd. A water tube boiler comprising in connection with a steam and water drum, oppositely inclined water tubes, flexible headers composed of box like castings and connecting nipples through which vertical passages extend, and an independent return conduit from the water space of said drum, substantially as described. 4th. A water tube boiler comprising in connection with an elevated steam and water drum having its lower part exposed to the fire, oppositely inclined water tubes arranged under and lengthwise of said drum, headers through which extend vertical passages corresponding in section with said tubes and which open into one end of said drum, and an independent conduit returning from said drum to the bottom part of the water tube system, substantially as described. 5th. A water tube boiler comprising an inclined steam and water drum, in connection with oppositely inclined water tubes, headers through which vertical passages extend and which open into the higher end of said drum, and an independent return conduit from the lower end of said drum, substantially as described. 6th. A water tube boiler comprising a steam and water drum, water tubes arranged in vertical rows with the tubes in the same vertical row alternately inclined in opposite directions, headers through which vertical passages extend, and an independent return conduit, substantially as described. 7th. A water tube boiler comprising a steam and water drum, header boxes, nipples between said boxes, oppositely inclined water tubes connected with each of said boxes, and an independent return conduit, the nipples being of a length to separate said boxes from each other where two oppositely inclined water tubes are widely separated, substantially as described. 8th. A water tube boiler, comprising a steam and water drum, oppositely inclined water tubes, headers with passages through the same at both ends of the said tubes, and an independent return conduit, the headers at one end of said tubes opening more directly into one end of said drum, and the headers at the opposite end of the said tubes communicating more directly with the return conduit which leads from the opposite end of said drum, substantially as described. 9th. A water tube steam boiler, comprising oppositely inclined water tubes arranged at different levels, and headers with which said water tubes are connected and through which extend vertical passages corresponding in section with said tubes, in combination, with a steam and water drum elevated above and connected with the upper part of said system of water tubes and headers, and an independent return conduit from the water space of said drum to the lower part of said water tube system, the said water tubes and headers forming lower and higher level circulation rings closed on themselves but communicating with each other and constituting together the rising leg of an inverted siphon which opens at both ends into the water space of said drum and whose descending leg is constituted by the said return conduit, substantially as described.

No. 49,598. Water Closet. (Latrines à eau.)

Patrick Henry Howard, assignee of William Thomas Fox, both of Rochester, New York, U.S.A., 2nd August, 1895; 6 years.

Claim.—1st. In a water-closet, the combination with the bowl, and a plate at the rear thereof, of a band encircling the bowl and

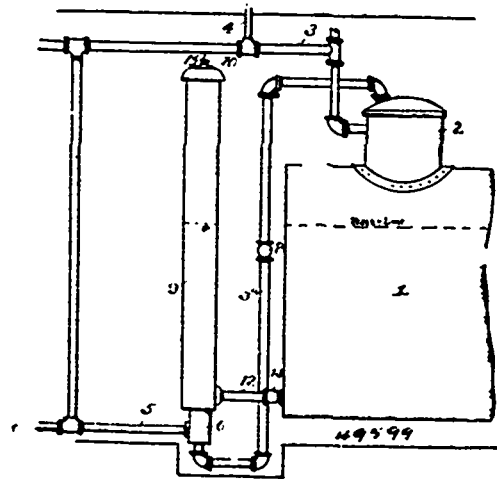
connected to said plate, and a seat hinged to the plate and extending over the bowl, substantially as described. 2nd. In a water-



closet, the combination with the bowl having the water-passages therein, and a plate at the rear thereof having a pipe connection, and the seat hinged to said plate, of the band encircling the bowl and connected to said plate, substantially as described. 3rd. In a water-closet, the combination with the bowl having water-passages therein, of a plate fastened to the bowl and having the pipe connection thereon, and a seat secured to said plate and extending over the bowl, substantially as described.

No. 49,599. Steam Trap and Feeder.

(Purge et alimentateur de tuyau à vapeur.)

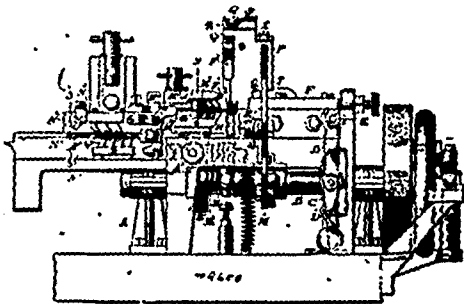


David Lansing Long, Crawfordsville, Indiana, U.S.A., 2nd August, 1895; 6 years.

Claim.—1st. The combination with the return-pipe of a steam conveyer, of a stand pipe in communication with said return-pipe, and a live steam-pipe communicating with the stand-pipe at its lower end, whereby the partial condensation of the dry steam increases the circulation in said conveyer, substantially as specified. 2nd. In a steam-heating system, the combination with a dry steam conveyer having a return-pipe, of a stand-pipe, a nozzle connected with the said return-pipe and arranged axially in the stand-pipe, a cylindrical reservoir inclosing said stand-pipe, the latter being provided at its upper end with an outlet, and a live steam-pipe connected with the lower end of the stand-pipe, whereby the water of condensation discharged from the nozzle connected with the return-pipe is elevated by the pressure of steam from the dry-steam pipe and is discharged into the surrounding reservoir, substantially as specified. 3rd. In a steam-heating system, the combination with a dry steam conveyer having a return-pipe which is arranged below the plane of the water-line in a steam generating boiler, of a stand-pipe provided at its upper end with an outlet, a nozzle connected with the end of the return-pipe and arranged axially in the stand-pipe near its lower end, a cylindrical reservoir surrounding the stand-pipe and provided at its upper end with a vent, a connecting pipe between the lower end of the reservoir and the steam generating boiler, and a dry steam-pipe communicating with the lower end of the stand-pipe and adapted to elevate the water of condensation discharged from the nozzle and force the same through the outlet at the upper end of the stand-pipe, substantially as specified.

No. 49,600. Machine for Dressing Type.

(Machine à dresser les caractères.)



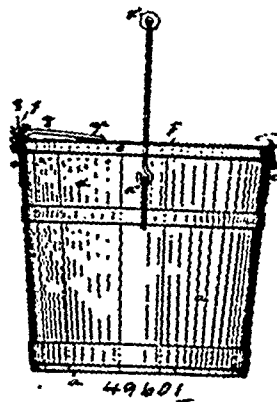
William Wallace Farmer of New York, State of New York, assignee of George Rehfuss, John George Rehfuss and Martin Oscar Rehfuss, Philadelphia, Pennsylvania, all in the U.S.A., 2nd August, 1895; 6 years.

Claim.—1st. The slide H, and the guides J therefor, adapted to form the recess N at the top of said parts, in combination with the arm L, which is connected with said slide, the operating cam X on the shaft B, the spring M¹ attached to said slide, and a type-feeding chute which is adapted to communicate with said recess, substantially as described. 2nd. A type-feeding chute consisting of the plates Q, the flange R at the side thereof, the channel S between said plates, and a jet-breaker in the chute extending across said channel, substantially as described. 3rd. A type-feeding chute having a jet-breaker formed of a bar with a shoulder on the end thereof, in combination with means for imparting motions in opposite directions to said bar, substantially as described. 4th. The jet-breaker having a shoulder U on the end thereof, and a projecting edge G² above said shoulder, substantially as described. 5th. A type-feeding chute having a slide with a cam thereon, and an operating arm for said slide, in combination with a jet-breaking bar mounted on said chute, and a spring connected with the latter and engaging said bar, substantially as described. 6th. A type-feeding chute formed of separate plates, means for connecting the same, and gauges between the plates, said gauges being suitably supported, substantially as described. 7th. A type-feeding chute formed of plates with a channel between the same, and a rib on one of said plates partly occupying said channel, substantially as described. 8th. In a machine for dressing type, the adjustable plates Q having a flange R at one side thereof, forming the channel S, and the jet-breaker T guided between said plates and having the shoulder U and upper edge G² projecting into said channel, said parts being combined substantially as described. 9th. The adjustable plates Q with the flange R at one side, forming the channel S, and the jet-breaker T guided between said plates, and having the shoulder U projecting into said channel, mechanism for imparting a reciprocating motion to said breaker, and an arm entering said channel and bearing against a type therein, said parts being combined substantially as described. 10th. The adjustable plates Q with the flange R having an opening in its side, and forming the channel S, the jet-breaker T guided between said plates and having the shoulder U thereon, opposite said opening in said flange, a reciprocating slide with a cam thereon engaging said jet-breaker, and a spring bearing against said breaker, said parts being combined substantially as described. 11th. In a machine for dressing type, a type-feeding chute consisting of two plates with a flange on one side forming a channel, one of said plates having a rib partly occupying said channel, and means for securing said chute in an inclined position on the outer side of said machine, said parts being combined substantially as described. 12th. In a machine for dressing type, a pusher having an angular plate facing its front, and an adjusting screw secured to the top limb of said plate, and a gauge bar between said top limb and said pusher, said parts being combined, substantially as described. 13th. A type-feeding chute having a channel, a pivoted arm having a limb entering said channel, a spring bearing against said limb, a roller on the other limb of said arm, a shaft with a cam Z¹ thereon, and a curved cam H¹ on the cam Z¹, said parts being combined, substantially as described. 14th. The operating cam U, and the slide X carrying the same, in combination with the lever Y, which is connected with said slide, the arm A¹ pivoted to said lever, the yoke B¹ on said arm, the driving shaft B, the cam D¹ on said shaft, the roller C¹ on the arm A¹, and a spring bearing against said lever, said yoke freely encircling said shaft, substantially as described. 15th. In a type-dressing machine, the block K², the curved spring L¹ secured thereto, a sustaining block secured to the lower end of said spring, a stationary block and a spring secured thereto, and bearing against said sustaining block, said parts being combined, substantially as described. 16th. In a type-dressing machine, the frame with the bed P¹, the pusher U¹ below said bed, the channel M¹ and the channel P¹ continuous thereof, the table Y¹ on said frame, the swinging arm N¹ with bearings on said table, the oscillating block W¹ mounted on said arm and having the pin

V¹ fitted therein, a shaft on said frame and the cam Z¹ on said shaft, said parts being combined, substantially as described. 17th. In a type-dressing machine, two sets of beds and dressers, having between them the channel M¹, said beds and dressers being adapted to turn the type, in combination with the bent spring L¹, which forms one side of said channel, the pivoted sustaining block S¹ on the frame engaging said spring, and the spring T¹ on the frame bearing against said block S¹, substantially as described. 18th. A type-feeding chute having a channel therein, and a jet-breaker in combination with a detaining and holding arm, which is adapted to enter said channel, and means for operating said arm in opposite directions, substantially as described. 19th. The detaining and holding arm P¹ of the feeding chute, a spring bearing against one end of said arm, and the rotating cam H¹ engaging the other end thereof, said parts being combined, substantially as described. 20th. In a type-dressing machine, the pusher F having the adjustable face plate J¹ on the working end thereof, substantially as described. 21st. In a type-dressing machine, the channel M¹ between the two sets of beds, and dressers adapted to turn the type, in combination with the bent spring L¹, which forms one side of said channel, the pivoted sustaining block S¹ on the frame engaging said spring, and the spring T¹ on the frame bearing against said block S¹, substantially as described. 22nd. In a type-dressing machine, a channel receiving and guiding the type, having a scoring tool therein, in the path of the end of the type, said parts being combined, substantially as described. 23rd. In a type-dressing machine, a scoring tool in a channel in the path of the end of the type, and an adjustable stirrup connected with the frame supporting said tool, substantially as described. 24th. In a type dressing machine, the pusher U¹, in combination with the pin V¹, the oscillating block W¹, receiving said pin, the arm N¹, carrying said block mounted on the frame, the cam Z¹, on the shaft B, engaging said arm, and the spring A², pressing said arm, substantially as described. 25th. In a type dressing machine, the bed N¹, and the dresser Q¹ thereon, in combination with the guiding plate X¹ on said bed, adapted to enter the groove of a type while being subjected to said dresser, substantially as described. 26th. In a type dressing machine, two sets of dressers, beds and blocks supporting the same, a turning channel interposed between said dressers, and a discharge channel leading from said turning channel, and a scoring tool in said discharge channel, said parts being combined substantially as described.

No. 49,601. Packing and Storing Vessels.

(Boîte d'emballage et emmagasinage.)



Amos Burson, Negley and Adam R. Mackall, and George H. Mackall, of East Liverpool, Ohio, U.S.A., 2nd August, 1895; 6 years.

Claim.—1st. The combination with the jar and inclosing case, of hoops located between the jar and case, said hoops being each constructed of concentric hoops and one of said hoops cut away and connected to the other to form a spring connection, substantially as described. 2nd. The combination with the jar and inclosing case, of hoops located between the jar and case, said hoops being each constructed of concentric hoops and one of said hoops being cut away and connected to the other to form a spring connection, and a spring metal bar connected to the lower one of said hoops to support the jar, substantially as described.

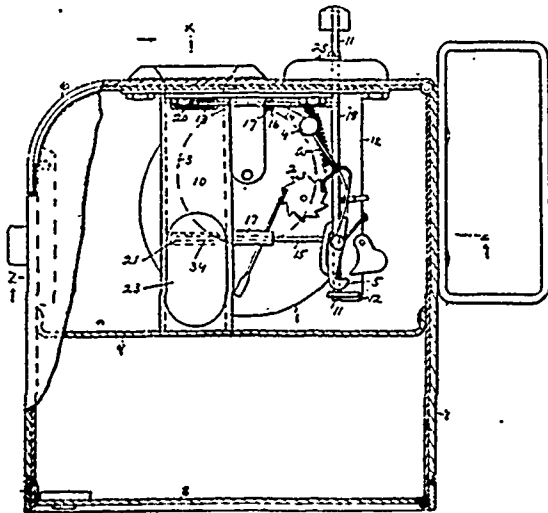
No. 49,602. Siphon Test Boxes for Gas Mains.

(Eprouvette de siphon pour conduits de gaz.)

Adolphe Bouvier, Lyons, France, 2nd August, 1895; 6 years.

Claim. 1st. In an alarm bell, a gong, a hammer adapted for contact with the gong, a master wheel, a train of gearing connecting the master-wheel and hammer, a spring pressed winding arm, and a plunger operating said arm when moved in one direction, and releasing the arm when moved in an opposite direction, substantially as shown and described. 2nd. In an alarm bell, the combination with a gong or like alarm, a hammer adapted for engagement with the gong, a master-wheel, and a gearing connecting the master wheel with the hammer, of a spring-controlled winding mechanism connected with the master wheel, a plunger operating the winding mechanism when moved in one direction, and means, substantially as shown and described, whereby the winding mechanism and plunger move in unison both at the winding and the unwinding of the mechanism, as and for the purpose testified. 3rd. In an alarm bell, the combination with a gong or other bell, a hammer, a master wheel, and a train of gearing connecting the hammer with the master-wheel, of a spring-controlled winding mechanism connected with the master-wheel, a plunger operating upon the winding mechanism, said plunger being capable of sliding movement, and of being operated upon by the winding mechanism, and a stop whereby the outward movement of the plunger may be limited, as and for the purpose specified. 4th. In an alarm bell, the combination, with a door or like object and the jamb upon which the door is hung, of a bell provided with a winding mechanism, a hammer, a connection between the winding mechanism, and the hammer and a plunger operating upon the winding mechanism and having movement to and from the mechanism, the plunger being provided with a head located between the door and the jamb, whereby when the door is closed the plunger is pushed inward and the winding mechanism is wound, and when the door is opened the plunger is released and acted upon by the winding mechanism, simultaneously with its operation upon the hammer, as specified.

No. 49,608. Conductor's Fare Box. (Boîte à billets.)



Richard Ramsay Mitchell, Montreal, Quebec, Canada, 3rd August, 1895; 6 years.

Claim. 1st. A fare box having a chamber for the fares, a register, an alarm and a receiving chute, which means consisting of a plurality of controlling gates movable in opposite directions across the chute for controlling the passage of the fares through said chute and means for actuating said register and alarm, for the purpose set forth. 2nd. A fare box having a chamber for the fares, a register and a receiving chute with means consisting of a plurality of controlling gates movable horizontally in opposite directions across the chute for controlling the passage of the fares through said chute, lever connections and a push bar for carrying and operating said gates and means for actuating said register, for the purpose set forth. 3rd. A fare box having a chamber for the fares, an alarm and a receiving chute, with means consisting of a plurality of controlling gates movable horizontally in opposite directions across the chute for controlling the passage of the fares through said chute, lever connections and a push bar for carrying and operating said gates and means for actuating said alarm for the purpose set forth. 4th. A fare box having a chamber for the fares, a register, an alarm and a receiving chute and controlling gates therefore working horizontally through openings in the sides of such chute, lever connections for operating such gates, a push bar having inclined slots to engage said levers, and a spring for returning said push bar to its normal position, for the purpose set forth. 5th. A fare box having a chamber for the fares, a register and a receiving chute, and controlling gates therefore working horizontally through openings in the sides of such chute, lever connections for operating such gates, a push bar having inclined slots to engage said levers and a spring for returning said push bar

to its normal position, for the purpose set forth. 6th. A fare box having a chamber for the fares, an alarm, and a receiving chute and controlling gates therefore working horizontally through openings in the sides of such chute, lever connections for operating such gates, a push bar having inclined slots to engage said levers and a spring for returning said push bar to its normal position, for the purpose set forth. 7th. A fare box having a chamber for the fares, a receiving chute and controlling gates therefore working horizontally through openings in the sides of such chutes with a push bar and levers for operating such gates, the latter being formed in one with said levers, for the purpose set forth. 8th. A fare box having a chamber for the fares, a receiving chute and controlling gates therefore working horizontally through openings in the sides of such chutes, lever connections for operating such gates, a push bar having inclined slots to engage said levers, and a spring for returning said push bar to its normal position, for the purpose set forth. 9th. A fare box having a chamber for the fares, a receiving chute and an automatic gate in the form of a rolling ball 22 suitably carried for obstructing such chute when the box is in an abnormal or overturned position, for the purpose set forth.

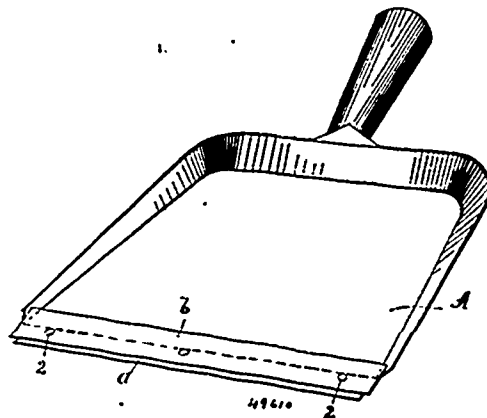
No. 49,609. Artificial Fuel. (Combustible artificiel.)

George John Altham, Swansea, Massachusetts, U.S.A., 3rd August, 1895; 6 years.

Claim.—A fuel composed of peat and asphaltum, in substantially the following proportions, to wit., peat from 20 per cent to 80 per cent, and asphaltum from 80 per cent to 20 per cent, respectively, substantially as and for the purpose set forth.

No. 49,610. Attachment for Dust Pans.

(Attache pour porte-ordure.)



William Smith Bowie, Boston, Massachusetts, U.S.A., 5th August, 1895; 6 years.

Claim.—The attachment for dust-pans herein described, consisting of the flat metallic strip *a*, the bevelled faced strip *b* formed with an abrupt rear edge, and secured to the strip *a*, at points near the front edge to enable the rear edges to spring apart, and receive between them the front edge of the dust-pan, substantially as described.

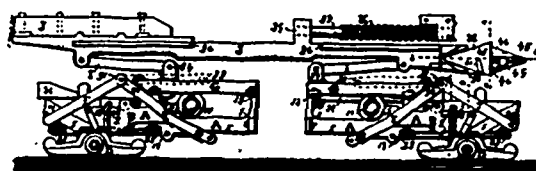
No. 49,611. Artificial Fuel. (Combustible artificiel.)

George Henry Randall and Alexander Walker, both of Montreal, Quebec, Canada, 5th August, 1895; 6 years.

Claim.—An artificial fuel composed of saw-dust, the oily residue from gas mains, and waste side derived from the boiling of animal and fishy matters, the whole substantially in the proportions specified and combined in the manner set forth.

No. 49,612. Automatic Rail-brake and Apparatus.

(Frein et appareil de rail automatique.)

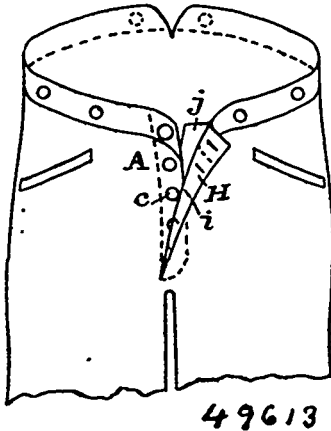


Thomas M. Copeland, West Merigonish, Nova Scotia, Canada, 5th August, 1895; 6 years.

Claim.—1st. In an automatic rail-brake, the combination of the upper pressure beam *A* secured to the car truck, having on the inner

side of the depending sides 5, the oblique recesses 7, and ribs 8, and the pitch faces 6, with the lower pressure reciprocating beam B to which are pivoted the rail shoes, having the pitch faces 16, the anti-friction racks 17, and guided by the ribs 18, and recesses 14 on its sides, substantially as described. 2nd. The rail shoe D, having its lower face 25, bevelled so as to wear on the outer top of the rail opposite to that of the wheel, the flanges 26 and runner ends, substantially as shown for the purpose specified. 3rd. In an automatic rail-brake, the combination of, a continuous draw-bar J, with the rod I, to the double wedge bar H, adapted to reciprocate in the guides G under the roller 31, between ends of links E and F, which are attached to brake beams A and B, all substantially as described. 4th. The continuous draw-bar J under each car in guides and on rollers, with the self-connecting ends M, substantially as described. 5th. The automatic connecting ends M, having the eye 42, the square funnel chamber 43, the ribbed taper hook 45, the lock bolt 47, the spring 48, and the unlock lever 49, all substantially as described.

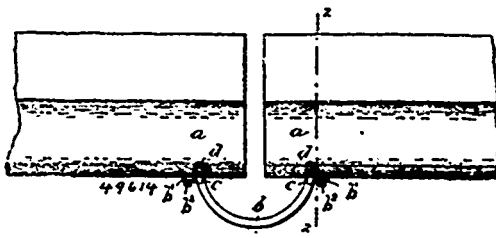
No. 49,613. Fastener for Placket Openings of Garments. (Agrafe pour ouvertures de vêtements.)



John Anton Ruth, Baltimore, Maryland, U.S.A., 5th August, 1895; 6 years.

Claim.—1st. A garment having a placket opening one side of which is provided with T-shaped plates, the cross-bars d, of which extend parallel with the edge c, of said side and the other bar of the plates having an opening g, and with a button over each plate secured by thread stitches passed through the shank holes of the button and also through the said opening of the plate, and the opposite side of the placket provided with button-holes to engage with said buttons. 2nd. A garment having a placket opening provided at one side with buttons and a number of thin-plates—one under each button—and with flexible spaces between the said plates, and the other side of the placket opening having button holes to engage with said buttons and provided with an inner-lapping flap j, having cross-bars parallel with each other and said flap forming with the button hole side a double flap between which the said button side is adapted to enter, as set forth. 3rd. A garment having a placket opening one side of which is provided with buttons and T-shaped plates the cross-bars d, of which latter extend parallel with the edge c, of said side, and the opposite side of the placket-opening provided with button-holes and with an inner-lapping flap j, as and for the purpose set forth. 4th. A garment having a placket opening one side of which is provided with T-shaped plates the cross-bars d, of which extend parallel with the edge c, of said side and the other bar of the plates having an opening g, and with a button over each plate secured by thread stitches passed through the shank-holes of the button and also through the said opening in the plate, and the opposite side of the placket provided with an inner-lapping flap j, as and for the purpose set forth.

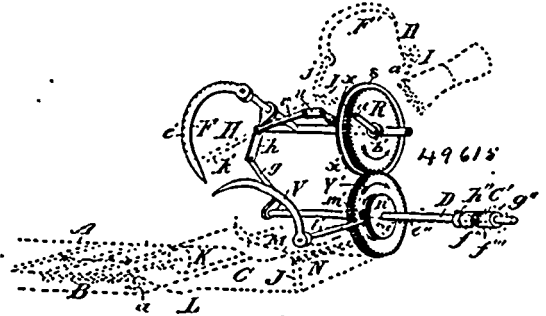
No. 49,614. Electrical Connection. (Liaison électrique.)



James Michael Faulkner, Philadelphia, Pennsylvania, U.S.A., 5th August, 1895; 6 years.

Claim.—1st. A rail having a hole or chamber formed therein, mercury in said hole and a connecting strip secured to said rail with its ends extended into said hole and entering the mercury therein, the chamber being closed and the strip entering the outer end thereof, substantially as described. 2nd. Two adjacent conductor sections having holes or chambers therein, with mercury in the holes and the bond having its ends closing said holes and entering the mercury, substantially as described. 3rd. The combination of the rails having the holes or wells formed therein at their ends and containing mercury, the conductor strips between the rails having their ends extending into said such holes and the mercury and closing the holes, and means securing the strips, substantially as described. 4th. The electric bond comprising the curved conductor with bent tapered ends and the perforated securing ears at the bends, substantially as described. 5th. The rail ends having wells containing mercury, the bend having its ends driven into and closing said wells with its points entering the mercury, substantially as described. 6th. The rail ends having the downwardly inclined holes containing mercury and the bowed bond having the bent pointed ends driven into and closing said holes with the point in the mercury, and having the lips for securing the bond to the exterior of the rails, substantially as described.

No. 49,615. Grain Binder. (Lieuse à grain.)



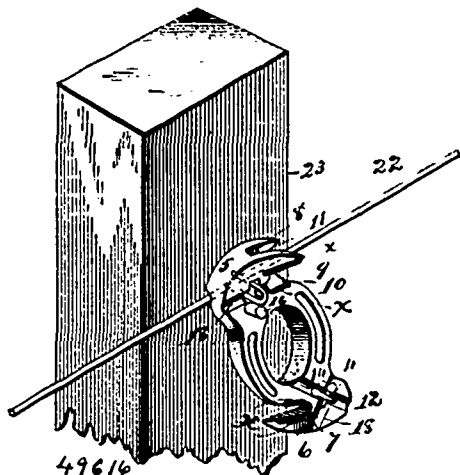
Daniel McPherson, Caledonia, New York, U.S.A., 5th August 1895; 6 years.

Claim.—1st. In a grain binder and in combination the binding platform, the binder-arm, the knoter, the frame situated above and pivoted at or near the rear vertical plane of the platform and supporting said arm and knoter above the platform, mechanism to oscillate the frame and simultaneously carry the bundle above said platform and the devices supported thereon and to the rear thereof, and devices for vibrating the arm, all substantially as set forth whereby the bundle can be simultaneously lifted and bound and then discharged from an elevated position on the side opposite that from which it was raised. 2nd. In a grain binder and in combination, the binding platform, the binder-arm, the knoter, the frame situated above and pivoted at or near the rear vertical plane of the platform and supporting said arm and knoter above the platform, mechanism to oscillate the frame and simultaneously carry the bundle above said platform and the devices supported thereon and to the rear thereof, devices for vibrating the arm, and a spring held compressor, all substantially as set forth, whereby the bundle can be simultaneously lifted and bound and then discharged from an elevated position on the side opposite that from which it was raised. 3rd. In a grain binder, the combination, with the binding platform, of the intermittently revolving driving shaft D arranged at or near the rear of the platform, the shaft O, the frame i pivoted thereon, the binder arm supported by the frame, the knoter also supported in the frame, and mechanism operated by the shaft D intermediate the same and the frame, and adapted to secure the simultaneous oscillation of the binder arm and knoter, devices to operate the knoter, and devices to vibrate the binder arm to and from the same, the mechanism being all situated above the platform and adapted to simultaneously lift and bind the bundle and subsequently drop it on the side thereof opposite that from which it was raised, substantially as set forth. 4th. In a grain binder, the combination with the grain platform, of the intermittently rotating shaft D, the shaft O supported by suitable standards, the frame i secured on shaft O and supporting the binder arm and knoter, the gear Q, and loose gear R, devices to operate the knoter, mechanism to vibrate the binder arm, and means such as cranks f, h, and link g, for securing the oscillation of the frames supporting the binder arm and knoter, the mechanism being all situated above the platform and adapted to simultaneously lift and bind the bundle and subsequently drop it on the side thereof opposite that from which it was raised, substantially as set forth.

No. 49,616. Combined Wire Stretcher, Staple Holder and Staple Puller. (Tendeur de fil de fer porte et arrache-crampe combinés.)

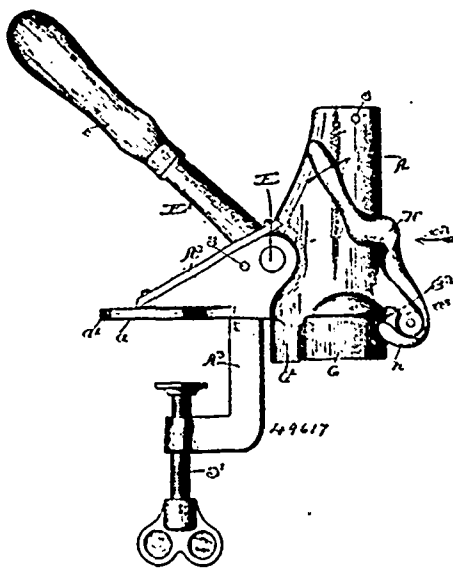
Frank W. Simmons, Hannibal, Missouri, U.S.A., 5th August 1895; 6 years.

Claim.—An improved tool comprising a body portion formed with an annular opening for the reception of a lever 3, and rounded heads



4, 5, the head 4, having a single pointed hook 6, provided with cruciform grooves 18, and elongated staple-holding openings 12, 14, and the other head 5, having points 8, 9 or claw-shaped, and rearwardly thereof a groove 18, provided with a staple holding opening 13, and a notch or groove 19, the elongated staple-holding openings formed with enlarged ends adapted to receive plugs to reduce their width, substantially as and for the purpose set forth.

No. 49,617. Cork Extractor. (Tire-bouchon.)

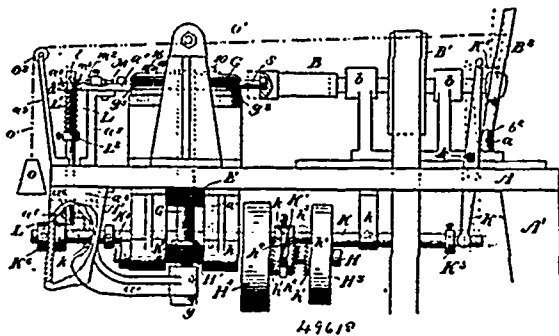


Charles Morgan, Freeport, Illinois, U.S.A., 5th August, 1895; 6 years.

Claim.—1st. In a cork-extractor, the combination with a suitable case, a cork-screw rotating and moving longitudinally therein and means for imparting reciprocal longitudinal movement to the cork-screw, of a non-rotating nut encircling the cork-screw and having a limited longitudinal movement in the case and a movable stop adapted to be moved into or out of the path of the nut by means independent of the cork-screw-operating mechanism and when in one position to prevent longitudinal movement of the nut. 2nd. In a cork-extractor, the combination with a suitable case, a cork-screw rotating and moving longitudinally in the case, and means for reciprocating the cork-screw longitudinally, of a non-rotatable nut encircling the cork-screw and having a limited longitudinal movement, and a lever movable independently of the cork-screw-operating mechanism and provided with a lug adapted when in one position to form a stock for said nut and prevent the longitudinal movement thereof. 3rd. In a cork-extractor, the combination with a suitable case, a cork-screw rotating and moving longitudinally in the case and means for reciprocating the cork-screw longitudinally, of a non-rotatable nut encircling the cork-screw and having a limited longitudinal movement,

a movable stop lying normally in the path of movement of the nut, a spring exerting its force upon said stop and tending to hold it in its normal position and means for moving said stop out of the path of movement of the nut independently of the operation of the cork-screw. 4th. In a cork-extractor, the combination of a suitable case, a rotatable cork-screw moving longitudinally therein and means for reciprocating the cork-screw longitudinally, of a non-rotatable nut encircling the cork-screw longitudinally, of a non-rotatable nut encircling the cork-screw and having a limited longitudinal movement, co-acting jaws adapted to clasp the neck of a bottle in the path of movement of the cork-screw, a lever connected with said jaws and adapted to draw them together, and a movable stop adapted to draw them together, and a movable stop adapted when in one position to engage said nut and prevent longitudinal movement thereof, the movement of said lever in drawing said jaws together being adapted to withdraw said stop from its engagement with the nut. 5th. In a cork-extractor, the combination with a suitable case, a rotatable cork-screw moving longitudinally therein and means for reciprocating the cork-screw longitudinally, of a non-rotatable nut encircling the cork-screw and having a limited longitudinal movement, co-acting jaws adapted to clasp the neck of a bottle in the path of movement of the cork-screw, and a lever connected with said jaws and adapted to draw them together, the lever being provided with a lug adapted in one position of the lever, to engage said nut and prevent longitudinal movement thereof, and the movement of the lever in drawing the jaws together being adapted to withdraw said lug from engagement with the nut. 6th. The combination with the case, the cork-screw supported therein and means for rotating and reciprocating the screw, of the pivoted jaws G, G, adapted to clasp the neck of the bottle and formed at their free ends with lugs g^2, g^2 , the swinging lever II, formed with symmetrical cams or fingers h, h , impinging upon the lugs, and means substantially as shown and described for pressing apart the free ends of the jaws G, G. 7th. In a cork-extractor, the combination with the two-part case A, A¹, and the cork-screw carrier B, moving longitudinally therein, of the transverse shaft E, lever E¹, and crank E² formed in a single piece, and the pitman F connecting the crank and cork-screw carrier, the lever, shaft and crank being formed and the parts being adapted to be assembled, substantially as shown and described. 8th. In a cork-screw carrier, the combination with the two-part shell A, A¹, having the dependent flanges G¹, G² of the rotatable and longitudinally movable cork-screw within the shell and means for operating the same, the co-acting jaws G, G, formed with the ears g, g , lying between the flanges G¹, G², and means substantially as shown and described, for operating said jaws to clamp the neck of a bottle in the path of movement of the cork-screw.

No. 49,618. Machine for Threading Screws and Bolt. (Machine à vis.)

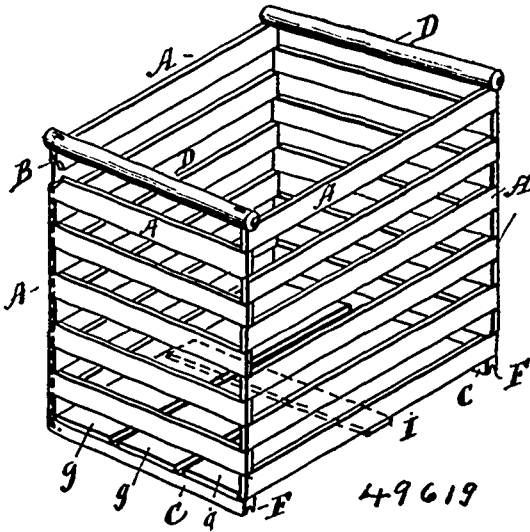


William Royal Wilbur, Cleveland, Ohio, U.S.A., and John Stephens, Gananoque, Ontario, Canada, 5th August, 1895; 6 years.

Claim.—1st. In a machine for providing, with a threaded or gimlet-point, bolts or screws having a threaded shank, the combination with the work-holding-spindle, and means for suitably rotating said spindle, of a worm-wheel, or wheel having a threaded or toothed periphery, adapted to mesh with the threads on the shank of the bolt or screw to be operated upon, and means for suitably rotating said toothed or threaded wheel to feed or guide the work toward and hold the same against the cutter, substantially as set forth. 2nd. In a machine for providing, with a threaded or gimlet-point, bolts or screws having a threaded shank, the combination with the horizontal work-holding spindle, vertical cutter-spindle, cutter on the cutter-spindle, and means for suitably rotating said spindles, of suitable means for feeding or guiding the work as required relative to the cutter, and a worm-wheel supported above the cutter and adapted to mesh with the threads on the shank of the bolt or screw to be operated upon and prevent upward displacement of the work, substantially as set forth. 3rd. In a machine for providing bolts or screws with thread or gimlet-points, the combination with a rotating work-holding spindle suitably supported, means for driving said spindle, a lever B² for reciprocating said spindle, cutter and cutter-spindle, of an upright shaft G, guide or

feed wheel G¹, operatively mounted upon said shaft, a driving shaft H, operatively connected with said upright-shaft, driving pulleys H², H³, having different diameters, reciprocating-bar K, means operatively connected with said bar for causing the one or the other of said pulleys to operate the driving shaft according as said bar is reciprocated in the one direction or the other, suitable means for actuating said reciprocating bar into position to establish operative connection between the driving-shaft and the pulley having the largest diameter, suitable means for locking said reciprocating bar in said position, suitable means adapted to be actuated by the work during the cutting operation for actuating said locking means to unlock, and a spring acting to retain said reciprocating bar in position establishing operative connection between the driving shaft and pulley having the smallest diameter, the parts being arranged, substantially as and for the purpose set forth. 4th. A rotary cutter D, consisting of a wheel blank having its peripheral face serrated with teeth at a level that is worm-wheel fashion each tooth forming a cutting tool adapted to operate laterally that is being brought to bear endwise on the work, substantially as set forth.

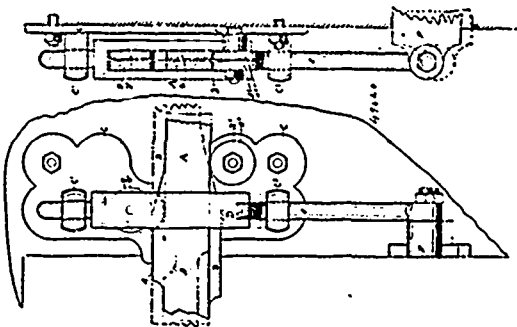
No. 49,619. Folding Crate. (Boîte-pliante.)



Herbert Harvey Cumber, Cadillac, Michigan, U.S.A., 5th August, 1895; 6 years.

Claim.—1st. An improved folding crate having its sides and ends built up of parallel slats and held at the angles by vertical wires or rods which also serve as pivots for the said slats in folding and unfolding, a cylindrical handle bar at each end above the upper end and side bars, and a transverse bottom bar at each end below the lower end and side bars, said bottom bars having grooves in their lower faces to receive the handle bars of another crate, substantially as specified. 2nd. An improved folding crate having its side and end portions built up of parallel slats joined at the angles by vertical pivot wires or rods and a removable bottom having a rigid cleat near each end portion and a cleat at its central portion having projecting ends designed to bear upon the lower edges of the lower lateral slats, substantially as specified.

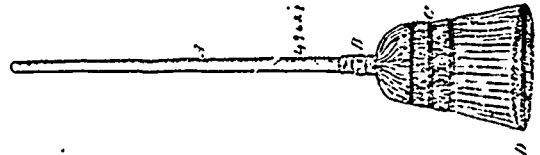
No. 49,620. Cell Door Continuous Locking Bar. (Barre à enclaver pour porte de cellule.)



James Adams, Kingston, Ontario, Canada, 5th August, 1895; 6 years.

Claim. 1st. In a device for locking and unlocking cell doors, two metallic bars placed side by side on edge and specially formed, and means for operating them, substantially as and for the purpose hereinbefore set forth. 2nd. In a device for locking or unlocking one or more doors, a bar A having inclines on the top edge, bar B having inclines on the bottom edge, and semi circular notches on the top edge, the inclines and notches of both bars so placed or located that any one or more doors may be opened or closed and locked by the movement of said bars A and B, substantially as and for the purpose hereinbefore set forth. 3rd. A device for carrying and holding bars A and B located at each door, and for operating the lever F, on each cell door jamb, comprising plate C, for right or left hand action, having lugs or keepers g', g'', in which the bearings of pitman D slide, pitman D with or without friction rollers, through which bars A and B pass or slide, and connecting rods g having its upper end secured to pitman D, and its lower end to lever F, all arranged and combined substantially as and for the purpose hereinbefore set forth.

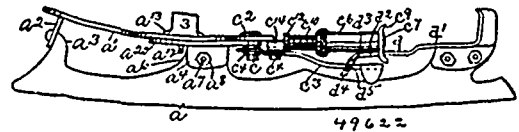
No. 49,621. Broom. (Balai.)



James Howell, Port Arthur, Ontario, Canada, 5th August 1895; 6 years.

Claim.—The combination caused by the inserting a tongue of woven felted, plated textile fabric through the middle of the broom and which with the corn or other broom material acts as a duster on the floor or carpet, substantially as and for the purposes hereinbefore set forth.

No. 49,622. Skate. (Patin.)



Joseph Lyon Whelpley, Boston, Massachusetts, U.S.A., 5th August, 1895; 6 years.

Claim.—1st. The combination of the foot plate a¹ provided with the slots a¹⁰ a¹², the toe clamps a¹³ a¹⁴ having depending arms extended down through the slots a¹⁰ a¹² and provided with enlargements or heads, and cam plate on the under side of the foot plate provided with inclined slots through which the said depending arms extend, the cam plate being held up against the foot plate a¹ by the enlargements or heads on the depending arms, substantially as and for the purpose set forth. 2nd. The combination of the foot plate a¹ provided with the slots a¹⁰ a¹², the toe clamps a¹³ a¹⁴ having depending arms extending down through the slots a¹⁰ a¹² and provided with enlargements or heads, and cam plate on the under side of the foot plate provided with inclined slots through which the said depending arms extend, the cam plate being held up against the foot plate a¹ by the enlargements or heads on the depending arms, and the actuating lever c², the threaded rod c¹⁰, and the internally threaded socket c⁶ loosely journaled at its end, substantially as and for the purpose hereinbefore set forth. 3rd. The combination of the foot plate a¹ provided with the straight narrow slots a¹⁰ a¹², the toe clamps a¹³ a¹⁴, the depending arms a¹⁵ a¹⁶ integral with the toe clamps and provided with the enlargements or heads a¹⁷ a¹⁸, and the cam plate a²⁰ provided with the cam slots b¹ b² provided with the enlargements b² b³, substantially as and for the purpose specified.

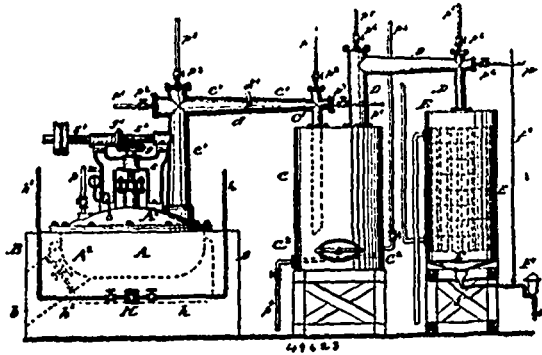
No. 49,623. Process of and Apparatus for Making Pure Acetone. (Procédé et appareil pour faire de l'acétone.)

Ottokar Poisch, Orangeburgh, New York, U.S.A., 5th August, 1895; 6 years.

Claim.—1st. The process herein described of producing chemically-pure acetone, which consists in subjecting an acetate in the presence of calcium-hydrate in excess to destructive distillation and to the action of superheated steam, substantially as set forth. 2nd. The process herein described of producing chemically-pure acetone, which consists in subjecting an acetate at a uniform temperature in the presence of calcium-hydrate in excess and under continuous agitation to distillation and to the action of superheated steam, so as to separate the acetone-vapours from the remaining carbonated lime, substantially as set forth. 3rd. The process herein described of producing chemically-pure acetone, which consists of the following steps: first, mixing ordinary commercial acetate of lime with calcium-hydrate in excess, second, subjecting the mixture under

continuous stirring at a uniform temperature to the action of superheated steam, so as to separate the acetone-vapours from the remain-

the yarn frame respectively and each provided with a series of supports for supporting a series of yarn sticks, provided with a

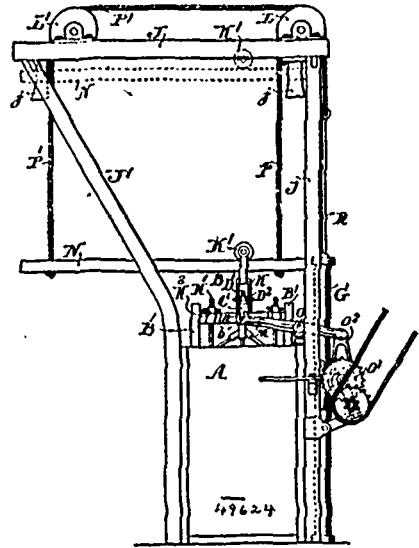


ing carbonate of lime, third, condensing said vapours into crude liquid acetone and lastly, purifying the crude liquid acetone by subjecting it to fractional distillation and rectification, substantially as set forth. 4th. The process herein described of producing chemically-pure acetone, which consists of the following successive steps:—first, mixing the ordinary commercial acetate of lime with calcium-hydrate in excess, second, subjecting the mixture under continuous stirring at a uniform temperature to the action of superheated steam so as to separate the vapours of acetone from the remaining carbonate of lime, third, condensing the acetone-vapours into crude liquid acetone, fourth, mixing the crude acetone with water and permitting it to stand so as to separate it from the tar-oils and sediments, fifth, subjecting the purified acetone to fractional distillation, and finally rectifying the same, substantially as set forth. 5th. The process herein described of producing chemically-pure acetone, which consists in subjecting a mixture of commercial acetate of lime and calcium-hydrate to heat under continuous stirring, supplying superheated steam to the charge so as to facilitate the generation of the acetone-vapours, condensing the vapours, mixing the crude liquid acetone with water in excess, so as to produce the separation of the tar-oils and sediments, subjecting the washed acetone to fractional distillation and rectification, and separating the higher-boiling ketones contained in the rectified acetone by subjecting the same in gas form to surfaces heated to red heat so as to break up the ketones, substantially as set forth. 6th. An apparatus for making acetone, consisting of a mixing-vessel or retort provided with interior rotary scrapers, a furnace for heating said mixing-vessel, a dust collecting-vessel provided with a heating-coil, a connection-pipe between the mixing-vessel and the dust-collector, a condenser, a connecting-pipe between the dust-collector, and condenser, and a discharge-pipe and receiver for the crude acetone below the condenser, substantially as set forth. 7th. In an apparatus for making acetone, a mixing-vessel or retort, composed of a double-walled body filled with molten lead, a cover attached hermetically to the double-walled body and provided with a charging man-hole, a discharge-opening at the bottom of the body, rotary scrapers at the interior of the vessel, and a steam supply-pipe provided with openings at the inside of the mixing-vessel, substantially as set forth. 8th. In an apparatus for making acetone, the combination of a mixing-vessel, a dust collecting-vessel and a condenser, with connecting-pipes between said vessels, said pipes being made of sections arranged at right angles to each other and extended beyond their points of intersection and closed by detachable covers, and valved steam-pipes entering through said covers in line with the axis of the sections, so as to permit the convenient cleaning of all of the sections of the connecting-pipes from the dust collected in the same, substantially as set forth. 9th. In an apparatus for making acetone, a dust collecting-vessel, provided with a heating-coil at its lower part, a vapour supply-pipe, and a discharge-pipe having a dust-catcher below the outgoing end of the discharge-pipe, substantially as set forth.

No. 49,624. Dyeing Apparatus. (Appareil à teindre.)

John George Haslam, Philadelphia, Pennsylvania, U.S.A., 5th August, 1895; 6 years.

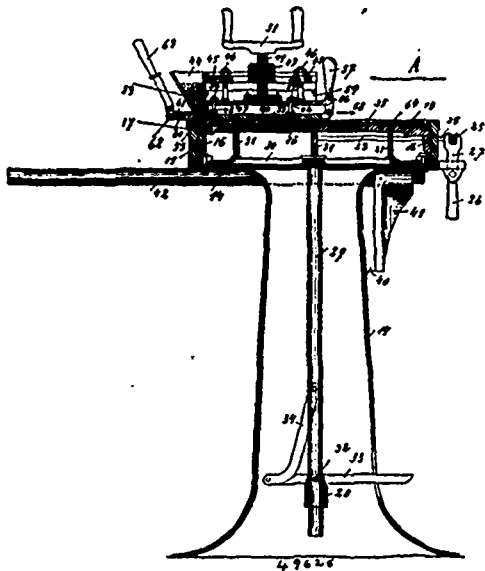
Claim.—1st. In a yarn dyeing machine, a yarn frame provided with upper and lower and intermediate stick supporting frames located on opposite ends or sides of the yarn frame respectively and each provided with a series of stick supports, so that each pair of upper, lower or intermediate frames is adapted to support a series of yarn sticks at the opposite ends. 2nd. In a yarn dyeing machine, a frame provided with upper, lower and intermediate stick supporting frames located on opposite ends or sides of the yarn frame respectively and each provided with a series of stick supports, so that each pair of upper, lower or intermediate frames is adapted to support a series of yarn sticks at the opposite ends, one or more of said stick supporting frames being adjustable with reference to the others. 3rd. In a yarn dyeing machine, a yarn frame having upper and lower stick supporting frames located on opposite sides or ends of



pair of adjustable stick supporting frames located one at each end or side of the yarn frame between the corresponding upper and lower supporting frames, and means extending to the upper portion of the yarn frame for adjusting the two intermediate stick supporting frames relatively to the corresponding upper and lower stick supporting frames from the top of the yarn frame. 4th. In a yarn dyeing machine, a yarn frame having upper and lower stick supporting frames located on opposite ends or sides of the yarn frame respectively and each provided with a series of supports for supporting a series of yarn sticks, provided with a pair of adjustable stick supporting frames located one at each end or side of the yarn frame between the corresponding upper and lower supporting frames and having two sets of supports one for a series of sticks corresponding to the series of sticks carried by the pair of upper supporting frames, and the other for a series of sticks corresponding to the series of sticks carried by the pair of lower supporting frames. 5th. In a dyeing machine, the combination of the yarn frame having pairs of upper and lower supporting frames each frame being provided with a series of supports for supporting a series of yarn sticks, a pair of adjustable stick supporting frames arranged one between the upper and lower supporting frames at each end or side of the yarn frame and provided with a series of supports for supporting yarn sticks between the sticks carried by the pairs of upper and lower supporting frames, uprights H¹ carried by the intermediate stick supporting frames and extending to the top of the yarn frame, and means for adjusting the uprights H¹ to raise and lower the pair of intermediate supporting frames and the sticks carried by them. 6th. In a dyeing apparatus, the combination of the dye vat, an upwardly extending frame projecting beyond the vat, the yarn frame, a movable carriage supporting the yarn frame, a horizontal guide or rail for the carriage on which the said carriage may be moved, and means carried by the upwardly extending frame to raise and lower the horizontal guide or rail, whereby the carriage for the yarn frame may be bodily raised and lowered with its guide or rail and may be moved horizontally on the rail when the same is elevated. 7th. In a dyeing apparatus, the combination of a liquor vat, an upwardly extending frame projecting above the vat and having a lateral extension beyond the vat, a movable rail arranged transversely to the vat and suspended from the upwardly extending and overhanging frame, means to raise and lower the rail, a movable carriage carried by the rail, and a yarn carrying frame carried by the movable carriage. 8th. In a dyeing apparatus, the combination of a liquor vat, an upwardly extending frame projecting above the vat and having a lateral extension beyond the vat, a movable rail arranged transversely to the vat and suspended from the upwardly extending and overhanging frame, means to raise and lower the rail, a movable carriage carried by the rail, a yarn carrying frame carried by the movable carriage, and seats on the upwardly extending and overhanging rail to centre and support the rail when the same is raised. 9th. In a dyeing machine, a yarn frame consisting of uprights B¹, longitudinal side bars B², B³, and transverse end pieces B³, B³, united together at the corners by a single bolt whereby said parts may be disconnected and any pieces removed, and the upper transverse end pieces B³, B², and longitudinal top piece C. 10th. In a dyeing machine, the combination with the dye vat, of a steam supply pipe entering the same, a valve in the steam supply pipe, and a metallic piece connected with said valve and subjected to the heat of the liquor in the vat whereby the expansion

of said metallic piece will automatically close the valve and shut off the supply of steam through the steam pipe. 11th. In a dyeing machine, the combination with the vat, of a steam supply pipe entering the same, a valve in the said steam supply pipe, and an expandible overflow pipe leading from the vat and connected with the valve in the steam pipe, whereby the heat of the overflow liquor will expand the overflow pipe and close the valve in the steam pipe. 12th. In a dyeing machine, the combination with the vat, of a steam supply pipe entering the same, a valve in said steam supply pipe, and expandible overflow pipes S, having a waste outlet S', and connected with the valve in the steam pipe.

No. 49,625. Roofing Tile and in Machinery for the Manufacture of the Same. (Tuile et appareil de fabrication.)

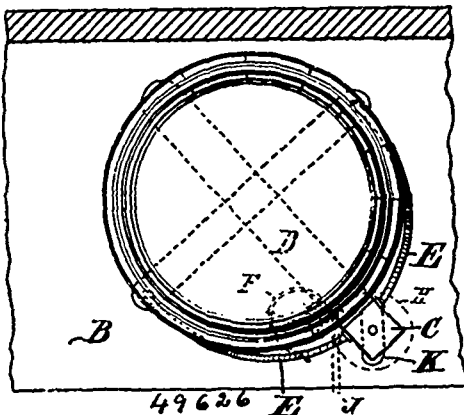


Abraham Weil, Steinheim, Prussia, German Empire, 6th August, 1895; 6 years.

Claim.—1st. Cement roofing tiles of desired shape having a mortise joint that overlapping ledges are provided at the upper or lower edges of the roofing tiles, these having depressions or grooves to bring about a mortise joint or tooth-like lugs or springs with the same object and in which one of the truncated corners is provided with a packing consisting of a metal plate which is slit and bent back, the whole with the object of bringing about an intimate connection and packing of the cement roofing tiles among themselves, as well as an augmented durability of the whole roof as the result of the engagement and mode of laying the layers of roofing tiles, substantially as hereinbefore described. 2nd. Cement roofing tiles having a mortise joint formed with the lower overlapping ledges possessing depressions or a groove a parallel to the plane of the tiles whilst the upper overlapping ledges having tooth-like lugs or a spring b on their inner sides, and one of the truncated corners is provided with a packing consisting of a metal plate, which is slit and bent round in two slips so that the tooth-like lugs or the spring b of the overlapping ledges engage in the depressions or in the groove a of the overlapping ledges of the adjacent tiles and the slips of the packing close the joints between the truncated corners and whereby the underside of the cement roofing tile is provided with strengthening ribs and the front upper edges c are rounded the whole with the object of effecting an intimate connection and close jointing of the cement roofing tiles among themselves and augmenting the durability of the roof as a whole, substantially as hereinbefore described. 3rd. In a press for the manufacture of cement roofing tiles, of the class described, an arrangement for forming the depressions in the overlapping ledges in the roofing tile, consisting of a bed which is sunk in a frame, of another frame which is adjustable in corresponding recesses in the bed by means of a thrusting-rod, stirrup and lever and is provided with guide-plates and teeth, and of a mould-plate which covers the bed and is furnished with angles for the overlapping ledges and the nose, together with recesses contrived, in the angles of the same, so that, after the cement roofing tile has been made upon the mould-plate by the deposition and distribution of the material, the teeth are pressed into the formed overlapping ledges and the depressions in the latter produced, by moving the toothed frame in the proper direction. 4th. In a press for the manufacture of cement roofing tiles of the class described, an arrangement for forming the overlapping ledges furnished with tooth-like lugs, such arrangement comprising a funnel adapted to be shifted upon guide-rods, a plate which can be shifted vertically by means of a screw and has an edge, the plate being

connected by screws guided in slots, with a plate which, by means of a lever can be shifted parallel or diagonally to it, and is provided on the sides which are adjacent to the funnel with recesses corresponding to the toothlike lugs the whole with the object of forming the overlapping ledges in the cement roofing tile by shifting the last named plate in one direction and the whole apparatus in the opposite direction after which, the said plate being shifted back and raised, together with the other plate the cement roofing tile is set free, in a finished state, substantially as hereinbefore described. 5th. The improved roofing tile consisting of a hardened cement slab having overlapping ledges at opposite ends and on opposite sides, such ledges being provided with depressions or grooves in their inner faces adapted to secure the interlocking of one tile with another, strengthening ribs formed on its surface and a suspending nose at one corner and having two truncated corners one of which carries a flexible packing device, all substantially as shown and described. 6th. The improved press for the manufacturing of cement roofing tiles, comprising in combination the work table, the mould, the movable toothed frame, and its adjusting mechanism, the mould plate, the movable funnel and means for supporting same, the movable plates one of which carries toothlike lugs and actuating means carried by said funnel, the cutting knives and ejecting mechanism all substantially as hereinbefore described and shown.

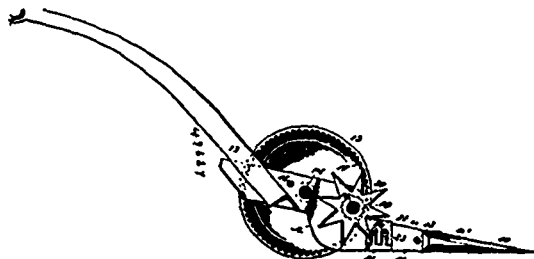
No. 49,626. Barrel Swing. (Beceau de baril.)



James W. Phipps, Saint John, New Brunswick, 6th Canada August, 1895; 6 years.

Claim.—1st. A barrel swing comprising a rocking post C, having a floor or cruciform platform D, and side braces E, E, as set forth. 2nd. A barrel swing, comprising a rocking post C, having a floor or cruciform platform D, attached thereto braces E, E, supporting said floor or platform from the post, spring pawl G, ratchet H, and push bar J, to lock the swing, as set forth.

No. 49,627. Vine Cutter. (Coupe-vigne.)



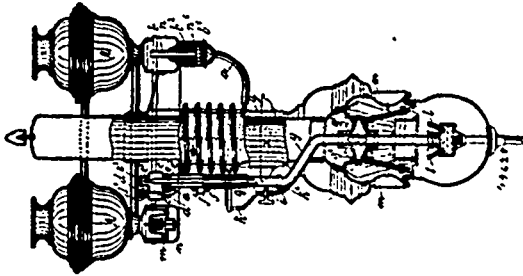
Hammond Johnson Evans, Hampton, New Brunswick, Canada, 6th August, 1895; 6 years.

Claim.—1st. In a machine for cutting and trimming vines and for similar purposes, a body provided with a finger or finger bar, and an opening made longitudinally therein, a rotary cutter mounted in the said opening, driving wheels supporting the body and finger bar, a driving connection between the drive wheel and the said rotary cutter, and a stationary cutter over which the rotary cutter has movement, as and for the purpose set forth. 2nd. In a machine for cutting vines and for like purposes, a body provided with a finger bar or finger, the body and finger bar having an opening therein, ground wheels supporting the said body, a rotating cutter mounted in the body and receiving motion from the ground wheel of the machine, and an adjustable cutter adapted to be fixed in the body or sickle bar of the machine and to be passed in close proximity by the rotary cutter, the cutting edges of the two cutters being bevelled in opposite directions, as and for the purposes specified. 3rd. In a machine for cutting vines, and for similar purposes, the combi-

nation with a body and a finger bar or finger projected rearwardly therefrom, the body and finger bar being provided with a longitudinal opening and constructed in sections, and ground wheels supporting the said body and finger bar, of a rotating stellated cutter mounted to revolve in the opening in the body and finger bar, being driven from one of the ground wheels, and an adjustable cutter stationarily placed in a wall of the said opening in front of the rotating cutter, whereby a shear cut is obtained, and ready access may be secured to either cutter for purposes of sharpening or for other purposes, substantially as described. 4th. In a machine for cutting vines and for other purposes, the combination, with a body and a finger bar, the body and finger bar being in longitudinal sections and provided with a longitudinal opening, ground wheels supporting the said body, one of the said wheels being fast to the axle and provided with an internal gear, while the other wheel is capable of being removed from the axle, of a rotating cutter mounted on a shaft journalled in the opening in the body and finger bar, a pinion carried by the cutter shaft and meshing with the internal gear of the said ground wheel, and a stationary cutter likewise located in the said opening, adapted substantially for engagement with the rotary cutter, as and for the purpose set forth. 5th. In a machine for cutting or trimming vines, the combination, with a body and a finger bar projected therefrom, the finger bar and body being provided with an opening, and an axle carried by the body of the machine and provided with ground wheels, one of which has an internal gear, of a shaft journalled in the said opening of the body and cutter bar, a stellated cutter secured on the said shaft, a pinion carried on the shaft and engaging with the internal gear of the said ground wheel, and a stationary cutter likewise located in the opening of the body and finger bar, adapted to be passed and substantially engaged by the rotating cutter, the cutting edges of the two cutters being bevelled in opposite directions, as and for the purpose specified.

No. 49,628. Hydro-Carbon Lamp.

(Lampe à hydro-carbures.)

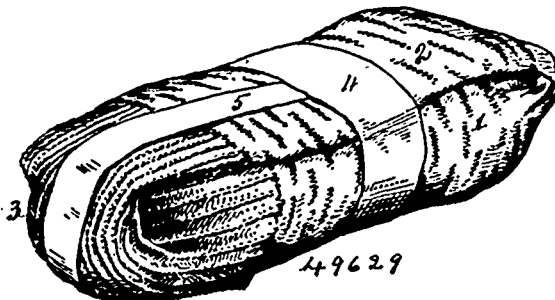


Julius Schulke, 94 Leipzigerstrasse, Berlin, Germany, 6th August, 1895; 6 years.

Claim.—1st. Improved petroleum feeding device for regenerative hydro-carbon lamps, characterized by a flexible tube, one end of which is secured to the petroleum receptacle the other free and being provided with an overflow chamber which may be raised and lowered along with the tube as desired, substantially as described and shown in the drawings. 2nd. In petroleum feeding devices for regenerative hydro-carbon lamps, a flexible tube through which the petroleum passes from the petroleum-receptacles to an overflow chamber and, after filling the latter, flows through a tube thus finding access to the gasifying retort, substantially as described and shown in the drawings. 3rd. In combination with a petroleum feeding device for hydro-carbon lamps, a filter for regulating the flow of petroleum through a flexible tube, consisting of suitable filtering material placed between a fixed and movable perforated disc.

No. 49,629. Tobacco Package, Pouch or Casing.

(Paquet et sac à tabac.)

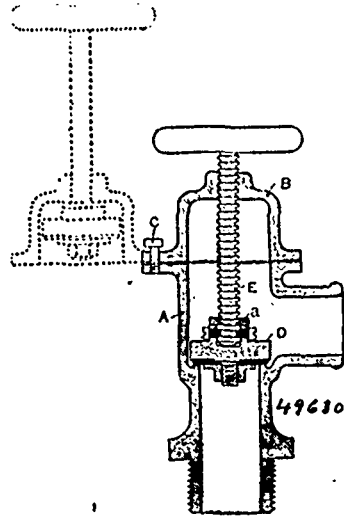


William Hoffbauer, Chicago, Illinois, U.S.A., 6th August, 1895; 6 years.

Claim.—The tobacco pouch or casing having parts corresponding to the foot and leg of a sock, with the leg portion folded upon the foot portion, substantially as shown and described.

No. 49,630. Screw-Down Valve.

(Soupape d'arrêt à siège horizontal que l'on ferme en vissant.)

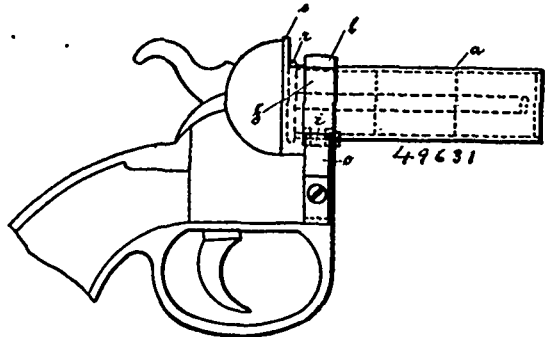


Stephen Humble, jr., and James Frederick Barker, both of London, England, 6th August, 1895; 6 years.

Claim.—1st. In a stop valve, the arrangement of parts consisting of a hand wheel screwed spindle directly operating a plate piston valve, a casing containing valve seating and a cover recessed to receive valve and pivotally attached to the said casing, all adapted to permit the valve and working parts to be withdrawn from the water-way when in operation and to be entirely removed from the casing by revolution about the said pivot hinge to admit of easy access to the valve washer, the seating and the supply pipe under the said seating, substantially as described. 2nd. In a stop valve as claimed in claim 1, a cover hinged or pivotally attached to casing, carrying in a stuffing-box a spindle screwed at lower end and engaging in a tapped hole in plate valve protected by a closed casing into which the spindle enters as the valve is screwed up, the rotation of the valve being prevented by feathers in the side of casing, engaging with the valve, substantially as described in figures 3 and 4. 3rd. In a stop valve as claimed in claim 1, the specific arrangement of parts consisting of a straight through passage with seating placed obliquely thereto a recessed and pivotally hinged cover, containing a stuffing-box, and intermediate chamber between stuffing-box and screwed neck, a partly screwed spindle and plate piston thereon, adapted to withdraw the valve from the seating into recessed cover to enable their removal from casing by turning the cover on its hinge, substantially as described in figures 5 to 8.

No. 49,631. Apparatus for Firing-off Flashing Signals.

(Appareil de signaux à l'aide d'éclats longs et brefs.)

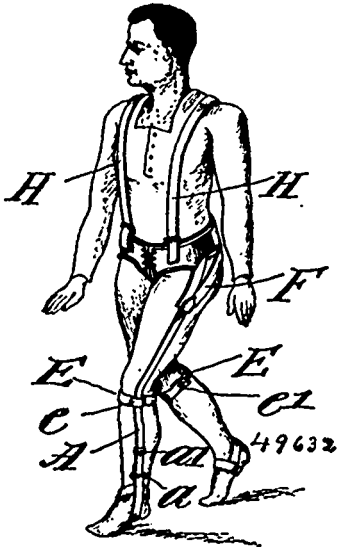


Johann Georg Wilhelm Berekholtz, Hamburg, German Empire, 6th August, 1895; 6 years.

Claim.—1st. Cartridges for signalling purposes characterized by a tube open at both ends and placed inside the cartridge in the direction of its axis, the tube being fixed at one end directly over

the percussion cap with the cartridge and at the front end thereof and being filled with a match-cord and surrounded by several layers of flashing mass of different colours for the purpose of isolating the said mass from the percussion cap, of igniting the layers of mass at the open front end of the cartridge and of slowly consuming the variegated layers, substantially as herein described and shown. 2nd. A firing-off apparatus without barrel characterized by a disc destined to hold the cartridge and provided with two cheeks or lateral guides a bed or bearing having a shape corresponding to that of the cartridge and provided with a movable strap acted upon by a spring and securing the cartridge at the top, and an extractor or ejector having the shape of an angle iron which is thrown out of action after each stroke by a spring, substantially as herein described and shown.

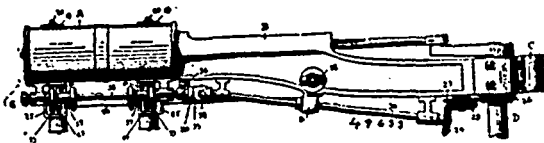
No. 49,632. Apparatus for Facilitating Walking, Running, Skating or the Like. (Appareil pour aider à marcher, courir patiner, etc.)



Abraham G. Kheiralla, Chicago, Illinois, U.S.A., 6th August, 1895; 6 years.

Claim.—1st. An apparatus for assisting locomotion and preventing fatigue, consisting of a body harness having depending elastic straps mounted to the outer side of each leg, guides for said straps confined to the outer side of each leg above or below the knee, and a sling or harness passing under the foot of the wearer and connected to the lower ends of said lifting straps, substantially as shown and described. 2nd. An apparatus for assisting locomotion and preventing fatigue, consisting of an elastic strap mounted to the outer side of each leg and connected at their upper ends to hip bands secured upon each side of the body, and at their lower ends to a foot sling consisting of three straps under the instep and above the ankle joint and passing above the heel and in front of and behind the ankle joint, substantially as shown and described.

No. 49,633. Steam-Engine. (Machine à vapeur.)

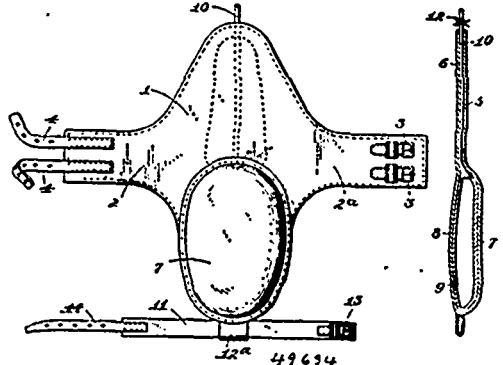


Edward Kittredge Hill, Worcester, Massachusetts, and Joseph Henson Webster Hoadley, Chicago, Illinois, all in the U.S.A., 6th August, 1895; 6 years.

Claim.—1st. The combination of a removable shell or plug provided with seats for the inlet and outlet valves, and a brace or strut for re-enforcing the inlet valve-seat made in the form of a ladder or grating, substantially as described. 2nd. The combination of the cylinder, a transverso shell or plug fitting therein, having inlet and outlet valve-seats, inlet and outlet valves arranged in said plug to move transversely of the cylinder, and a brace or strut for re-enforcing the inlet valve-seat, substantially as described. 3rd. The combination of the cylinder, a removable shell or plug having inlet and outlet valve-seats, inlet and outlet valves mounted in said plug arranged to move transversely of the cylinder, and a brace or strut made in the form of a grating or ladder for re-enforcing the inlet valve-seat, substantially as described. 4th. The combination of the cylinder, a removable shell or plug, an

inlet valve mounted in said plug, springs for holding the inlet valve upon its seat, a part or piece for holding said springs in place said part being secured between the removable plug and its bearings in the cylinder, substantially as described. 5th. In an engine, the combination of a removable plug or shell having a valve-seat, a removable cap or head secured to one end of said plug, and a valve-actuating mechanism mounted on said head, substantially as described. 6th. In an engine, the combination of a removable plug or shell, inlet and outlet valves mounted in said shell, a removable cap or head secured to one end of said plug, a valve-actuating mechanism mounted on said head, a shaft for driving said valve actuating mechanism, and a universal joint for connecting said shaft with a shaft driven from the main shaft of the engine, substantially as described. 7th. In an engine, the combination of an inlet valve working transversely of the cylinder, a vertically movable tappet actuating the inlet valve, a curved arm or finger extending downwardly from said tappet to engage suitable governor-controlled connections, whereby said governor connections can act substantially in line with said tappet, and an oscillating pusher for engaging said tappet, substantially as described. 8th. In an engine, the combination of a valve working transversely of the cylinder, a movable tappet for actuating said valve, governor-controlled connections for regulating the position of said tappet, and a pivoted oscillating pusher having an offset projection or wearing surface located with angular lead for engaging with and actuating said tappet, substantially as described. 9th. In an engine, the combination of an inlet valve working transversely of the cylinder, a vertically movable tappet for actuating the inlet valve, a curved arm or finger extending downwardly from said tappet, a reciprocating governor-controlled rod, and a conical roller journalled upon said rod, in position to engage said arm, substantially as described. 10th. In a valve-gear for engines, the combination of a vertically movable tappet, a reciprocating governor-controlled rod, a conical roller for adjusting the height of said tappet journalled upon said rod, a bracket for securing said roller in place upon the rod, said bracket being provided with a cam-shaped projection forming a safety device in case of accident, to the governor, substantially as described. 11th. In an engine, the combination of a valve working transversely of the cylinder, a dash-pot arranged on the working side of the engine in line with said valve, and adjustable connections between the valve and dash-pot, substantially as described. 12th. In an engine, the combination of an inlet valve working transversely of the cylinder, a vertically movable tappet actuating the inlet valve, a dash-pot acting to close said inlet valve, adjustable connections between the inlet valve and the vertically movable tappet, and adjustable connection between the vertically movable tappet and the dash-pot, substantially as described. 13th. In an engine, the combination of a removable plug or shell, inlet and outlet valves mounted in said plug, and movable transversely of the cylinder, a vertically movable sliding tappet, governor-controlled connections for regulating the position of said tappet, a pivoted, oscillating pusher operating upon said tappet to open the inlet valve, a dash-pot for closing the inlet valve, and means for actuating the outlet valve, substantially as described. 14th. The combination of removable shells or plugs, one being secured at each end of the cylinder, inlet and outlet valves mounted in each of said plugs, a movable tappet and a pivoted, oscillating pusher for each inlet valve, and a actuating shaft having independent eccentrics connected to operate each outlet valve and each pusher, substantially as described. 15th. In an engine, the combination of an inlet valve, an outlet valve, a vertically adjustable tappet and an oscillating pusher for actuating the inlet valve, and toggle-levers or links for actuating the outlet valve, substantially as described. 16th. In an engine, the combination of an inlet valve and an outlet valve, a vertically movable tappet, an oscillating pusher, an eccentric for actuating said pusher to open the inlet valve, a dash-pot acting to close the inlet valve, toggle levers or links connected to said outlet valve, and an eccentric for actuating said toggle levers, substantially as described.

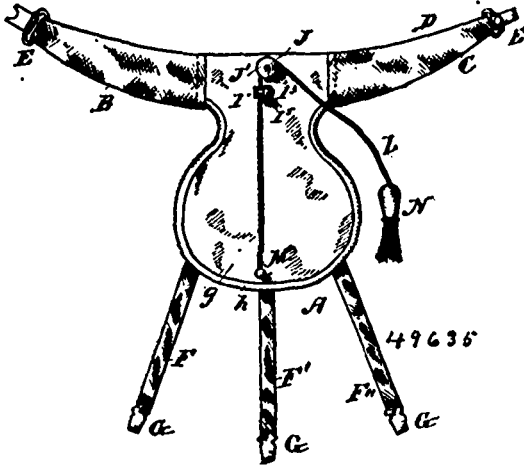
No. 49,634. Horse Boot. (Botte de cheval.)



Stephen Squire Green, Buffalo, New York, U.S.A., 6th August, 1895; 6 years.

Claim.—In an interfering boot for horses, the combination with the body portion of the boot having side extension pieces adapted to wind around a horse's hmb and means for securing it thereto, of a pneumatic pad of elastic material inclosed between a convex-pad of stiff leather on its exposed side and a flexible covering on its inner side, and means for inflating and securing the same, substantially as described.

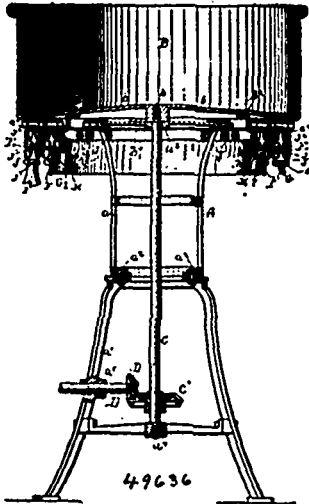
No. 49,635. Elastic Skirt Elevator.
(*Relève-jupes élastique.*)



John Mallett, Oakland, California, U.S.A., 6th August, 1895; 6 years.

Claim.—1st. In a device of the class described, the combination of a flexible elastic pad with a cord secured to one extremity thereof and passing through suitable guides at the other, said pad being adapted to coil when tension is exerted on said cord and immediately assume its former position when relaxed, substantially as set forth. 2nd. In a device of the class described, the combination of a flexible elastic pad with a cord secured to one extremity thereof and guided in pulleys at the other, the axis of revolution of said pulleys being at right angles to each other, substantially as set forth.

No. 49,636. Filling Machine. (*Machine à remplir.*)



Fred Wallis and George Galbraith, both of Rochester, New York, U.S.A., 6th August, 1895; 6 years.

Claim.—1st. In a filling machine, the combination with a receptacle, a spout connected therewith and having an outlet chamber, a cross-bar within said chamber, a deflected valve stem depending from said bar, and a valve at the lower end of the stem, of a discharge tube sliding within said spout, surrounding the valve stem above the valve, having its lower end deflected to correspond with the deflection of the stem, and having a closed upper end surrounding the stem and provided with openings in its sides adapted to communicate with the outlet chamber, and means for pressing this tube normally downward to close its lower end on said valve, substantially as and for the purpose set forth. 2nd. In a filling machine, the combination with a receptacle, a spout connected

therewith and having an outlet chamber at its upper end and an internal guide-way within its body, a deflected valve stem depending from a fixed support within said chamber, and a valve at the lower end of the stem, of a discharge tube sliding within the guide-way, surrounding the stem above the valve, having its lower end deflected to correspond with the deflection of the stem, and having a closed upper end surrounding the stem and provided with side openings adapted to communicate with the outlet chamber, a shoulder on the tube, and a spring within the guide-way pressing on the shoulder for bearing the tube downward to normally close its lower end on said valve, as and for the purpose set forth. 3rd. In a filling machine, the combination with a spout having a slot in one side and provided with an outlet chamber at its upper end and also with an internal guide-way, of a discharge tube sliding within said spout and having a closed upper end with an opening in its side, a shoulder on the tube beneath said guide-way, a spring within the guide-way bearing the shoulder normally downward, a drip or vent tube carried by said shoulder, opening through its lower face, and projecting through the slot in the spout, and means for closing the discharge tube when in its lower-most position, substantially as and for the purpose set forth. 4th. In a filling machine, the combination with a delivery spout having ears on its sides, and a longitudinally movable filling tube projecting below said spout, of levers centrally pivoted to said ears and having inturned engaging ends at their lower extremities bearing normally against said filling tube, and expansive springs between their upper extremities and said spout, substantially as and for the purpose specified. 5th. In a filling machine, the combination with a delivery spout having ears on its sides, and a longitudinally movable filling tube projecting below said spout, of levers centrally pivoted to said ears and having inturned engaging ends at their lower extremities bearing against said filling tube, arms projecting radially from the spout and passing through eyes near the upper extremities of the levers, adjustable shoulders on the outer ends of said arms, similar shoulders near their inner ends, and expansive springs between the inner shoulders and the eyes, as and for the purpose set forth. 6th. In a filling machine, the combination with a delivery spout having ears on its sides, and an upright slot in one side interposed between the ears, a longitudinally movable filling tube within the spout, and a vent tube carried by the filling tube and movable bodily within said slot, of levers normally against the tube, springs between the upper ends of the levers and the spout, and means for adjusting the tension of the springs, as and for the purpose set forth. 7th. In a filling machine, the combination with a delivery spout having ears on its sides and an upright slot in one side interposed between the ears, a longitudinally movable filling tube within the spout, and a vent tube carried by the filling tube and movable bodily within said slot, of clamps consisting of levers pivoted to said ears, and springs operating the levers so as to engage the shoulder on a bottle neck at points quartering to the vent tube, as and for the purpose set forth. 8th. In a filling machine, the combination of a receptacle for the material to be filled, a rotary movable discharge tube connected to the receptacle, a drip or vent tube opening from the article being filled, a rotary chamber for receiving the material discharged from the drip tube, and a valve for normally closing the discharge tube, substantially as described. 9th. In a filling machine, the combination with a rotary receptacle, an annular series of spouts carried thereby and provided with radial upright slots, and an annular chamber supported beneath said receptacle, of longitudinally movable filling tubes within the spouts, means for holding them normally closed, and a downwardly opening vent tube carried by each filling tube with its body projecting through the slot in the spout and its outer end delivering into said annular chamber, as and for the purpose set forth.

No. 49,637. Hold Back for Vehicles.
(*Ragot de limonière.*)

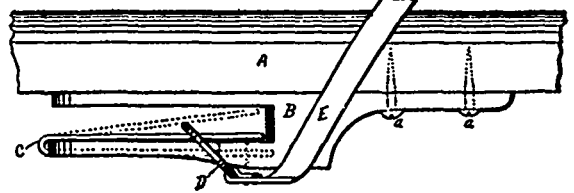


Fig. 1.

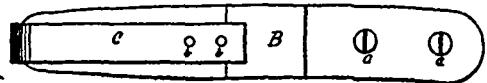


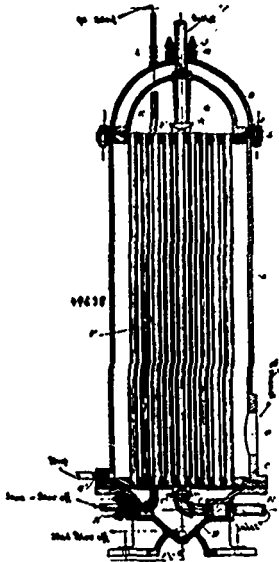
Fig. 2.

John H. Wimmer, St. Thomas, Ontario, Canada, 6th August, 1895; 6 years.

Claim.—1st. The combination, with the shaft or thill of a vehicle, of the forked check-loop B, and the V-shaped spring C, substantially as and for the purpose hereinbefore set forth. 2nd. The combination, with the check-loop B, and the spring C, of the ring D, and the hold back strap E, substantially as and for the purpose hereinbefore set forth.

No. 49,638. Feed Water Heater.

(Réchauffeur d'eau d'alimentation.)

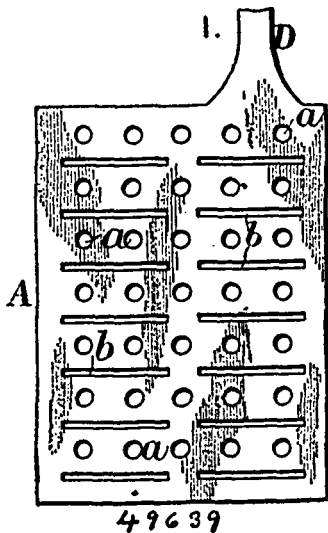


Walter H. Laurie, Montreal, Quebec, Canada, 6th August, 1895; 6 years.

Claim.—1st. In a feed water heater, a top tube plate connected only with the upper extremities of the tubes and free to move up or down with their expansion or contraction without distorting it in any way, substantially as described and for the purposes set forth. 2nd. In a feed water heater, a steam jacketed discharge chamber, substantially as described and for the purposes set forth. 3rd. In a feed water heater, the combination of an immovable bottom tube plate, a movable upper tube plate, with a steam jacketed discharge chamber and an outside casing, substantially as described and for the purposes set forth.

No. 49,639. Plate for Secondary Voltaic Batteries.

(Plaque pour piles secondaires.)

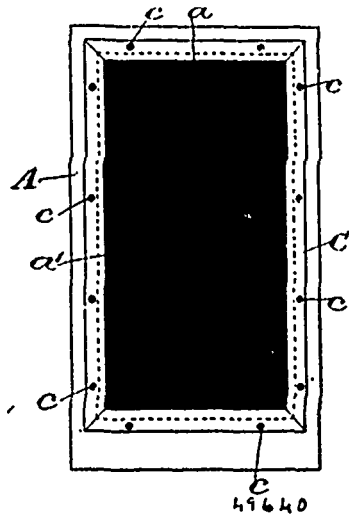


William Alfred Baxter Buckland, 12 Pakenham St., Grays Inn Road, Middlesex, England, 6th August, 1895; 6 years.

Claim.—A plate for secondary voltaic battery presenting on both of its sides compartments separated by partitions and surrounded by a framing of celluloid or equivalent material, these compartments being charged with active material communicating through holes in the plate, substantially as described.

No. 49,640. Combined Screen and Storm Door.

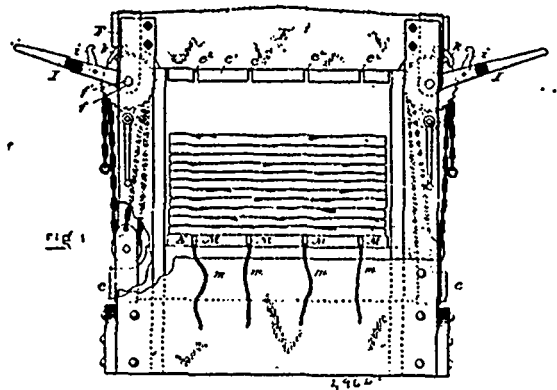
(Store et contre-ports combinés.)



Charles Cook Wheeler, Holland, Michigan, U.S.A., 10th August, 1895; 6 years.

Claim.—A combined screen and storm door, consisting of the door frame, wire gauze stretched over the frame, retaining strips having undercuts along their inner edges secured to the door frame over the edges of the wire gauze to hold the latter in position, removable panels arranged to enter said undercuts along one end and side of each panel, the opposite ends and sides of the panels, being spaced apart when the panels are in adjusted position and removable securing pieces adapted to overlap and extend between the spaced edges and ends of said panels to lock them in position, substantially as set forth.

No. 49,641. Portable Press. (Presse portative.)

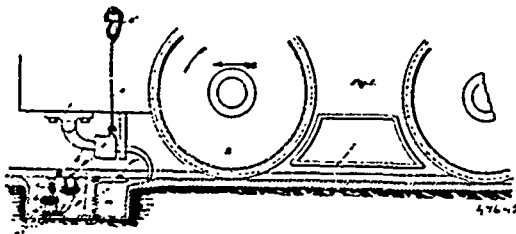


Jeremiah Daigneau, Salem, Massachusetts, U.S.A., 10th August, 1895; 6 years.

Claim.—1st. The combination, in a press, of the framework having the stationary head E¹, the movable platen E having guided ends and actuating devices at each end of the press comprising a pulley at each end of the platen and a pulley and chain extending wheel near each upper corner of the frame and a chain extending about the pulleys and actuating roll or wheel as specified, and means for turning said chain actuating wheels, as and for the purposes described. 2nd. The combination, in a portable press of the base, the uprights separated from each other to form a guide way for the ends of the platen and a recess for the platen actuating devices, the press head attached to the uprights, the platen and the platen actuating devices comprising chains and stationary pulleys and movable pulleys and chain drawing wheels, as and for the purposes described. 3rd. The combination, in a press, of the head E¹, the platen E, its actuating devices comprising the chains G, the pulleys g¹ carried by the platen, the pulleys f², the chain actuating wheels

f', and means for turning them and the straps *g* and *F*, as and for the purposes described. 4th. The combination, in a press of the head *E'*, the movable platen *E*, the pulleys *g'* carried thereby, the shafts *f*, the pulleys *f'*, and chain drawing wheels *f''* mounted thereon, the ratchet-wheel or wheels *f'*, the levers *F* having pawls to engage the ratchet-wheels and the stop pawls *K*, as and for the purposes described. 5th. The combination of the head *E'*, the movable platen *E*, the platen actuating devices specified, comprising the chains *G*, and the pulleys *g''*, *f''*, the chain actuating wheels *f''*, a ratchet-wheel *f'*, and the ratchet toothed wheels *H* adapted to be turned by the handles *h* and engaging the ratchet-teeth of the ratchet-wheels *f'*, the said wheel *H* also having a lateral movement in relation thereto whereby they may be disengaged from said wheels, as and for the purposes described. 6th. The combination, in a press of the character specified, of the head *E'*, the movable platen *E*, the tackle connections between each end of the platen and the head of the press and means for applying power to the chain actuating wheels of the tackle, substantially as described.

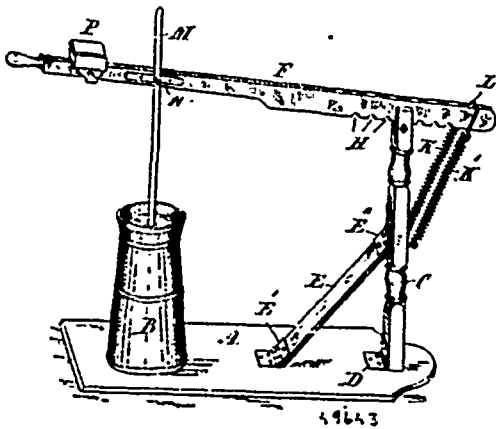
No. 49,642. Apparatus for Controlling the Switches of Tram Lines. (*Appareil pour contrôler les aiguilles de chemin de fer électrique.*)



Edward Penning Dupuis, Halle, Prussia, German Empire, 10th August, 1895; 6 years.

Claim.—An apparatus for street car switching consisting of a vertical, movable lever *b* attached to the car, a sunken lever *f* placed before the switching-rail *Z* in grooves *S* and operated by the lower lever *b* and the car wheel by which the switching rail *Z* connected with the levers *g* and *h* is changed and the switch is turned, as and for the purpose specified.

No. 49,643. Spring Power for Operating Churns. (*Pouvoir a ressort pour actionné les barattes.*)



William Sparling, Little Rock, Arkansas, U.S.A., 10th August, 1895; 6 years.

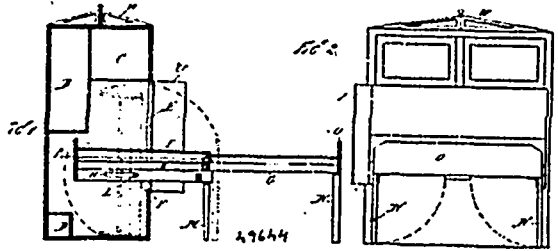
Claim.—The combination with the base *A*, and hand lever *F*, of the fulcrum post *C*, hinged at the foot to said base and supporting said lever, the brace *E*, hinged to said post and base the pair of parallel spiral elongating springs *K*, *K'*, connected to the overhanging end of the lever and attached to the post, as set forth.

No. 49,644. Folding Bed. (*Lit pliant.*)

William Henry McEnhill and Broxton Bragg Richardson, both of Sailors' Snug Harbour, New York, U.S.A., 10th August, 1895; 6 years.

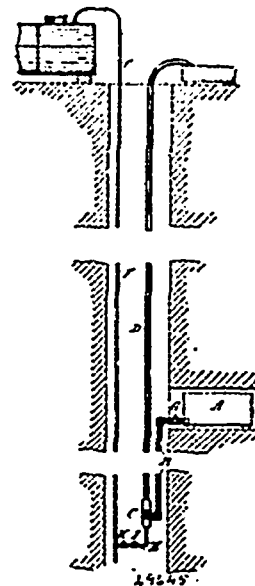
Claim.—1st. The combination is a folding bed, of a plurality of sections which are adapted to be folded together the inner section being pivotally connected with the cabinet or casing and adapted to be folded therein, substantially as shown and described. 2nd. The combination with a casing or cabinet, provided with an opening in the front thereof of a bed, consisting of separate sections one of which is adapted to slide within the other and one of which is pivotally connected with the casing or cabinet and adapted to be folded

therein, in such manner that the bed will be entirely inside of the cabinet, substantially as shown and described. 3rd. The combi-



nation of a casing or cabinet having an opening in the front side thereof, a roller secured at the lower side of the said opening a bed consisting of separate sections one of which is adapted to slide within the other, the inner sections being provided with longitudinal slots in the side bars thereof through which extends a rod connected with the sides of the cabinet or casing, the said sections being adapted to slide one within the other, in which position they may be folded by means of said rod into the casing or cabinet, substantially as shown and described. 4th. The combination of a casing or cabinet, having an opening in the front side thereof, a roller secured at the lower side of said opening a bed consisting of separate sections one of which is adapted to slide within the other the inner section being provided with longitudinal slots in the side bars thereof through which extend a rod connected with the sides of the casing, the said sections being adapted to slide one within the other, in which position they may be folded by means of said rod into the casing or cabinet, the outer ends of each section being provided with hinged legs or supports at each corner adapted to fold transversely thereof, substantially as shown and described. 5th. The combination of a casing or cabinet, having an opening in the front side thereof, a roller secured at the lower side of said opening a bed consisting of separate sections one of which is adapted to slide within the other, the inner section being provided with longitudinal slots in the side bars thereof through which extend a rod connected with the sides of the casing, the said sections being adapted to slide one within the other, in which position they may be folded by means of said rod into the casing or cabinet, the outer ends of each section being provided with hinged legs or supports at each corner adapted to fold transversely thereof, and the outer end of the inner section and the inner end of the outer section being provided with means for supporting the abutting ends of a sectional mattress, substantially as shown and described.

No. 49,645. Method of and Appliance for Raising Water from Mines or Elsewhere by Means of Compressed Air. (*Methode et appareil pour pomper l'eau des mines etc, au moyen de l'air comprimé.*)

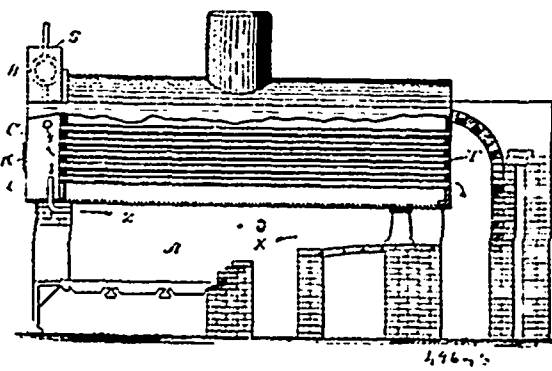


George Lonselle, Bendigo, Victoria, Australia, 10th August, 1895; 6 years.

Claim.—1st. The herein described method of raising water from mines or elsewhere by means of compressed air consisting in first

leading such water down a certain distance proportionately to the height to which it has to be raised and conducting it into a delivery pipe above the point of entrance of a supply of compressed air, substantially as and for the purposes herein described and explained, and as illustrated in the accompanying drawings. 2nd. The herein described appliances for raising water from mines or elsewhere by means of compressed air, consisting of the various parts combined, constructed and arranged substantially as and for the purposes specified and as illustrated in the accompanying drawings. 3rd. Appliances for raising water from mines and elsewhere by means of compressed air in which the supply of compressed air is led into a delivery pipe below the point of entrance of the water substantially as and for the purpose specified and as illustrated in the accompanying drawings. 4th. In appliances for raising water from mines or elsewhere by means of compressed air a delivery pipe, such as D, connected near its lower end with the dam, tank or other receptacle containing the water to be raised, through the medium of a pipe fitted with a check, retention, or back-pressure valve, such as G, in combination with a compressed air supply pipe leading into said delivery pipe below the point of entrance of the water, said compressed air supply pipe being also fitted with a check, retention, or back-pressure valve, substantially as and for the purpose specified and as illustrated in the accompanying drawings.

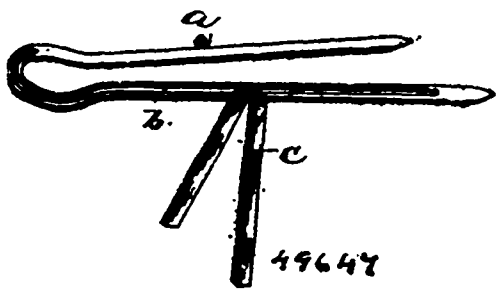
No. 49,646. Apparatus for Consuming Smoke and Combustible Gases. (*Appareil pour consommer la fumée et le gaz combustible.*)



Louis Hallbauer, Meriden, Connecticut, U.S.A., 10th August, 1895; 6 years.

Claim.—1st. The combination with a steam boiler, original combustion chamber, and flues for supplying draft to same, of an auxiliary combustion chamber, connected through said flues with the original combustion chamber, a device for admitting air to said auxiliary chamber, and shorter flues connecting said chambers, substantially as described and for the purpose specified. 2nd. The combination with a steam boiler, having the flues T and D, and the original combustion chamber A, of the auxiliary combustion chamber C, adapted to receive the smoke and gases from chamber A, after the same have passed into the flues T, and before the same have entered flues D, a device for admission of air to chamber C, to support combustion therein, and a device for igniting in said chamber C said smoke and combustible gases, all substantially as set forth, and for the purposes specified. 3rd. The combination with a steam boiler, having the flues T, a feed water heating device B, and an original combustion chamber A, of the auxiliary combustion chamber C, adapted to receive smoke and combustible gases from chamber A, after the same have entered flues T, and in which the feed water heater is located, and a device for igniting, in said chamber C, said smoke and combustible gases, substantially as described and for the purposes specified.

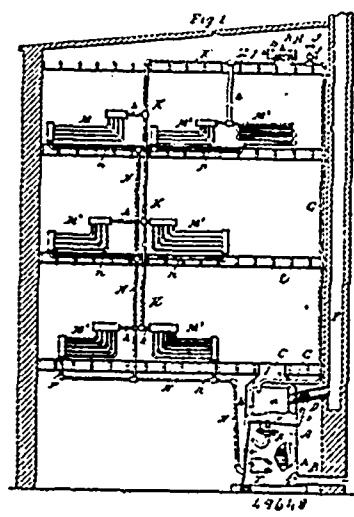
No. 49,647. Hat Securer. (*Appareil pour assujétir les chapeaux.*)



Herman Astrich, Harrisburg, Pennsylvania, U.S.A., 10th August, 1895; 6 years.

Claim.—A hat securer consisting of a U-shaped pin adapted to be inserted in the wearer's hat, and having formed therein a slot extending from the end of one arm to and through the bend of the pin, and an elastic strap passed through the slot and adapted to have its ends secured to the hat, substantially as described.

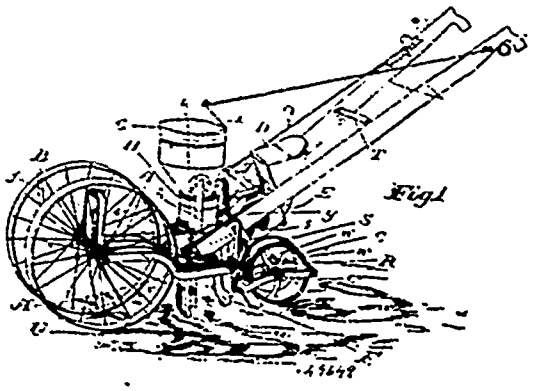
No. 49,648. System of Heating Buildings. (*Système de chauffage des édifices.*)



John D. McEacren, Galt, Ontario, Canada, 10th August, 1895; 6 years.

Claim.—1st. The herein described system of hot water heating which consists in conveying by suitable means, all the hot water from a heater upwards to a tank located at a high point above all the radiators, thence distributing the same to the several radiators in the building, substantially as set forth. 2nd. In a pressure system of hot water, the combination with the heater of the pressure regulator R, acting on the lever r, chains r and s, and check damper t, and damper door T, whereby the said damper T, may be closed and the said check damper t opened, substantially as set forth. 3rd. In a hot water system for heating buildings, the combination with a heater of a main supply pipe or pipes passing up to a closed expansion tank located above the radiators to be supplied, a safety valve and air cock on said expansion tank, a main supply pipe or pipes passing down from the said expansion tank and supplying the several radiators by means of branch supply pipes, branch return pipes connected with a main return pipe, taking the water from the said radiators and a main return pipe, connected to the heater and completing the flow to and from the boiler, substantially as set forth.

No. 49,649. Seeding, Cultivating and Fertilizing Machine. (*Machine pour engraiser et cultiver.*)

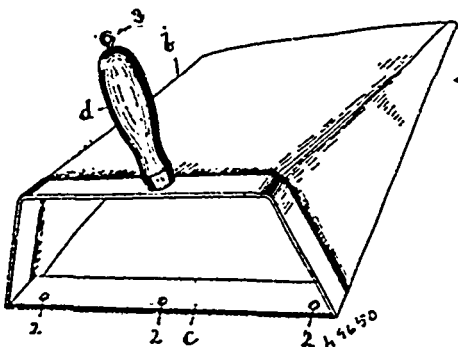


Elisha S. Keeler, Topeka, Kansas, U.S.A., 10th August, 1895; 6 years.

Claim.—1st. In a machine of the class specified, the combination of a hopper D, attached to a seed chamber E, a feeding-wheel J, and a planting tooth F, pivotally hung together, a slot p, and thumb-screw P, substantially as described and for the purpose specified. 2nd. In a machine of the class described, the combination of a hopper D, attached to a seed chamber E, a feeding-wheel J, and a

planting tooth F, pivotally hung together, with a rod G, a slot p, and thumb screw P, substantially as described and for the purpose specified. 3rd. In a machine of the class specified, the combination of supplemental frames R R, pivotally hung to a main frame A, hoes Q, Q', handles I I, hung to the main frame A, by pivots y y, parallel with said handles, and rods S S pivoted to said handles and said supplemental frames, substantially as described and for the purpose specified. 4th. In a machine of the class specified, the combination of a reservoir G, a loose bottom g', attached to an elbow z, pivoted to the side of the reservoir, and a rod or wire V, substantially as described and for the purpose specified. 5th. In a machine of the class specified, the combination of the rotatable fertilizer, hopper H, the plates W, X and Y, the cut-off i, the slotted lips S and m, thumb-screws 7 and 9, the pivoted valves e, the pivot f, stops j, the springs p', and the valve opener k, substantially as described and for the purpose specified. 6th. In a machine of the class specified, the combination of the rotatable hopper H, the perforated plates W, X and Y, the lip a, at perforation e', the lip l', at perforations l l, the cut-off i, radiating arms h, the slotted lips S and m, thumb-screws 7 and 9, valves e, pivot f, stops j, springs p', and valve opener k, substantially as described and for the purpose specified. 7th. In a machine of the class specified, the combination of a fertilizing tooth U, pivoted valves t t, and cranks r r, adapted to rest in indentations in the outside of the rear wall of the tooth, substantially as described and for the purpose specified. 8th. In a machine of the class specified, the combination of a fertilizing tooth U, pivoted valves t t, cranks r r, adapted to rest in indentations in the outside of the rear wall of the tooth, and furrow openers w, substantially as described and for the purpose specified. 9th. In a machine of the class specified, the combination of a frame A, supporting-wheels B, a drive-wheel C, frame c', a seed hopper D, seed chamber E, feeding-wheel J, planting tooth F, pivot L, thumb-screw P, and slot p, rod O, supplemental frames R R, hoes Q Q, handles I I, hung to the main frame by pivots y y, parallel with said handles, cross-piece T, rod S S, pivoted to said handles and to said supplemental frames, hoes Z, a reservoir G, having a movable bottom g', attached to the elbow z, rod or wire V, a rotatable fertilizer hopper H, geared by sprocket-wheels and sprocket chains to said drive-wheel, plates W, X and Y, slotted lips S and m, thumb-screws 7 and 9, lip a', lip l', stops j, a cut-off i, radiating arms L, valves e e, c', springs s s s, a pivot f, a valve opener k, and a fertilizing tooth U, containing valves t t, and bearing cranks r r, and furrow openers w, substantially as described and for the purpose specified.

No. 49,650. Dust Pan. (Porte-ordure.)



William Smith Bowie, Boston, Massachusetts, U.S.A., 12th August, 1895; 6 years.

Claim.—The substantially rectangular frame a consisting of a flat metallic strip, bent to shape, the flexible bag b, the edge of which turns over and incloses the top and sides of said frame, and overlies the top of the lower horizontal part thereof, the strip c having a bevelled upper face and an abrupt inner edge secured to the lower horizontal part of the frame, being placed upon and thereby holding securely the lower front edge of the bag, the front edge of said strip terminating back of the front edge of the frame, that the latter may serve as a thin edge in advance of the strip, and the handle d, secured to the said metallic frame, substantially as described.

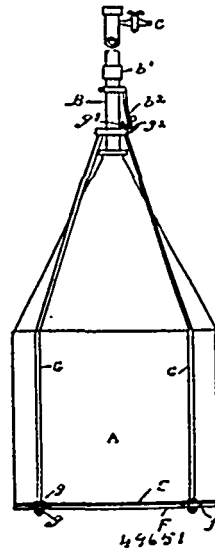
No. 49,651. Well Cleaning Device.

(Appareil pour nettoyer les puits.)

George W. Lee, Detroit, Michigan, U.S.A., 12th August, 1895; 6 years.

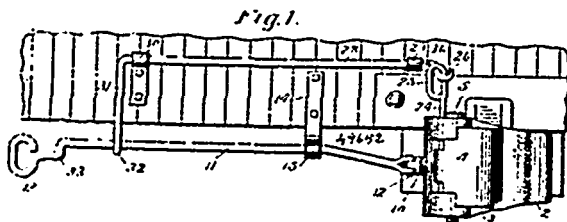
Claim.—1st. In a well cleaning device, the combination, with a receptacle having an open lower end and a conical upper end, an air pipe passing through the top of the receptacle and opening inside the same, an air cock secured to the top of the air pipe, a bottom plate provided with a valve and with lateral lugs, and a series of supporting rods passing through the lugs, a series of nuts on the

ends of the supporting rods, a collar movable on the air pipe and connected to the supporting rods, a spring arranged to hold the



collar, and a packing ring between the bottom plate and the lower end of the receptacle, substantially as described. 2nd. In a well cleaning device, the combination with a receptacle having an open lower end, and an air pipe supported within and extending through the upper end of the receptacle and having an air cock arranged therein, of a valved bottom plate, a collar fitted loosely on the air pipe above the receptacle and provided with a tooth or catch, rods connecting said collar and the bottom plate, and a leaf spring attached to the air pipe, above the collar thereon, and adapted to engage the tooth or catch on said collar, substantially as and for the purpose described.

No. 49,652. Car-Coupling. (Attelage de chars.)



Patrick McEntee, Montgomery, Minnesota, U.S.A., 12th August, 1895; 6 years.

Claim.—1st. In a car-coupling, a slotted draw-head, a pivoted jaw having a shank, a key for holding the jaw alternately in locking and unlocking positions, in combination with a lever connected to the jaw-shank and a second lever co-operating therewith and having connection with the key, for manually releasing the key and permitting its automatic re-engagement, substantially as set forth. 2nd. In a car-coupling, a draw-head, a pivoted jaw, and a gravitating key for locking the latter in either open or closed position, in combination with levers connected together and attached respectively to an extension of the jaw shank and to the head of the key, substantially as and for the purpose set forth. 3rd. In a car-coupling, the combination, with a draw head and a pivoted jaw therein, of a gravitating key for locking the jaw when in closed position and having a bevelled front portion for engaging a bevelled surface on the jaw shank to hold the jaw in open position until it is operated manually or by impact, substantially as set forth. 4th. In a car-coupling, the combination, with a suitably slotted draw head and a jaw pivoted therein, a gravitating key having its rear portion curved inward and a bevelled portion at its front and arranged in a slot in the draw-head for engaging the shank of the jaw to hold it when in open position, substantially as set forth.

No. 49,653. Calèche Top. (Dessus de Calèche)

Daniel Conboy, Toronto, Ontario, Canada, 12th August, 1895; 6 years.

Claim.—1st. In a calèche top, the back bow, in combination with a spring roller journaled on the said bow near its upper end, a back curtain connected to the said roller, and a series of knobs on the back of the seat to engage with eyelets along the lower edge of the back curtain, substantially as and for the purpose specified. 2nd.

In a caleche top, the back bow, in combination with a back valance connected to or forming part of the top and side quarters, and a

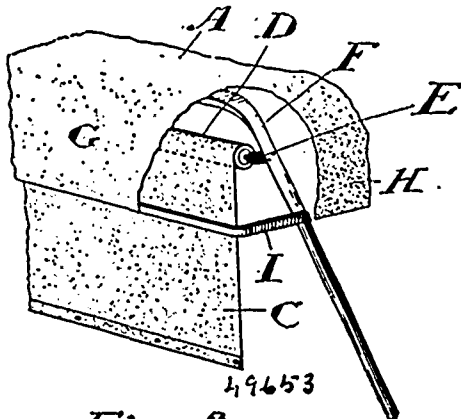
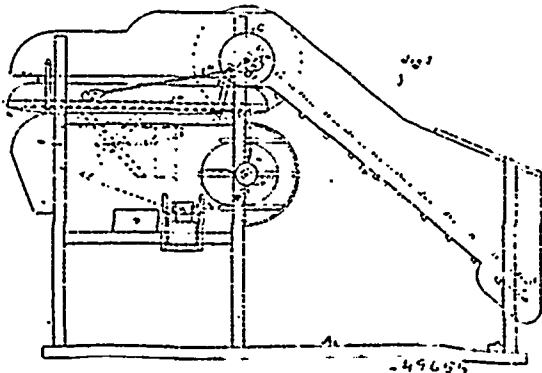


Fig. 2

light metal bar connected at each end to the back bow and fastened along its length to the lower edge of the back valance, substantially as and for the purpose specified. 3rd. In a caleche top, the combination of the back bow F, the lugs E, the spring roller D, the back curtain C, the knobs J, adapted to engage with eyelets in the bottom of the curtain, the light metal bar I, and the back valance G, substantially as and for the purpose specified. 4th. In a caleche top, a side rail double-flanged or having a foot formed on it extending on each side of the rail, in combination with a seat iron to which the said foot is bolted, substantially as and for the purpose specified. In a caleche top, the combination of the back bow F, the lugs E, the spring roller D, the back curtain C, the knobs J, adapted to engage with eyelets in the bottom of the curtain, the light metal bar I, the back valance G, side rail B, foot K, and seat iron L, substantially as and for the purpose specified.

No. 49,654. Shaking and Cleaning Attachment for Threshing Machines. (*Appareil de raffutage et nettoyage pour machine à battre.*)



James Pickering Clinton, Queens, and Albert Pickering, St. Eleanor, Prince, both in Prince Edward Island, 12th August, 1895; 6 years.

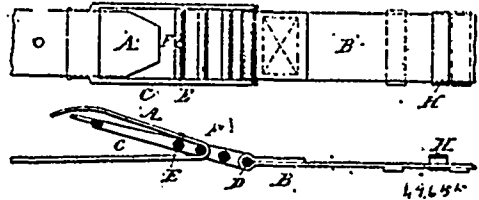
Claim. 1st. The combination of pulley F, (on shaft A with crank) with connecting rod H, to shaker J, for the purpose herebefore set forth. 2nd. The combination with shaft A, through roller E, and shaft C, of pulley G, and plate M, and pin with connecting rod H, to shaker J, also belt direct from pulley G, to pulley P, of fanners for the purpose herebefore set forth.

No. 49,655. Strap Fastener. (*Attache de courroie.*)

Frank Ledlie Moore, Chatham, New Jersey, U.S.A., 12th August, 1895; 6 years.

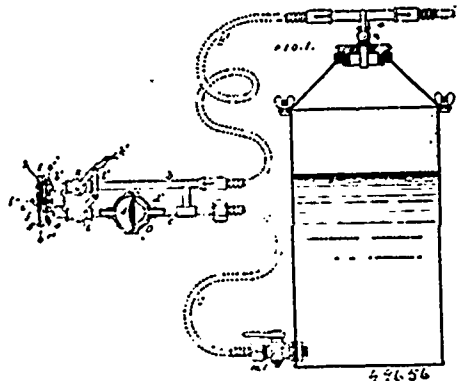
Claim.—1st. The combination, with a strap, of a lever pivoted at one end thereto, a strap buckle attached to a medial point of the lever, and a fastening device for the free end of the lever on the strap, substantially as herebefore set forth. 2nd. The combination, with a strap, of a lever pivoted at one end thereto, means for attaching the strap to a medial point of the lever, and a keeper on the strap in which to tuck the loose end thereof and to fasten the

free end of the lever, substantially as herebefore set forth. 3rd. The combination, with a strap, of a lever pivoted at one end thereto,



means for attaching the strap to a medial point of the lever, and a keeper sliding loosely on the strap to slip over and confine the free end of the lever, substantially as herebefore set forth.

No. 49,656. Means of Applying Paints and Varnishes. (*Moyen d'appliquer la peinture et le vernis.*)



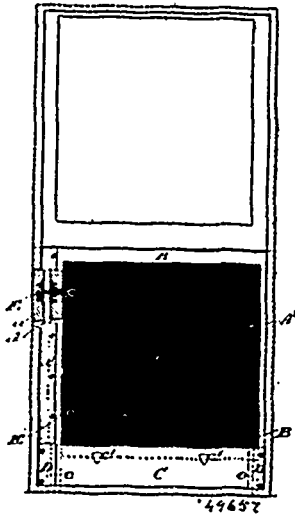
Howard Crundel Cleaver, London, England, 12th August, 1895; 6 years.

Claim.—1st. Apparatus for spraying paint or varnish, consisting in the combination of a closed paint container, a pump or air compressor connected with the paint container, an atomizer or spraying nozzle connected by flexible pipes with the air compressor and paint container, and a strainer interposed between the paint container and the atomizer, substantially as specified. 2nd. The means or apparatus for spraying oil paints and varnishes, consisting of a closed paint container connected at top with a supply of compressed air and having at bottom a paint outlet pipe which terminates in a channel leading in a direction normal to the direction of the blast into a spraying nozzle formed by an orifice connected by a pipe with the supply of compressed air, and which orifice is gradually contracted to the form of a narrow slit, substantially as specified. 3rd. The means or apparatus for spraying oil paints and varnishes, consisting of a closed paint container connected at top with a continuous supply of compressed air, and having a flexible paint outlet pipe provided with a strainer and terminating in a channel leading in a direction normal to the blast into the orifice of a spraying nozzle connected by a flexible pipe with the same compressed air supply, the orifice of the said spraying nozzle being gradually brought to the form of a narrow slit of A form, substantially as specified. 4th. An atomizer nozzle for spraying paints or varnishes, formed of a blast orifice gradually contracted to the form of a narrow A shaped slit, and a paint channel leading normally into the said orifice, substantially as specified. 5th. An atomizer nozzle for paints and varnishes, formed of a plate or body portion c having through orifices adapted to connect with blast and paint pipes respectively, a groove or channel f connecting the orifices, an adjustable plate g covering and enclosing the groove provided with a A shaped tongue g', having its A edges bevelled on the inner face and received in a corresponding recess in the part c of the plate, the plate g being capable of adjustment in the direction of, and for the purpose of varying, the width of the A shaped slit into which the orifice h gradually merges, substantially as specified. 6th. The combination with the atomizer constructed with a blast orifice gradually contracted to the form of a narrow A shaped slit, and a paint channel leading normally into the said orifice, of blast and paint pipes b, c, braced together so as to preserve their relative position and serve as a handle for the atomizer, the pipes being provided with stop cocks and respectively connected by flexible pipes to the blast supply and to the paint container, substantially as specified.

No. 49,657. Window Screen. (*Store de fenetre.*)

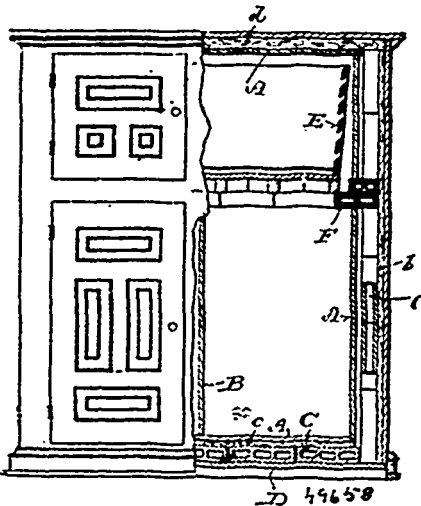
Charles Cook Wheeler, Holland, Michigan, U.S.A., 12th August, 1895; 6 years.

Claim.—1st. A window screen, having its side rails projected beyond the cross piece at one of its ends for purposes of fitting the



screen to different spaces and movable means for opening and closing the space between the cross piece, the projected side rails and the part on which the side rails rest, substantially as set forth. 2nd. The window screen, comprising side rails and cross pieces, the side rails being projected beyond the cross piece at one end of the screen and a sliding door engaged with the screen frame at said projected ends of the side rails for opening and closing the space between said cross piece, extended side rails and the part on which they rest, substantially as set forth. 3rd. The screen, comprising the frame to which the screen cloth is secured, the side rails of said frame being projected beyond the cross piece at one end of the frame, a movable side rail section, means for forcing it and holding it in the desired position relatively to the stationary side frame and a sliding door for opening and closing the space between the projected ends of the side rails, the cross piece and the part on which the side rails rest, substantially as set forth.

No. 49,658. Refrigerator. (Réfrigérateur.)



Edward Alphonse Cornillie, both of Milwaukee, Wisconsin, U.S.A., 12th August, 1895; 6 years.

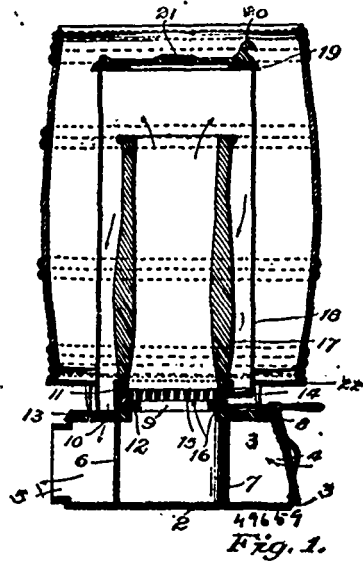
Claim.—A refrigerator having an interior lining of glass walls surrounding the lining and separated therefrom by dead-air-spaces, and an exterior casing surrounding said walls and separated therefrom by a space filled with asbestos, mineral-wool or analogous non-conductive material, substantially as set forth.

No. 49,659. Barrel Heater.

(Appareil pour chauffer les barils.)

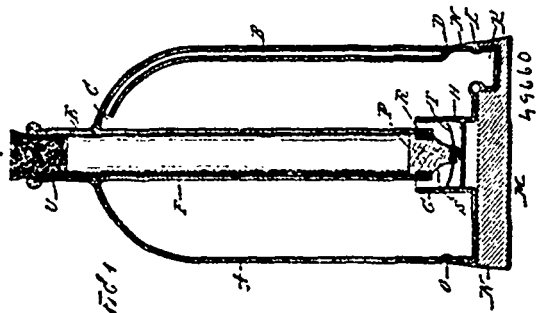
Charles G. Menzel and Julius C. Emmitt, both of Minneapolis, Minnesota, U.S.A., 12th August, 1895; 6 years.

Claim.—1st. The combination, in a barrel heater, of a base, the shell 18 supported thereby, the ring 12, the fire-pot 17 supported by



said ring, the grate 15 arranged within said ring beneath said fire-pot, means for shaking said grate, the flues or openings 13, and the wall of said fire-pot being thicker near the base than at the top thereof, for the purpose set forth. 2nd. In a barrel heater, the combination, of a base, containing the independent ash-pit, the smoke outlet 5, the shell 18 arranged above said base, the ring 11, the flues or openings 13, the fire-pot 17, the grate 15 beneath the same, the casting 19 for closing the top of said shell, and said casting being provided with the openings 21, for the purpose set forth. 3rd. In a barrel heater, the combination, of the base containing the independent ash-pit, the smoke outlet casting 5, the ring 11 arranged over a central opening in the top of said base, the parts 10 supporting said ring, the ring 12 having an upwardly turned flange and arranged within said ring 11, the grate 15, the fire-pot supported by said ring 12, the flues or openings 13, the shell 18, and a cover for closing the top of the same, substantially as described. 4th. The combination, in a barrel heater, of the base, the fixed ring 11 surrounding an opening provided in the top of said base, the shell 18, the movable ring 12, the grate 20, means for shaking the same, the openings 13, between said ring 11 and said shell, the fire-pot 17, and a barrel rest 22 provided outside of said shell, substantially as described. 5th. The combination, in a barrel heater, of a polygonal base, comprising the bottom 2, and the side walls 3, provided with the front and rear openings, the smoke outlet casting 5, the casting 8, the shell 18, the ring 12, the fire-pot 17 supported by said ring, the grate 20, arranged within said ring 12 beneath said fire-pot, the flues or openings 13, and the barrel rest 22 supported by said base substantially as described.

No. 49,660. Bottle. (Bouteille.)

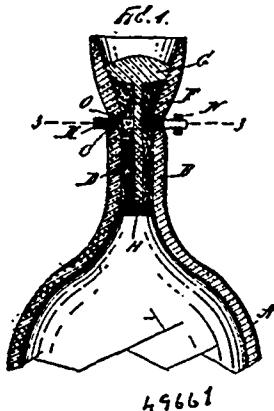


Thomas Williams Richards, Brooklyn, New York, U.S.A., 12th August, 1895; 6 years.

Claim.—1st. A bottle having an air tube in one side thereof, one end of which opens into the bottle at or near the neck, and the other end of which opens outside, at or near the bottom, said bottle being also provided with a neck and a central tube, which forms a continuation of said neck, and extends to near the bottom of the bottle, and with means for closing the lower end of said tube, substantially as shown and described. 2nd. A bottle having an air tube in one

side thereof, one end of which opens into the bottle at or near the neck, and the other end of which opens outside, at or near the bottom, said bottle being also provided with a neck and a central tube, which forms a continuation of said neck, and extends to near the bottom of the bottle and with means for closing the lower end of said tube, the bottom of said bottle being also provided with an outwardly directed tubular extension, the outer end of which is closed, and which is adapted to be broken away when it is desired to open the bottle, substantially as shown and described. 3rd. A bottle having an air tube in one side thereof, one end of which opens into the bottle at or near the neck, and the other end of which opens outside, at or near the bottom, said bottle being also provided with a neck and a central tube, which forms a continuation of said neck, and extends to near the bottom of the bottle, and with means for closing the lower end of said tube, the bottom of said bottle being also provided with an outwardly directed tubular extension, the outer end of which is closed, and which is adapted to be broken away when it is desired to open the bottle, the bottom of said bottle being also provided centrally thereof, with an inwardly directed tube or tubular extension which is adapted to inclose the lower end of the central tube, substantially as shown and described. 4th. A bottle provided at one side thereof with a tube, one end of which opens inside thereof at or near the neck of the bottle, and the other end of which opens outwardly near the bottom of the bottle, said bottle being also provided with a neck having a tubular extension which extends downwardly through the bottle to near the bottom thereof, and a plug or stopper designed to close the lower end of said tubular extension, said plug or stopper being provided with an extension through which is passed, a spring whereby when the stopper is inserted through the tube, and reaches the lower end thereof, the ends of the spring will fly out and prevent the removal of the stopper, substantially as shown and described. 5th. A bottle provided with a central tube, which forms a continuation of the neck and extends downwardly through the bottle to near the bottom thereof, a plug or stopper adapted to be inserted through said neck and to close the lower end of the tube, and provided with a means to prevent the removal thereof, and said bottle being also provided with means for admitting air thereto, and allowing its discharge therefrom, substantially as shown and described. 6th. A bottle provided with a central tube, which forms a continuation of the neck and extends downwardly through the bottle, to near the bottom thereof, a plug or stopper adapted to be inserted through said neck and to close the lower end of the tube, and provided with means to prevent the removal thereof, and said bottle being also provided with means for admitting air thereto, and allowing its discharge therefrom, the bottom of said bottle being also provided with a tubular extension closed at its outer end and adapted to be broken away when it is desired to empty the bottle and said bottle being also provided with a base piece, having a tubular cavity or recess therein, adapted to receive said tubular extension, substantially as shown and described.

No. 49,661. Bottle. (Bouteille.)



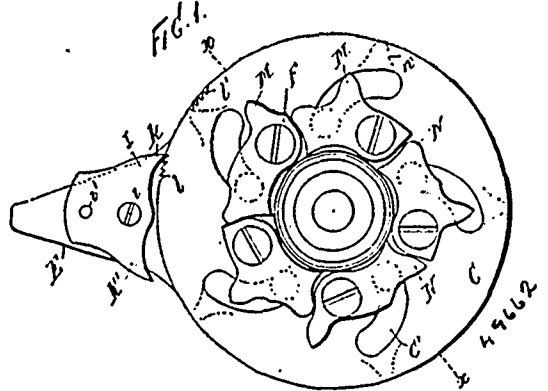
Ernst Leonard Forsgren, New York, State of New York, U.S.A., 12th August, 1895; 6 years.

Claim.—1st. A bottle, provided with a neck having an annular groove therein, a revoluble ring mounted in said groove, and a glass cutter connected with said ring and adapted to bear upon the neck of the bottle, substantially as shown and described. 2nd. A bottle, provided with a neck having an annular groove therein, a revoluble ring mounted in said groove, and a glass cutter connected with said ring and adapted to bear upon the neck of the bottle, said neck being also provided with a corresponding annular groove in its walls, substantially as shown and described. 3rd. A bottle, the neck of which is provided with a non-removable stopper and an annular groove in its outer walls, in which is placed a revoluble ring, with which is connected a glass cutter adapted to bear upon the walls of the neck, or the inner wall of the groove, whereby the nozzle of the bottle may be cut-off, substantially as shown and described. 4th.

A bottle, the neck of which is provided with a non-removable stopper and an annular groove in the outer walls thereof whereby the nozzle of the bottle may be broken away and the stopper removed, substantially as shown and described.

No. 49,662. Expansible Sprocket-Wheel.

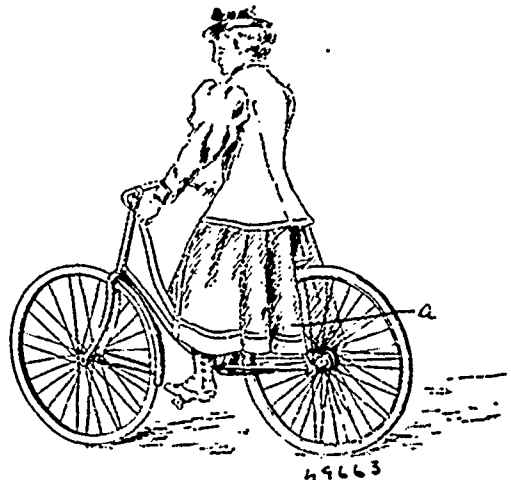
(Roue dentée expansible.)



William Augustus Leggo, jr., Hartsdale, New York, U.S.A., 12th August, 1895; 6 years.

Claim. 1st. The combination in a sprocket wheel, of pivoted arms, and two sets of projections upon the arms to engage the driving chain, with means for swinging the arms to change the operative diameter of the sprocket wheel, substantially as shown and described. 2nd. The combination in a sprocket-wheel, of a circular range of pivoted arms, each having two projections in line with each other in the plane of the revolution of the wheel, adapted for use at different effective diameters, with a movable disc and connections between the disc and the arms, whereby the arms may be swung to increase or lessen the effective diameter of the sprocket-wheel, and means for securing the arms in either of the effective positions, substantially as shown and described. 3rd. The combination in a sprocket-wheel, of a hub, a disc rigidly attached thereto, arms pivotally connected with the hub, two sets of chain teeth on the arms, lateral projections on the arms extended through the disc and limited in their movement, thereby, a second disc revoluble around the axis of the wheel, provided with cam slots acting on the lateral projections of the pivoted arms, approximately concentric portions at the ends of the cam slots, a handle or lever on the revoluble disc and a pawl or pawls on the handle, substantially as shown and described. 4th. The combination with a sprocket-wheel, of an axle adjustment consisting of an axle box sliding in its support, and operated by a cam whose pivot slides in a slot at right angles to the movement of the axle box, substantially as shown and described. 5th. The combination with a sprocket-wheel, of a double axle adjustment consisting of an adjustment for the wear of the chain, and a cam adjustment for the change in the diameter of the sprocket-wheel, substantially as shown and described.

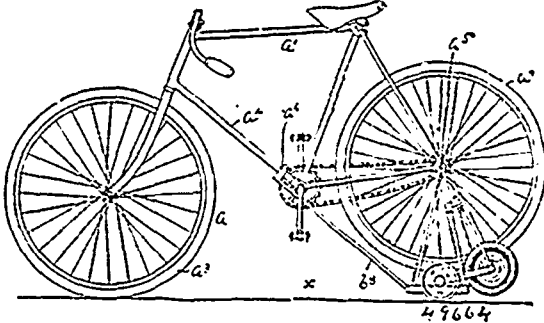
No. 49,663. Bicycle Habit. (Vêtement de bicyclistes.)



Herbert Lucey, Brooklyn, New York, U.S.A., 12th August, 1895; 6 years.

Claim.—1st. A skirt divided at the back, having a waist band and interior partitions forming leg portions which have vertically disposed folds at their rear portions, such folds being secured at their upper ends to the waist band and falling in loose folds therefrom on opposite sides of the centre, substantially as set forth. 2nd. A skirt divided at the back with a waist band, a crotch and the interior partitions, the latter having their portions in rear of the crotch and at opposite sides of the centre of the back of the skirt formed in folds such folds being fixed at their upper ends to the waist band and falling loosely therefrom down past and below the crotch, all substantially as set forth. 3rd. A skirt, comprising a body portion, a crotch, leg portions and a fly at the upper ends of the front of the body above the crotch, the front breadth of the skirt forming a flap having one edge secured at a point to one side of the fly and fastenings by which the opposite edge of the flap may be secured upon the other side of the fly, all substantially as and for the purpose set forth.

No. 49,664. Training Appliance for Bicycles.
(Appareil pour bicycles.)



John Hutson, Brighton, Sussex Co., England, 12th August, 1895; 6 years.

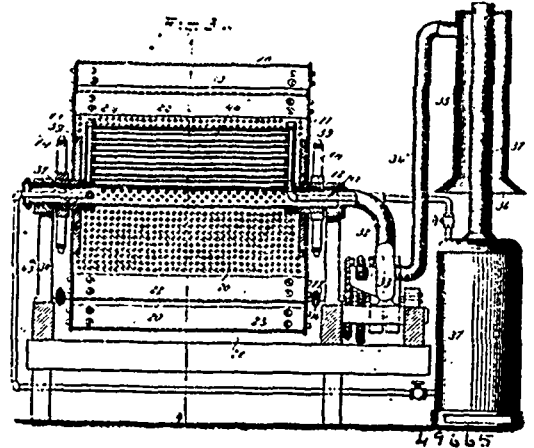
Claim.—1st. A training appliance comprising in its construction a suitable framework, adapted for adjustment to the rear hub of a bicycle, a shaft mounted upon said framework and provided with rollers, a rotary member connected with said framework, and adapted to be driven by the wheel of said bicycle, and speed reducing means between said rotary member and said shaft, substantially as and for the purpose set forth. 2nd. A cycle having its driven axle supported in a roller-provided frame or carriage, and connected to the axle of said roller-provided frame or carriage by speed reducing gear substantially as and for the purpose set forth. 3rd. In a training appliance, in combination, a shaft provided with rollers, standards connected to said shaft and adapted for connection with the rear axle of a bicycle, a rotary member connected to said shaft, adapted to be driven by some movable part of said bicycle, and speed reducing means between said member and said shaft, substantially as and for the purpose set forth. 4th. In a training appliance, in combination, a frame or carriage adapted to support the rear end of a bicycle, a roller-provided shaft mounted in said framework, arms loosely mounted at one end of their ends upon said shaft, a shaft *f*¹, mounted in the free ends of said arms, means for adjusting the free ends of said arms, a rotary member carried by said shaft *f*¹, and adapted to be driven by some movable part of a bicycle, and speed reducing means including a worm gear, between said shaft *f*¹, and said first mentioned shaft, substantially as and for the purpose set forth.

No. 49,665. Drier. (Stéchoir.)

Emilio Cabero Y. Echeandia, Las Marias, Puerto-Rico, West India Island, 13th August, 1895; 6 years.

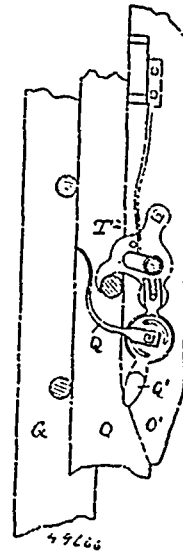
Claim.—1st. A drier, comprising a revoluble cylinder having closed ends, a series of communicating circumferential compartments with perforated outer and inner walls, and a heater arranged within the cylinder, substantially as described. 2nd. A drier, comprising a revoluble cylinder having closed ends, a series of communicating circumferential compartments with perforated inner and outer walls, openings for the admission and discharge of the material arranged in the outer wall of each compartment, a longitudinally sliding door for each compartment, provided with openings adapted to register with the openings in the outer wall of the cylinder, and a steam heater arranged within the cylinder, substantially as described. 3rd. The combination with the cylinder having a series of communicating circumferential drying compartments with perforated inner and outer walls, and a central chamber for the heating apparatus, of the perforated hot air pipe extending through the central chamber, means for supplying hot air to the pipe, the framework supported on the hot air pipe, the steam heater on the framework, a steam supply pipe connecting one end of the heater with a boiler, and a return pipe leading from the other end of the heater to the boiler, substantially as described. 4th. The combination with the revoluble drying cylinder having a central chamber for the heating apparatus, of the perforated hot air pipe extending through the

central chamber, the boiler, the deflector and funnel arranged above the boiler, and a blower connected with the said funnel and with



the perforated hot air pipe, and arranged to exhaust the hot air from the funnel and discharge it into the perforated pipe, substantially as described. 5th. The combination with the drying cylinder having a central chamber for the heating apparatus, of a perforated hot air pipe extending centrally through the said chamber, a boiler, a deflector and funnel arranged above the boiler, a blower arranged to exhaust the hot air from the funnel and discharge it into the perforated hot air pipe, and a steam heater located above the hot air pipe and connected to one end with a steam supply pipe leading from the boiler and at the other end with a return pipe leading to the boiler, substantially as described. 6th. A drier, comprising a revoluble cylinder having closed ends, a series of communicating circumferential compartments having an inner wall perforated in its entire extent, and an outer wall perforated on horizontal strips only, and a heater within the cylinder, substantially as described. 7th. A drier, comprising a revoluble drying cylinder having a central chamber for the heating apparatus, a perforated hot air pipe extending through said chamber, stationary hollow heads located in the said chamber and adapted for connection with a boiler, and a cluster of pipes connecting said heads, substantially as described.

No. 49,666. Ladder. (Echelle.)

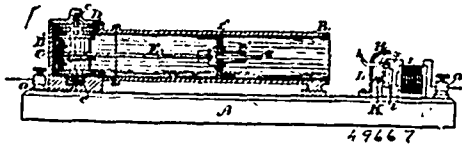


Thomas J. Quinn, assignee of Mark A. Walker, both of Detroit, Michigan, U.S.A., 14th August, 1895; 6 years.

Claim.—1st. In an extension ladder, a locking mechanism comprising a series of detents on one ladder section, a latch dog on another ladder section, adapted to engage with said detents to hold said ladder extended, a rock arm on said second section adapted to be rocked at each detent, in one direction when the ladder is extended and in the opposite direction when the ladder is contracted, and connection between said rock arm and latch dog, whereby the latter is released from the detent by the rocking of said rock arm in the last mentioned direction, substantially as described. 2nd. In

an extension ladder, a locking mechanism, comprising a series of detents on one ladder section, one detent at each round, a latch dog on another ladder section adapted to engage with said detents to hold the ladder extended, a rock arm on said second section projecting into the path of the rounds of the first section and adapted to be rocked thereby in one direction when the ladder is extended and the opposite direction when the ladder is contracted, a gravity arm for returning said rock arm to its normal position, and connection between said rock arm and latch dog whereby the latter is released from the detent by the rocking of said arm in the last mentioned direction, substantially as described. 3rd. In an extension ladder, a ladder section comprising the side bars O¹, the rounds O² detachably secured to the side bars by the bushing or sockets O³, and the cross bolts O⁴, securing the side bars together, substantially as described. 4th. In an extension ladder, a raising and lowering device, comprising the shaft J¹ journaled upon the lower ladder, the sleeve J² thereon, the crank J³ adapted to be engaged with either the sleeve or the shaft, a drive connection between the shaft and mechanism for raising the lower ladder, and drive connection between the sleeve and drum for elevating the extension ladder, substantially as described. 5th. In a fire ladder, the combination of the ladder, the turntable, of frames on opposite sides thereof, guide slots in said frames having an inclined and a horizontal section, rack bars beside the guide slots, a transverse shaft on the ladder engaging in said slots, pinions on the shaft engaging said rack bars, and a drive mechanism on the ladder for said pinions, substantially as described. 6th. In a fire ladder, the combination of the turntable, the slotted frames thereon, having their forward ends projecting beyond and at an incline above the table, the ladder having devices engaging said slots and actuating devices to cause the lower end of said ladder to follow the slot, and a frame pivotally connected at one end to the ladder, and at the other end pivoted to the elevated forward ends of the frame on the turntable, substantially as described. 7th. In a fire ladder, the combination with the ladder and actuating devices for the base substantially as described, of the fulcrum frame comprising arched side braces, trussed longitudinally and having transverse connecting braces between, substantially as described.

No. 49,667. Current Interrupter.
(*Interrupteur de courant.*)

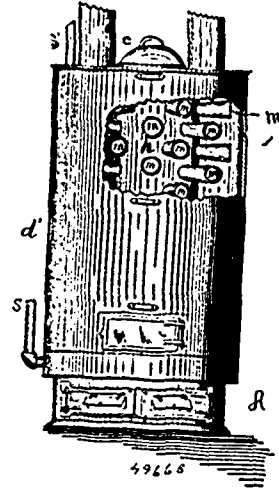


The Canadian General Electric Company, Toronto, Ontario, Canada, assignee of Elihu Thomson, Swampscott, Massachusetts, U.S.A., 14th August, 1895; 6 years.

Claim.—1st. An interrupter for high potential circuits, comprising two separable terminals, an insulating tube, a head sliding in said tube and carrying one of said terminals, and automatic means for quickly moving said head when the terminals are separated, substantially as described. 2nd. An interrupter for high potential circuits, comprising two separable terminals, an insulating tube, a head sliding in said tube and carrying one of said terminals, and a spring actuated drum connected with said head, substantially as set forth. 3rd. An interrupter for high potential circuits, comprising two separate terminals, an insulating tube, a head sliding in said tube and carrying one of said terminals, a spring actuated drum, and a conducting cable wound on said drum and connected with the terminals on the sliding head, substantially as described. 4th. The combination with two separable terminals, of a spring actuated drum connected with one of said terminals, and an electro-magnet adapted to disconnect said terminals, substantially as described. 5th. The combination with a sliding head carrying one terminal, of a hooked lever constituting the other terminal and an electro-magnet for actuating said lever to disconnect the two terminals, substantially as set forth. 6th. The combination with an insulating tube having a chamber at one end, of a spring actuated drum in said chamber, a head sliding in the tube, a flexible conducting cable wound on the drum and connected with said head, a hook carried by said head and electrically connected with said cable, a hooked lever and an electro-magnet adapted to vibrate said lever, substantially as described. 7th. The combination with two separable terminals, of a releasing device for disconnecting them, a spring for quickly separating them, and a device operated by said spring for generating an air blast to extinguish the arc, substantially as described. 8th. The combination with two separable terminals, of a tube, a piston sliding therein and carrying one of said terminals, and having openings adjacent thereto, substantially as set forth. 9th. The combination with two separable terminals, of a tube, a piston sliding therein carrying one of said terminals, and having openings adjacent thereto, and a nozzle surrounding said openings, substantially as described. 10th. The combination with two separable terminals, of a tube, a piston sliding therein carrying one of said terminals and having openings adjacent thereto, and means for permitting the air to escape until the piston has gathered headway, substantially as set forth. 11th. The combination with two separable

ble terminals, of a tube, a piston sliding therein, carrying one of said terminals, and having openings adjacent thereto, and a spring drum connected with said piston, substantially as described.

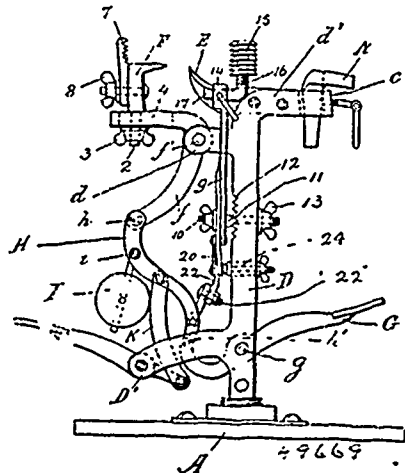
No. 49,668. Hot Water Heating Apparatus.
(*Appareil de chauffage à eau chaude.*)



The Phoenix Hot Water Heater Company, assignee of Smith Northrup Murgitroyd, both of Phoenix, New York, U.S.A., 14th August, 1895; 6 years.

Claim.—1st. A heating apparatus comprising a fire-pot, the walls of which consist of water-chambers, a coal feeding conduit above the fire-pot, an annular main water-chamber around said conduit, tubular connections between the fire-pot water-chambers, auxiliary water-chambers connected to and projecting laterally from said main chamber, in combination with a fire-pot, a combustion chamber and the feed and return pipes of a heating system connected respectively to the main water-chamber and to the fire-pot water-chambers. 2nd. A heating apparatus comprising a fire-pot, the walls of which consist of water-chambers, a coal feeding conduit above the fire-pot, an annular water-chamber around said conduit, tubular connections between said fire-pot water-chambers and the main water-chamber, auxiliary water-chambers connected to and projecting from said main water-chamber and enlarged outwardly, in combination with a fire-pot, a combustion chamber, and the feed and return pipes of a heating system connected respectively to the main water-chamber and to the fire-pot water-chambers.

No. 49,669. Stand Used in Shoeing Animals.
(*Support pour ferrer les chevaux.*)

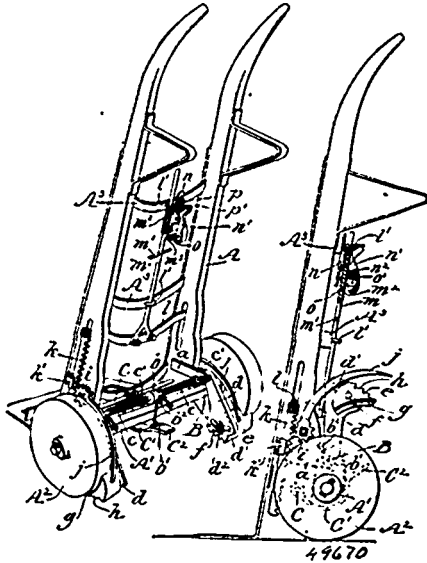


David Menard, St. Paul d'Abbotsford, Quebec, Canada, 14th August, 1895; 6 years.

Claim.—1st. The combination, with the vertical frame, provided with a stationary jaw at its upper part, and a lever pivoted to the frame and provided with a horizontal slot 4 in its upper end, of an

adjustable jaw provided with a shank slidable in the said slot, a support for the heel of the shoe carried by the said frame, and a pivoted foot lever operatively connected with the aforesaid lever, substantially as set forth. 2nd. The combination, with the vertical frame provided with a support for the heel of the shoe at its upper part, of a pivoted lever provided with a serrated toe plate, two crossed arms pivoted to the frame, serrated rollers carried by the said arms, a pivoted foot lever, and intermediate link mechanism operatively connecting the said foot lever with the aforesaid lever and with the crossed arms, substantially as set forth. 3rd. The combination, with the vertical frame, of the vertically-adjustable crossed-arms pivoted thereto and provided with sockets at their upper ends, the shanks slidable in the said sockets and provided with vertical screw-threaded portions, the serrated rollers screwed on the said portions, the links pivoted to the lower ends of the said arms, a foot lever pivoted to the frame, and link mechanism operatively connecting the said foot lever with the said links, substantially as set forth.

No. 49,670. Brake for Trucks. (Frein de camion.)



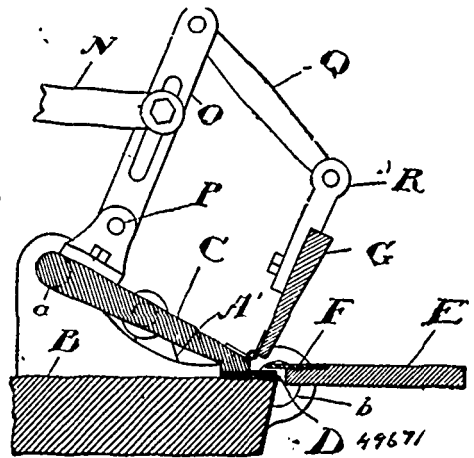
Henry Lisch Hazen, Patchogue, New York, U.S.A., 14th August, 1895; 6 years.

Claim.—1st. A brake attachment for trucks, consisting of one or more shoes as *c*, arranged upon a shaft as *B*, which is journaled near the wheels of the truck, and a pedal on the shaft, said parts being constructed, combined and arranged, substantially as shown and described. 2nd. A brake attachment for trucks, consisting of a shaft as *B*, journaled near the wheels, wings as *d*, at each end of said shaft, having grooves therein, brake shoes as *c*, at either side of the wings, and having studs working in said grooves, a shaft as *C*, mounted adjacent to the shaft *B*, and a pedal connected therewith and with the shaft *B*, said parts being constructed, combined and arranged, substantially as shown and described. 3rd. A brake attachment for trucks, consisting of a shaft as *B*, journaled near the wheels, wings as *d*, at each end of said shaft, having grooves therein, brake shoes as *c*, at either side of the wings, and having studs working in said grooves, a shaft *C*, mounted adjacent to the shaft *B*, and a pedal connected therewith and with the shaft *B*, and said shaft *B* being provided with a spring or springs by which it is operated, substantially as shown and described. 4th. A brake attachment for trucks, consisting of one or more shoes as *c*, supported near the wheels thereof, and adapted to be brought into engagement therewith, a locking attachment as *J*, adapted to clamp the shoes in position, and means for depressing the clamps, said parts being constructed, combined and arranged, substantially as shown and described. 5th. A brake attachment for trucks, consisting of a brake shaft as *B*, journaled near the wheels thereof, and having a projecting lug upon the centre thereof, a spring or springs surrounding said shaft, a pedal shaft as *C*, journaled adjacent to the brake shaft and provided with a pedal which is connected with said lug, brake shoes as *E*, at either end of the brake shaft, clamps journaled upon each side of the truck, a rod adapted to lock the said clamps upon the shoes, said rod being provided with a lug upon the end thereof and a catch above the same, said parts being constructed, combined and arranged, substantially as shown and described.

No. 49,671. Machine for Bending and Trimming Metal Shingles. (Machine pour plier et tailer le bardeau métallique.)

The Metallic Roofing Company of Canada, assignee of Carleton Wescott Conner, both of Montreal, Canada, 14th August, 1895; 6 years.

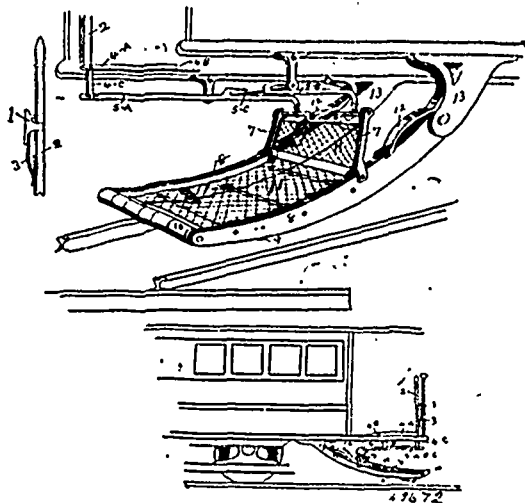
Claim.—1st. In a machine of the class described, a clamp carrying a mandrel and located near the edge of the table of the machine,



and a bending leaf carrying a mandrel and journaled at the same edge of the table, in combination with cams suitably driven and adapted by means of lever and pitman connections to operate the said clamp and bending leaf, substantially as and for the purpose specified. 2nd. In a machine of the class described, a clamp carrying a mandrel and located near the edge of the table of the machine, a bending leaf carrying a mandrel and journaled at the same edge of the table, and a bending leaf hinged to the said clamp above its mandrel, in combination with cams suitably driven and adapted by means of lever and pitman connections to operate the said clamp and bending levers, substantially as and for the purpose specified. 3rd. In a machine of the class described, a clamp carrying a mandrel and located near the edge of a grooved or corrugated table, a bending leaf carrying a mandrel and journaled at the same edge of the table and a bending leaf hinged to the said clamp above its mandrel, in combination with cams suitably driven and adapted by means of lever and pitman connections to operate the said clamp and bending levers, substantially as and for the purpose specified. 4th. In a machine of the class described, the shearing knife *c*¹, carried by the frame *b*¹, sliding in the guides *d*¹, supported on the frame of the machine, in combination with the links *U*¹, pivoted arms *V*¹, eccentric rods *T*¹, eccentrics *S*¹, and shaft *I*, substantially as and for the purpose specified. 5th. In a machine of the class described, the shearing knife *c*¹, carried by the frame *b*¹, sliding in the guides *d*¹, movably supported on the frame of the machine, screw-threaded spindles *f*¹, worm wheels *g*¹, and spindle *f*¹ journaled on the frame of the machine, and false bed *m*¹, in combination with the links *U*¹, pivoted arms *V*¹, eccentric rods *T*¹, eccentrics *S*¹, and shaft *I*, substantially as and for the purpose specified. 6th. In a machine of the class described, a shaft suitably journaled above the table, arms thereon having their lower ends provided with caps of rawhide or other suitable material, and a pinion on the end of the shaft, in combination with a segmental rack engaging with the said pinion and operated from a suitably driven cam, substantially as and for the purpose specified. 7th. In a machine of the class described, a shaft suitably journaled above the table, one or more arms thereon having their lower ends provided with rawhide caps longitudinally movable thereon within pre-determined limits, adjustable springs adapted to normally retain the caps in an extended position, and a pinion on the end of the shaft, in combination with a segmental rack engaging with the said pinion and operated from a suitably driven cam, substantially as and for the purpose specified. 8th. In a machine of the class described, the combination of the following elements:—the shaft *I*¹, suitably journaled above the table, the slotted arms *N*¹, caps *O*¹, pins *P*¹, springs *Q*¹, adjusting nuts *R*¹, pinion *K*¹, segmental rack *J*¹, journaled sleeve *H*¹, and arm *G*¹, adapted to engage with the cam *U*, on the shaft *I*, substantially as and for the purpose specified. 9th. In a machine of the class described, the journaled clamp *C*, the mandrel *D*, the journaled bending leaf *E*, and the mandrel *F*, in combination with the pitman *A*¹, the pivoted lever *V*, adapted to engage with the cam *S*, arm *D*¹, pitman *R*¹, pivoted lever *B*¹, adapted to engage with the cam *T*, and the shaft *I*, carrying and giving motion to the cams *S* and *T*, substantially as and for the purpose specified. 10th. In a machine of the class described, the journaled clamp *C*, the mandrel *D*, the journaled bending leaf *E*, the mandrel *F*, and the hinged bending leaf *G*, in combination with the pitman *A*¹, the pivoted lever *V*, adapted to engage with the cam *S*, arm *D*¹, pitman *R*¹, pivoted lever *B*¹, adapted to engage with the cam *T*, the lug *R*, pivoted link *Q*, pivoted link *O*, pitman *N*, arm *M*, shaft *L*, and the arm *K*, adapted to engage with the cam *J*, on the shaft *I*, substantially as and for the purpose specified. 11th. In a machine of the class described, the journaled clamp *C*, the mandrel *D*, the journaled bending leaf *E*, the mandrel *F*, and the hinged bending leaf *G*, in combination with the pitman *A*¹, the pivoted lever *V*,

adapted to engage with the cam S, arm D', pitman C', pivoted lever B', adapted to engage with the cam T, the lug R, pivoted link O, pitman N, adjustably connected to the link O, arm M, shaft L, and the arm K, adapted to engage with the cam J, on the shaft I, and one or more springs tending to retain the parts in their normal position, substantially as and for the purpose specified.

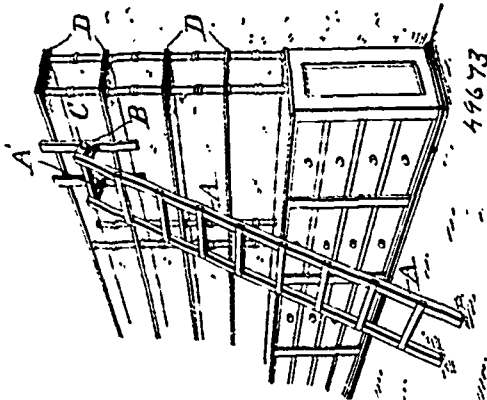
No. 49,672. Car Fender. (Défense de chars.)



John F. Ryan, Toronto, Ontario, Canada, 14th August, 1895; 6 years.

Claim.—1st. The combination, substantially as heretofore set forth, of a platform, a life-guard frame pivotally connected at its rear end to the under side of the platform, a foot lever or pedal for raising the life-guard frame, a link connected to the front end of the pedal, a lever connected to the lower end of the link extending backwardly and connected to the life-guard frame in front of its pivotal connection with the platform, and a hand lever for operating the pedal when it is depressed. 2nd. The combination, substantially as heretofore set forth, of the platform, the hangers or brackets secured to the under side thereof, the side bars of the life-guard frame pivotally connected with the hangers, rollers carried by the side bars and adapted to ride on the rails of the track, a covering for the frame, the vertical frame hinged near the rear or inner ends of the side bars, a pedal, a lever connecting at its front end with the pedal and at its rear end with the vertical frame, and a hand lever or locking the pedal. 3rd. The combination, substantially as heretofore set forth, of the platform, the life-guard frame pivotally connected therewith, rollers carried by the frame, springs bearing upon the life-guard frame for depressing or holding it down, levers for raising the frame from its depressed position, and a hand lever for locking the frame operating mechanism. 4th. The combination, substantially as heretofore set forth, of the platform, the hangers or brackets, the side bars secured thereto, springs secured to the brackets and bearings on the side bars, a foot lever or pedal, levers and rods connecting the pedal with the life-guard frame, and a hand lever for locking the pedal.

No. 49,673. Ladder Attachment. (Attache pour échelle.)

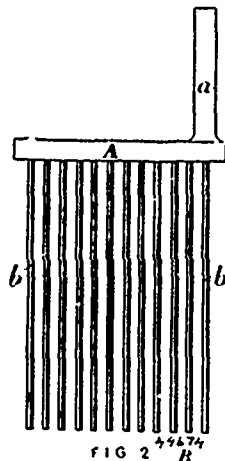


Edward Francis Guste, New Orleans, Louisiana, U.S.A., 14th August, 1895; 6 years.

Claim. 1st. The combination with a ladder, of an H-shaped frame pivoted to the head of said ladder, substantially as and for the purposes described. 2nd. The combination with a ladder A, or a metallic frame A' secured thereto near the upper end thereof, and an H shaped frame B padded along its front edges and pivotally attached to said frame A, substantially as and for the purposes described.

No. 49,674. Secondary Voltaic Battery. (Pile secondaire.)

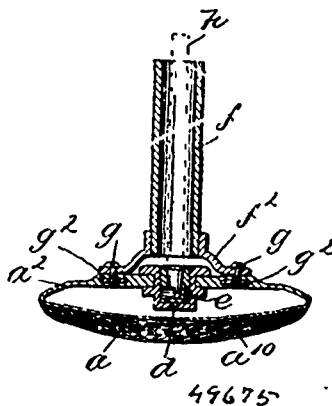
(Pile secondaire.)



William Alfred Baxter, Buckland, Gray's Inn Road, Middlesex, England, 14th August, 1895; 6 years.

Claim. A plate for a secondary voltaic battery, consisting of a conducting frame made with a number of parallel bars on which are strung strips of celluloid or equivalent material, held in position by flattening the portions of bars between the strips, the plate thus prepared being filled in and covered with active material, substantially as described.

No. 49,675. Buffing Machine. (Cousinet de tampon.)

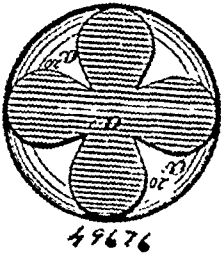


Sidney Wilmot Winslow, Beverly, Massachusetts, U.S.A., 14th August, 1895; 6 years.

Claim.—1st. A pneumatic pad for a buffing machine composed of a hollow flexible walled chamber provided with an air inlet opening and stop valve therefor, combined with a tubular spindle with its inlet opening and valve accessible through the bore of the spindle, substantially as described. 2nd. A pneumatic pad for a buffing machine consisting of a circular chamber having flexible circular upper and under walls connected around their peripheries and an air inlet to said chamber and stop valve therein, whereby it may be inflated and its walls retained distended by pneumatic pressure, substantially as described. 3rd. The combination of a flexible-walled inflated pad with an abrasive cover applied thereto, and a layer of non-conducting material interposed between the working face of the pad cover and pad, substantially as described. 4th. The combination of an actuating spindle and a flexible-walled pneumatic pad detachably connected therewith, with an abrasive cover having a portion extending over the periphery of the pad, and a clamp, for fastening said portion of the pad cover, said spindle being tubular, whereby said pad may be inflated while the pad cover including the same is held by said clamp, substantially as described. 5th.

The combination of an actuating spindle with a pneumatic pad detachably secured thereto, and an abrasive cover for said pad, substantially as described.

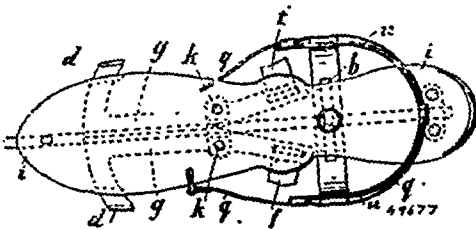
No. 49,676. Buffing Machine. (Coussinet de tampon.)



Andrew Wilson Rogers, Beverly, Massachusetts, U.S.A., 14th August, 1895; 6 years.

Claim.—1st. An abrasive pad cover for a buffing machine pad composed of a working face, and a portion moulded to encircle and overlie the marginal portion of the pad and support the working face thereon, substantially as described. 2nd. A circular pad or supporting foot for a buffing machine, in combination with an abrasive cover having a working face adapted to lie at the under surface of said pad, a portion moulded to encircle the periphery of said pad, and a portion adapted to overlie the top of said pad and support the working face thereon, substantially as described. 3rd. A circular pad or supporting foot of a buffing machine, in combination with an abrasive cover having a working face and a marginal attaching portion moulded to encircle and overlie the marginal portion of the pad and having flexible tongues extending from said moulded marginal portion and adapted to co-operate with a fastening clamp above the foot, substantially as described. 4th. An abrasive cover for a buffing machine pad made from a polygonal blank of abrasive fabric, moulded with its corner portions turned or folded upon a curved crease with relation to the included portion which thus constitutes a circular working face, substantially as described.

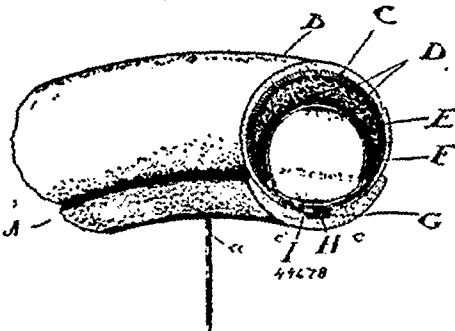
No. 49,677. Skate. (Patin.)



Ernest Pohl, Stralsund, Prussia, Germany, 14th August, 1895; 6 years.

Claim.—On skates, the combined arrangement of clips, turning on pins and gripping the front part of the shoe with their front ends, straps to be drawn together at the rear end and vertical stirrups, to which connecting rods are pivoted and which are secured to the leg by means of a collar and straps, for the purpose set forth.

No. 49,678. Bicycle Tyre. (Bandage de bicyclette.)

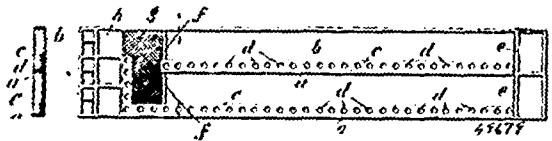


Thomas Monno and Philip Morgan, both of Toronto, Ontario, Canada, 14th August, 1895; 6 years.

Claim.—1st. In a tyre for bicycles or other vehicles, in combination with the outer tube and the inner tube, a band or strip of

carded sponge located between the outer and the inner tube and on the tread of the tyre, substantially as described and for the purpose specified. 2nd. In a tyre for bicycles or other vehicles, in combination with the outer tube and the inner inflatable tube, a band or strip of carded and compressed sponge located between the outer and the inner tubes and on the tread of the tyre and crescent form in section when the tyre is secured in place on the rim, substantially as described and specified. 3rd. In a tyre for bicycles or other vehicles, in combination with the outer tube and the inner inflatable tube, a band or strip of carded sponge located between the outer and the inner tube and on the tread of the tyre, and means for securing the tyre to the rim, substantially as described and specified. 4th. In a device of the class specified, the rim A, provided with recesses G, in combination with the outer tube B, lining C, with overlaps c, c', button holes I, and buttons H, h, substantially as described and for the purpose specified. 5th. In a device of the class specified, the combination of the rim A, provided with recesses G, outer tube B, comprising the lining C, with overlaps c, c', and the covering D, band of compressed sponge F, inner inflatable tube F', button holes I, and buttons H, h, substantially as described and for the purpose specified. 6th. In a tyre for bicycles or other vehicles, a rim and a hollow tyre or tube connected to the said rim, in combination with a filling or carded sponge, substantially as and for the purpose specified.

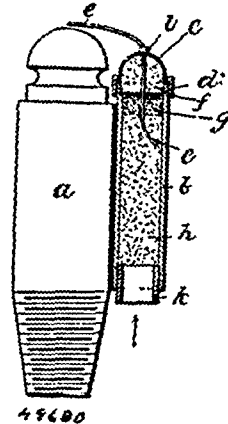
No. 49,679. Sifting Apparatus. (Crible.)



Anton Behringer, Braunschweig, Germany, 14th August, 1895; 6 years.

Claim.—1st. In sifting apparatus provided with flat sieve to which motion is imparted in a closed path, the use for the purpose of causing onward movement of the material being sifted, in the longitudinal channel of the flat sieves, sieve frames or connecting bottoms, or in each such channel when two or more are used, and for keeping the sifting surface or surfaces clean, of one or more bars e formed or each formed with apertures d and arrayed above and parallel to the sifting surface so as to act substantially in the manner hereinbefore described. 2nd. In the sifting apparatus the apertures d in the bars e of different sizes at different points in the length of the bars for the purpose of varying the rate of onward movement of the material being sifted.

No. 49,680. Means for Automatically Lighting Gas. (Moyen d'allumer le gaz automatiquement.)

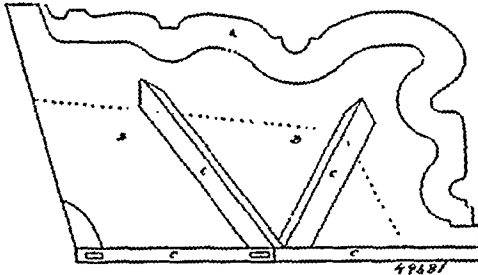


John Frederick Duke, London, England, 16th August, 1895; 6 years.

Claim.—1st. For automatically igniting gas, the use of platinum black together with palladium in a finely divided form, substantially as set forth. 2nd. For automatically igniting gas, the use of platinum black and palladium in a finely divided form incorporated with an incombustible material, substantially as set forth. 3rd. For automatically igniting gas, the combination with a gas burner of a holder containing platinum black and palladium in a finely divided state in such position relatively to said burner that the gas issuing from the burner plays upon said platinum and palladium, and a platinum wire leading from said platinum and palladium to near the outlet of said burner, whereby when the gas begins to play upon platinum and palladium it raises their temperature sufficiently to render said wire incandescent and said wire consequently ignites the

gas, substantially as set forth. 4th. For automatically igniting gas, a holder containing platinum black and palladium in a finely divided state, said holder having a cover formed of platinum wire gauze of very fine mesh, substantially as set forth. 5th. For automatically lighting gas, the combination with a gas burner of a cage containing platinum black and palladium in a finely divided state a platinum wire leading from said platinum and palladium to near the outlet of said burner, and an open tube below said cage to supply a current of atmospheric air to the platinum and palladium, substantially as and for the purpose set forth and shown.

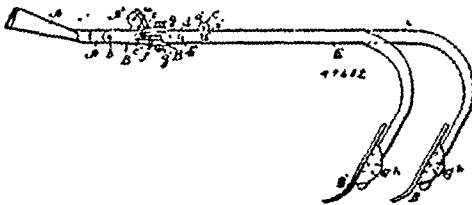
No. 49,681. Cornice Mould Embracing Frame.
(*Cadre pour moules de corniche.*)



Henry Burbidge, Kentville, Nova Scotia, Canada, 16th August, 1895; 6 years.

Claim.—The invention of a new and useful cornice mould embracing frame C, having pieces B and braces E, put together as described and shown for the purpose set forth.

No. 48,682. Plough. (Charrue.)



William Converse Gilmore, Letts, Iowa, U.S.A., 16th August, 1895; 6 years.

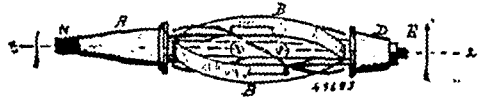
Claim.—1st. A plough comprising a tongue, and a centre or coupling piece connected therewith, to which is pivotally secured a central plough beam which is adjustable thereon, and two side plough beams pivotally connected together and also pivotally connected with the centre or coupling piece whereby they are latterly movable, and means whereby said beams may be locked and vertically adjustable, and shovels upon the ends of said beams, said parts being constructed, combined and arranged, substantially as shown and described. 2nd. A plough comprising a handle A, a joint or coupling B, pivoted thereto, means whereby said coupling may be adjusted in height, a central beam as C, detachably pivoted to the rear end of said coupling and secured thereon in such manner as to be vertically adjustable, side beams as E, having discs upon the ends thereof and pivotally connected together and pivotally connected with the coupling, whereby said beams are latterly movable, devices upon the handle for locking said discs, shovels mounted upon all of said beams, said parts being constructed, combined and arranged, substantially as shown and described. 3rd. A plough comprising a handle having a tongue thereon, provided with an extension and a plurality of bolt holes therein at varying heights, a fork joint, or coupling as B, pivoted thereto, a removable bolt extending through said fork near the centre, a beam as C, pivoted in the rear fork of said joint, and having a projection thereon provided with a bolt hole, a removable bolt extending through the end of said rear fork and through the beam, side beam as E, having discs upon the ends thereof entering the centre of the joint, and pivotally secured by a bolt inserted vertically therethrough, teeth formed upon the forward ends of said discs with which the extension of the handle tongue engages, whereby the side beams are latterly and independently adjustable and shovels mounted upon all of said beams, said parts being constructed combined and arranged, substantially as shown and described.

No. 49,683. Flue Scraper. (Nettoyeur de tubes.)

George R. Ford, Chicago, Illinois, U.S.A., 16th August, 1895; 6 years.

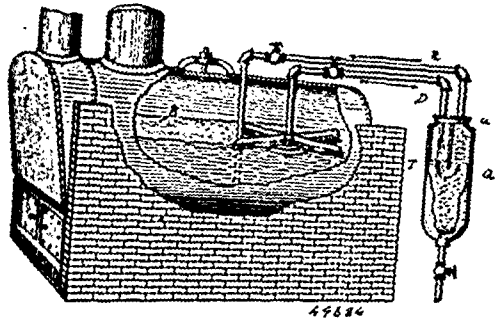
Claim.—1st. In a boiler flue scraper, the combination of a shank provided with a conical opening, a plurality of springs having their ends supported in the conical opening, a thimble fitting into the

opening in position to retain the springs in position in the shank, a plurality of knives, one for each spring, a socket adapted to receive



the ends of the springs opposite the shank, a flanged thimble fitting into the socket and retaining the springs in the socket, the flange serving as an abutting surface against which the ends of the springs abut, a rod or bolt secured to the shank extending beyond the other end of the spring, and a nut engaging with said bolt for the purpose of retaining the socket in place and adjusting the same upon the bolt so as to spread and expand the springs, and thereby the knives, substantially as described. 2nd. In combination, with a shank having a conical opening, a thimble square in cross-section fitting into the said shank, leaving openings for the reception of the supporting springs, a plurality of supporting springs each spring bearing a knife or scraper, the ends of the springs fitting into the shank between the thimble and the outer walls of the conical opening, a thimble square in cross-section fitting into said socket, leaving openings for the reception of the end of the springs, and suitable means for expanding the springs, substantially as and for the purpose described. 3rd. In combination with a bolt, a shank to which one end of said bolt is fastened, a conical opening around the bolt, a thimble fitting into the conical opening, a plurality of springs, one end of which are fitted between the thimble and the walls of the conical opening, a plurality of knives, one for each spring, a socket at the opposite end of the springs adapted to receive and retain the ends of the springs in position, a thimble having a flange fitting into the said conical opening, the ends of the springs being brought in contact with the said flange, and a nut or other suitable means for compressing the springs, substantially as and for the purpose described.

No. 49,684. Boiler Cleaner. (Nettoyeur de chaudières.)

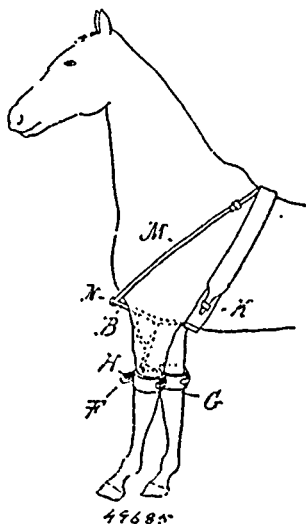


George R. Ford, Chicago, Illinois, U.S.A., 16th August, 1895; 6 years.

Claim.—1st. The combination with a steam-boiler, of a cleaner consisting of a central hollow hub, a plurality of vertically arranged radiating arms or plates, a basin supported beneath the bottom edges of the vertically arranged radiating arms or plates, a discharge pipe arising from and engaging with the hollow hub and extending to a settling drum, a settling drum provided with a partition or other means for leaving a steam filled space at the top thereof into which the refuse is discharged from the drum, and a return pipe reconveying the water to the boiler, all constructed substantially as described. 2nd. The combination with a steam-boiler, of a cleaner consisting of a central hollow hub, a plurality of radiating vertical plates or wings hinged to the said central hub, a pan or basin beneath the said wings, and suitable means for expanding or collapsing the said wings, substantially as and for the purpose described. 3rd. The combination with a steam-boiler, of a boiler cleaner consisting of a central hollow hub, a plurality of wings hinged to the said hub, a pan attached to the said hub beneath the said wings and provided with slots, bolts or rods attaching the wings to the pan through said slots, and suitable means for retaining the said wings expanded, and said wings adapted to collapse or shut together when not in use, substantially as described. 4th. In combination with a boiler cleaner consisting of a pan, a hollow hub, wings extending from the said hub directing the refuse to the said hub, openings into the said hub for the reception of the refuse and water, a conduit pipe and a double ground connection whereby the said boiler cleaner may be adjusted to any required position, substantially as described. 5th. In a boiler cleaner, a skimmer comprising a body or pan presenting a vertically disposed well having two or more mouths or inlets, one above the other, a horizontally disposed flaring intake at each of said mouths, in combination with a discharge pipe extending from the lower part of the said well to a settling chamber, and a return pipe, all constructed and arranged substantially as described. 6th. In a boiler cleaner, the combination of a series of pans, one above the other, a series of wings or plates

for each pan, openings above each pan into the central hub or tube, an outlet pipe extending from said hub or tube to a settling basin adapted to receive the refuse carried by said pipe, and an inlet pipe adapted to return the water from the settling basin to the boiler, substantially as described.

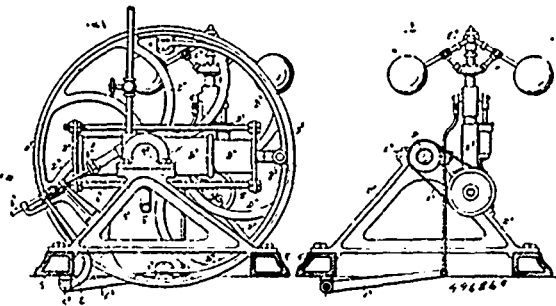
No. 49,685. Hopple. (Entraves pour animaux.)



Gustavus Barton, Memphis, Michigan, U.S.A., 16th August, 1895; 6 years.

Claim.—1st. In a hopple, the combination with a breast plate, of a depending bracket thereon, leg straps, a pivotal laterally swinging bar connecting the forward portions of the straps and the lower end of the bracket, and means for securing the breast plate in place, substantially as described. 2nd. In a hopple for animals, the combination of a breast plate, a harness for securing the plate under the horse's breast between his fore legs, a post depending from the plate, a laterally swinging cross bar centrally pivoted to the post, straps adapted to be secured to the fore legs above the knees, and a sliding connection between the straps and the cross bar arranged in advance of the straps, substantially as described. 3rd. In a hopple, the combination of the breast plate B, a surcingle adapted to be secured to the rear end thereof, the breast straps M secured to the front end thereof and connected to the surcingle, the post depending from the front of the breast plate, a pin at the lower end of the post, a laterally swinging cross bar adjustably pivoted on the pin having longitudinal slots in its end straps adapted to be secured to the horse's legs above the knee and rings on the straps engaging in the slots in the cross bar, substantially as described.

No. 49,686. Rotary Steam Engine. (Machine à vapeur rotative.)

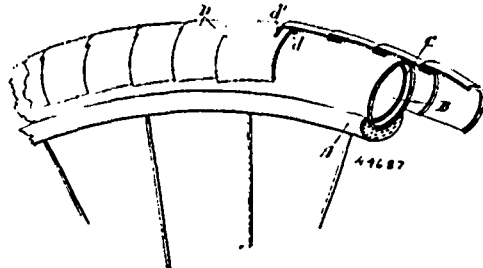


Frederick W. Reeves, St. Paul, Minnesota, U.S.A., 16th August, 1895; 6 years.

Claim.—1st. In a reciprocating rotary steam-engine, two cylinders extending in opposite directions and adapted to revolve about a common centre and each provided with a steam port, steam passages over which said ports revolve to alternately admit and cut off the steam, pistons working in said cylinders and coupled to move alternately, a shaft journalled to one side of the centre of said cylinders and having a drum or pulley, and means for connecting one of said pistons to said drum or pulley, substantially as and for the purpose set forth. 2nd. In a reciprocating rotary steam-engine, two cylinders extending in opposite directions and adapted to revolve

about a common centre and each provided with a steam port opening through a face a^1 , a stationary head having a face a^2 , against which said face a^1 works steam-tight, steam passages b^2, b^3 having cut-off blocks between their ends adapted to alternately admit and cut off the steam from said cylinders, pistons working in said cylinders and coupled to move alternately, a shaft journalled to one side of the centre of said cylinders and having a drum or pulley, and means for connecting one of said pistons to said drum and pulley, substantially as and for the purpose set forth. 3rd. In a reciprocating rotary steam-engine, two cylinders extending in opposite directions and adapted to revolve about a common centre and each provided with a steam port, steam passages over which said ports revolve to alternately admit and cut off the steam, pistons working in said cylinders and coupled to move alternately, a shaft journalled to one side of the centre of said cylinders and having a drum or pulley, and a curved connecting rod adapted to connect said drum and one of said pistons, substantially as and for the purpose set forth. 4th. In a reciprocating rotary steam-engine, two cylinders extending in opposite directions and adapted to revolve about a common centre and each provided with a steam port opening through a face a^1 , a stationary head having a face a^2 , against which said face a^1 works steam-tight, steam passages b^2, b^3 , having cut-off blocks between their ends and adapted to alternately admit and cut off the steam from said cylinders, pistons working in said cylinders and coupled to move alternately, a shaft journalled to one side of the centre of said cylinders and having a drum or pulley, means for connecting one of said pistons to said drum or pulley, a governor valve b^4 , working in the steam inlet passage, and a governor adapted to automatically adjust the position of said governor valve with relation to the speed of the engine, substantially as and for the purpose set forth.

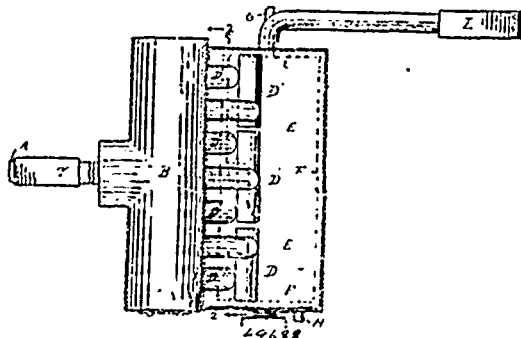
No. 49,687. Pneumatic Tyre for Bicycles. (Bandage pneumatique pour bicycles.)



Robert Johnson McInnes, and John Wilson Elliot, both of Milton, Ontario, Canada, 16th August, 1895; 6 years.

Claim.—1st. In a bicycle or other wheel, the combination with the pneumatic tyre, of a protective covering comprising a series of over-lapping arc-shaped sections partially encompassing the pneumatic tyre and connected together as and for the purpose specified. 2nd. In a bicycle or other wheel, the combination with the pneumatic tyre, of a protective covering comprising a series of over-lapping sections hooked one into the other as shown and for the purpose specified.

No. 49,688. Smoke Arrester. (Arrête-fumée.)

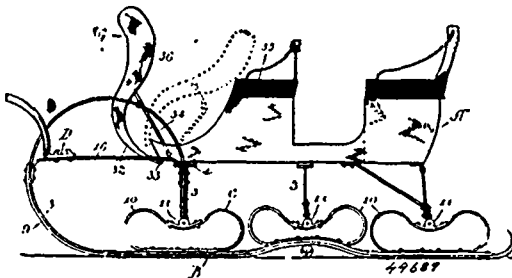


William P. Shank, Cairo, Illinois, U.S.A., 16th August, 1895; 6 years.

Claim.—1st. In an apparatus, substantially as described, the combination of the water tank E, the collecting chamber B, the nozzles D leading from such chamber to the tank and blast devices C discharging into said tank, substantially as set forth. 2nd. An apparatus, substantially as described, comprising the water tank E and nozzles D opening below the surface of the water and having contracted discharge openings d, d^1 , substantially as set forth. 3rd. An apparatus, substantially as described, the combination of the tank E, the nozzles opening into

said tank, said tank having an outlet H, blast devices C discharging into said tank such devices being arranged relative to said outlet H, substantially as described. 4th. In an apparatus, substantially as described, the combination with the tank E having an outlet H at or about its water level, and a blast inlet i opposite said outlet, blast devices C communicating with said inlet and nozzles opening into said tank, all substantially as and for the purpose set forth. 5th. In a smoke-arrester the combination of the receiving chamber B having the nozzles D, the water tank E, into which said nozzles discharge, said tank having a blast inlet i and an outlet H opposite the same, the tube or flue leading to the receiving chamber and means for creating a blast therein, substantially as set forth. 5th. The improved smoke-arrester consisting of the water tank E having a blast inlet i at one end and an outlet H at the other end, the receiving chamber B having its nozzles D extending into and discharging below the water level in the tank, the stop plate F arranged in the tank above the discharge of the nozzles, the flue leading to the receiving chamber and the blower I by which to create the blast in said flue, substantially as set forth.

No. 49,089. Sleigh. (Traineau.)



James N. Runions, Cokato, Minnesota, U.S.A., 16th August, 1895; 6 years.

Claim.—1st. In a sleigh, the combination with the knees and the runners, of loop springs interposed between said knees and runners. 2nd. In a sleigh, the combination with the knees and runners, of the springs fixed to said runners and having jointed or pivoted connection with said knees. 3rd. In a sleigh, the combination with the knees, of the spring runners, and the loop springs fixed upon said runners and supporting said knees. 4th. In a sleigh, the combination with the knees and body, of the interposed oscillating connection. 5th. In a sleigh, the combination with the body and cross-beam, of the interposed connection permitting of both horizontal and vertical oscillation between them. 6th. The combination with the sleigh, of the angular draft bar and the jacks shiftable along the same. 7th. In a sleigh, the combination with its body, of the dash board having a downwardly and rearwardly extending bottom part, the hinge connecting the same to said body and the jointed braces for the same. 8th. In a sleigh, the combination with the body, of the dash board hinged thereto, its jointed brace rods and the vertically adjustable seat.

No. 49,090. Wooden Rim for Cycles.

(*Jante en bois pour bicycles.*)

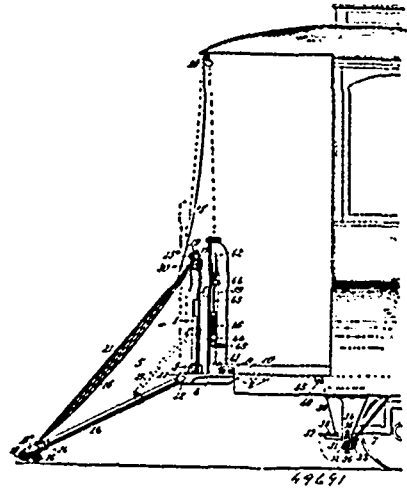


Walter Scott Shippe, Toronto, Ontario, Canada, 16th August, 1895; 6 years.

Claim.—1st. A cycle wheel rim constructed of a continuous band of wood built up and arranged so that the central portions of the length of the band have the fibre or grain extending at an angle to said band and alternately inclining right and left so that when said band is wound into a plane spiral, the fibre of central layers of said band extends obliquely to that of layers next it, said rim being wound under a heavy tensile strain, substantially as shown and described. 2nd. A cycle wheel rim constructed of a continuous band of wood built up and arranged so that the central portions of its length have the fibre extending at an angle to the band and inclined alternately right and left so that the layers or thicknesses of said band have their fibre obliquely of those next, said band having transverse rows of longitudinal punctures disposed over the surfaces of its sides, substantially as shown and described. 3rd. A cycle wheel rim constructed of a continuous band of wood built up and arranged so that central portions of its length have the fibre of the wood extending diagonally or obliquely of the band and both right and left alternately for lengths to about equal one round of the rim, thereby the fibre of a layer or round extends obliquely to that of layers next said band having its surfaces punctured by trans-

verse rows of longitudinal punctures alternated with transverse corrugations, and the band being subjected to a heavy tensile strain, substantially as shown and described.

No. 49,091. Car Fender. (Défense de chars.)

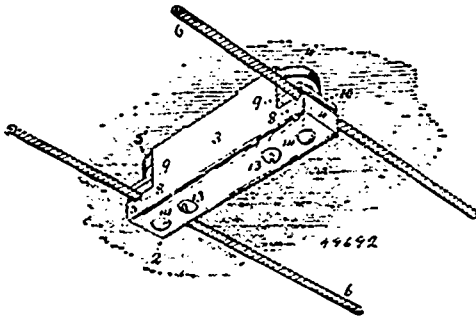


Robert Bustin, Robert Keltie Jones, both of St. John, Wesley Vanwark and John R. McConnell, both of Fredericton, all of New Brunswick, Canada, 20th August, 1895; 6 years.

Claim.—1st. A detachable and folding fender for street railway cars, consisting of side arms adapted to be detachably hinged at their rear ends to brackets carried by the car body or truck, an upper cross-bar for detachable connection with standards permanently supported on said brackets, a lower and forward cross-bar secured to the forward ends of the side arms, a pneumatic cushion or buffer supported on said lower cross-bar, flexible side stays connecting the upper and lower cross-bars and adapted to regulate the distance between said bars and give any required inclination to the side arms, and a netting or yielding covering connected to and supported by said bars and stays, the said fender being adapted for folding upward while connected with a car and the netting capable of being rolled on to the upper cross-bar when the fender is detached, substantially as described. 2nd. In a street car fender, the combination with bracket-arms supported by the car body or truck, and standards projecting from said bracket-arms, of the fender-side arms having at their rear ends a detachably hinged connection with said bracket arms, cap pieces adapted to fit detachably on to the upper ends of the standards, an upper cross-bar clipped to said caps and removable therewith, a lower cross-bar carried by the forward ends of the hinged fender side arms, a pneumatic cushion or buffer supported by said lower cross-bar, flexible side stays that connect the upper and lower cross-bars to regulate the distance between said bars and control the inclination of the side arms so as to support the pneumatic buffer at the required elevation above the track, a netting or yielding covering connected to the said upper and lower cross-bars and side stays, and a tubular cushion attached to the front of the upper cross-bar, substantially as described. 3rd. In a street car fender, the combination with supporting bracket-arms having tubular standards projecting therefrom, of a detachable fender-frame consisting of tubular side arms having their rear ends detachably hinged to the said bracket-arms, a lower cross-bar carried on the forward ends of the said side arms and cushioned to serve as a buffer, an upper cross-bar detachably connected with the said standards and protected in front by a cushion, and a netting connecting said upper and lower cross-bars, substantially as described. 4th. In a street car fender, the combination with the supporting brackets and standards, of an upper cross-bar detachably supported on said standards, the fender side arms hinged to said brackets and detachable therefrom, a trough-shaped lower cross bar having outward, rearward and upwardly curved end extensions secured to the said fender side arms, a tubular pneumatic cushion or buffer supported in the concavity of the trough-shaped cross-bar having at its ends flattened extensions conforming to the end extensions of said cross-bar and secured therewith to the side arms of the fender, bracing blocks secured to and intermediate the said side arms and curved bar extensions, eye-bolts fastened into said blocks, flexible side stays secured to said eye-bolts and to the upper detachable cross-bar, and a netting or covering connected to the upper and lower cross-bars and to the side stays, substantially as described. 5th. In a street car fender, the combination with standards carried permanently in front of the dash-board, of an upper cross-bar detachably

supported on said standards, the hinged or pivotally supported and detachable fender side arms, a lower cross-bar carried by the forward ends of the said side arms and supporting a pneumatic cushion, rollers carried by the lower cross-bar, flexible side stays connecting the upper and lower cross-bars, and a netting laced to said cross-bars and stays, substantially as described. 6th. In a street car fender, the combination of the detachably hinged side arms, a lower cross-bar connected to the forward ends of the said side arms and supporting a pneumatic cushion, a detachable upper cross-bar supported by standards on the car, flexible side stays connecting the upper and lower cross-bars and arranged to control the distance between said bars and support the lower bar and its cushion at a required elevation, a netting or covering connected with the cross-bars and side stays, and a rope or cord connected to the fender frame and extended to the top of the car for use in folding the fender, substantially as described. 7th. The combination with a wheel guard pivotally supported beneath a car, and a cord or rope attached to said wheel guard and extended above the car floor, of a gravity latch adapted to engage a loop on the upper end of said cord or rope, and a vertically movable spring bolt normally engaged with said gravity latch to hold it in position for sustaining the wheel guard in a horizontal position, the said bolt being provided with a foot rest whereby the latch may be tripped and caused to release the wheel guard, substantially as described. 8th. The combination with a wheel guard pivotally supported beneath a car, means for giving a vertical adjustment to said wheel guard, and a cord or rope attached to said wheel guard and extended above the car floor, of a latching and tripping mechanism for controlling the wheel guard through said cord or rope, substantially as described. 9th. The combination with a wheel guard, consisting of a transversely arranged plate having its ends journaled beneath a car and provided along its lower edge with several thicknesses of heavy rubber, of a cord or rope secured to said plate or guard and extended above the car floor, and a latching and tripping mechanism adapted to support or release the upper end of said cord or rope to control the said wheel guard and brake, substantially as described.

No. 49,692. Insulator. (Isolateur.)



Leonard Herbert Des Isles and Frederick Summer Palmer, both of Boston, Massachusetts, U.S.A., 20th August, 1895; 6 years.

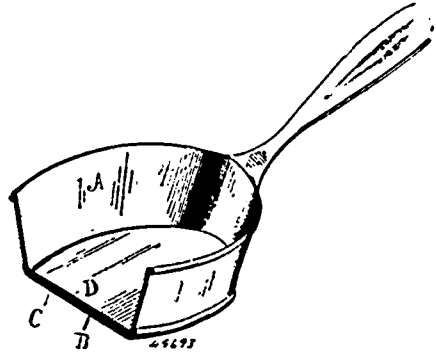
Claim.—1st. As a new article of manufacture, an insulator for wire support, comprising a main body of insulating material, having end brackets, a metallic clip, and a holding screw, said screw and clip to have screw-thread connection with each other, and co-operating with a bracket to hold a wire, substantially as and for purposes stated. 2nd. An insulating body, its end brackets transversely grooved, and end caps thereabove, combined with a metallic clip, a holding bolt which has screw-threaded engagement with said clip, and a perforation through the bracket to allow free passage of the body of the screw, the cap and the bracket co-operating to retain a wire, substantially as set forth and explained. 3rd. In combination with an insulating body, and brackets thereupon, a holding screw adapted to extend loosely through a bracket, a metallic clip transversely bored and screw-threaded to engage the screw, and a lip forming part of the clip and adapted to lie in parallelism with and overlap the wire which is grasped between the bracket and the clip proper, substantially as specified.

No. 49,693. Cooking Utensil. (Ustensile de cuisine.)

Allen A. Sage, John R. Van Dame, and Minnie Hacht, all of Detroit, Michigan, U.S.A., 20th August, 1895; 6 years.

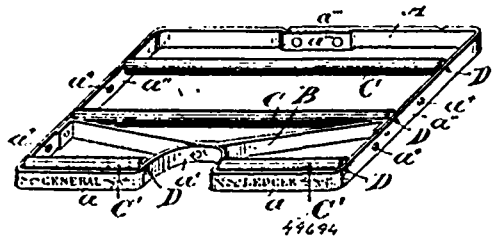
Claim.—1st. The herein described cooking dish, having a bottom composed of two layers of metal, between which said layers is placed a layer of asbestos, substantially as described and specified. 2nd. A cooking dish having its sides, bottom and top composed of two layers of sheet metal between which is placed a layer of asbestos,

substantially as described and specified. 3rd. A cooking dish having the bottom and the sides or a portion thereof, constructed of



two layers of sheet metal between which is placed a layer of asbestos, substantially as described and specified.

No. 49,694. Roller Shelf. (Tablette.)

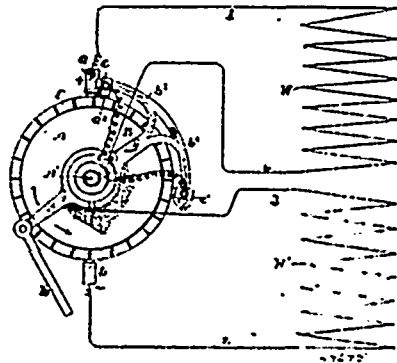


Sarah Anne Morden, assignee of Walter Henry Morden, Toronto, Ontario, Canada, 20th August, 1895; 6 years.

Claim.—In a roller shelf, the combination of a rectangular frame of bar set on edge and having an inward central curve in the front adjoining the latter at right angles, an angular brace connecting the two sides of the frame and the rear of the said curve, a roller immediately at the rear of each front bar and two or more intermediate rollers, all set above the top edge of the frame and running upon axes passing through said rollers and secured in said frame, substantially as set forth.

No. 49,695. Electric Current Transmitter.

(Transmetteur de courant électrique.)

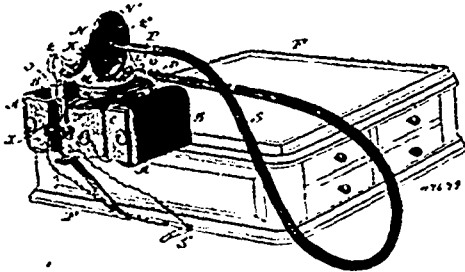


The Thomson-Houston International Electric Company, Portland, Maine, assignee of Charles A. Coffin, Boston, Massachusetts, all in the U.S.A., 20th August, 1895; 6 years.

Claim. 1st. In a system of distributing defined rising and falling currents, the combination with the sectional commutator of a continuous current machine, and the main stationary brushes thereof, of a working circuit one terminal of which is connected to one of the stationary commutator brushes, an auxiliary commutator brush and connections therefrom to the other terminal of the working circuit, and means for moving the auxiliary brush over a pre-determined number of commutator sections, less than the total number between the main brushes and thereby transmitting to the said working circuits rising and falling currents of a lower maximum potential than that existing between the main commutator brushes. 2nd. The combination with the commutator of a continuous current generator or distributor, of main stationary commutator brushes thereon, an arm moving radially to said commutator and provided with extensions and with commutator brushes carried in adjustable

of said tower, a conveyor tube at the bottom of said tower, and deflectors e^1 in the top of the tower, and studs e^2 , arranged to separate the falling material, substantially as and for the purpose set forth. 3rd. In a drying tower, the combination, with the tower proper, of a pair of hoppers at or near the bottom of the tower, a casing h , a belt or bucket conveyor, a duct g^1 , having a gate g^2 therein, connecting the lower hopper with said casing h , a duct g^2 , having a gate g^1 , a conveyor chute k , connected with said duct g^2 , and a conveyor tube c , all arranged, substantially as and for the purposes set forth. 4th. In a drying tower, the combination, with the tower proper, of a pair of hoppers at or near the bottom of the tower, a casing h , a belt or bucket conveyor, a duct g^1 , having a gate g^2 therein, connecting the lower hopper with said casing h , a duct g^2 , having a gate g^1 , a conveyor chute k , connected with said duct g^2 , and a conveyor tube c , substantially as and for the purposes set forth. 5th. The drying tower herein set forth, consisting essentially of an outer shell a , and an inner shell c , said shells having correspondingly arranged openings near the top of the tower, and swinging doors arranged in the openings in said outer shell a , substantially as and for the purposes set forth. 6th. In a drying tower, of the class herein set forth, hot air deflectors e^1 , in the top of the tower, and studs e^2 , extending inwardly from the sides of the tower for separating the descending particles of the material to be dried, and means for discharging the material to be dried at or near the top of the tower, substantially as and for the purposes set forth. 7th. The herein described drying tower, consisting essentially of an outer shell or stack a , and an inner shell or stack c , means for conveying the material to be dried through said stacks into or near the bottom of said inner stack c , a conveyor within said stack c , for discharging the material to be dried at or near the top of said stack, and a conveyor chute at or near the bottom of said stack c , for conducting the dried material from the stack, substantially as and for the purposes set forth. 8th. In a drying tower, of the class herein set forth, the combination with the tower proper, a hopper f provided with slats or louvers f^1 in its bottom, a conveyor chute at one side for conveying the material into the said hopper, a second hopper g directly below said first hopper, a bucket conveyor for conducting the material to be dried to the top of said tower, a duct for conveying the material from said hopper g into said bucket conveyor, and a conveyor tube k at the bottom of said tower, substantially as and for the purposes set forth.

No. 49,699. Electric Dental Engine.
(*Engin dentaire électrique.*)



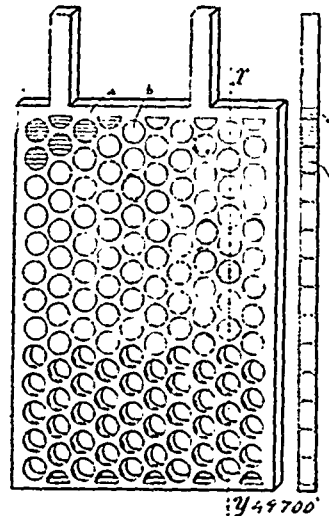
William Eugene Wheeler, George W. Johnston and James F. Johnston, all of Dayton, Tennessee, U.S.A., 20th August, 1895; 6 years.

Claim.—1st. An improved dental engine comprising a motor having a friction drive-wheel on its operating shaft, a movable drill shaft, a disc member adapted to be rotated by contact with the aforesaid drive-wheel, and means for adjusting the pressure of the said shaft towards the said drive-wheel, whereby the said disc will become non-rotatable, when the drill meets with a resistance greater than the contact tension of the aforesaid disc against the drive-wheel as hereinbefore described. 2nd. An electric dental engine comprising a motor having a friction drive-wheel on its armature shaft, a supporting member pivotally supported on the motor frame to swing laterally over the drive-wheel, and spring pressed towards the said wheel, a drill shaft journaled in the said member and a friction disc fixedly held on the said shaft and in contact with the drive-wheel by the spring pressure of the supporting member, substantially as shown and described. 3rd. An electric dental engine, comprising a main frame adapted to be secured to a bracket or table, and having field magnets secured thereto, an armature journaled on the frame and held to rotate vertically between the said magnets said armature having a friction drive-wheel, a drill operating disc held to engage the said drive-wheel, the drill cable connected with the bearing for the said disc and a combined automatic switch member and a rest for the drill end of the cable, arranged substantially as shown whereby the engine will be stopped and started as the cable is placed between and withdrawn from the said rest portion, as set forth. 4th. In an electric motive power dental engine, a rest for the cable, comprising yielding arms having the terminals of the circuit connected normally held with their terminals in contact and to break such contact when the cable is held thereon, as specified. 5th. In an electric motive power dental engine, a com-

bined automatic switch, and cable rest, the switch being governed by the insertion and withdrawal of the cable to stop and start the engine, substantially as described. 6th. An improved dental engine comprising an electric motor having a frictional drive-wheel or disc, a drill shaft having a friction drive disc, a pivoted supporting member for such shaft, and a tension means for holding the drill shaft friction disc in frictional contact with the armature shaft drive disc, substantially as and for the purpose described. 7th. In combination, with the motor and the armature friction wheel, of a laterally swinging arm, a notched guide therefor, the drill shaft journaled on the said arm, and a friction wheel mounted on the drill shaft to turn therewith held in contact with the face of the armature friction wheel, all substantially as shown and for the purpose described. 8th. The combination with the motor, the armature shaft of which has a friction wheel having a plane face, of an insulated arm held on the motor to swing laterally over the said friction wheel, said arm being held spring pressed toward such wheel, the drill shaft journaled in the said arm, and a friction wheel on such shaft having a rubber rim, said wheel being held in contact with the armature friction wheel, substantially as and for the purpose specified.

No. 49,700. Electric Accumulator.

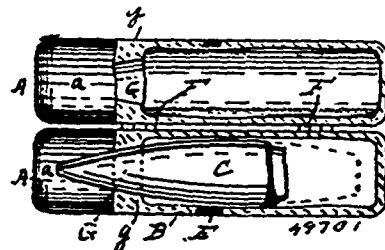
(*Accumulateur électrique.*)



Arthur Duffek and Bohumil Holub, both of Prague, Bohemia, Austria, 20th August, 1895; 6 years.

Claim.—1st. An electric accumulator consisting of balls b of active material in contact with each other, and a leaden frame holding the balls together, substantially as described. 2nd. An electric accumulator consisting of a leaden frame having a series of interstices or pockets therein and a series of balls located and held in said pockets, substantially as described. 3rd. An electric accumulator consisting of a frame of lead, a series of openings or pockets therein, openings between the walls of the pockets and balls located in the pockets, substantially as described.

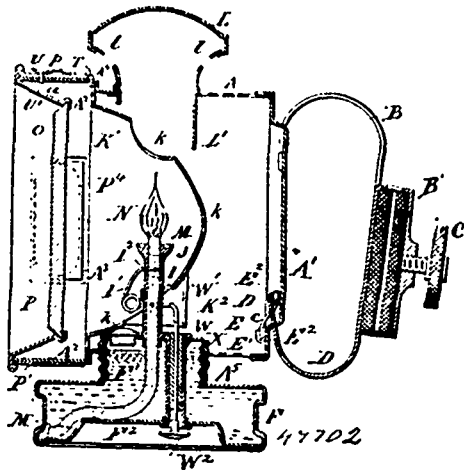
No. 49,701. Cigar Case. (*Etui à cigares.*)



Frederick Cronewett, jr., Detroit, Michigan, U.S.A., 20th August, 1895; 6 years.

Claim.—A cigar case consisting of two halves hinged together and each having a fireproof lining extending from one extreme end of the case to a point intermediate its centre and the other end thereof, said lining at the latter point being thickened and provided with concavities to receive the tip end of the cigar, substantially as described.

No. 49,702. Bicycle Lamp. (Lampe de bicycles.)



Lewis Fulton Betts, Brooklyn, New York, U.S.A., 20th August, 1895; 6 years.

Claim.—1st. In a bicycle lamp, a case carrying a fount, wick-tube and reflector, the yielding frictional check E, and the top spring B, connecting said case with the socket B¹, and a bottom spring D, the latter playing through the said frictional check E, all arranged for joint operation substantially as herein specified. 2nd. In a bicycle lamp, the perforated case A, imperforate case-ring A², wick tube I, and concave reflector K, the latter provided with a flange K¹, having large perforations and adapted to hold the reflector concentrically within the case ring while allowing an easy flow of the air, in combination with the internal bead A⁴, in said case ring, and with securing means U, for holding and releasing the parts, all arranged to serve substantially as herein specified. 3rd. In a bicycle lamp, the perforated case A, the imperforate case-ring A², and concave reflector K, the latter presenting a narrow space between its front and the interior of said case-ring, and the cap J, extending downward from the top of said case nearly but not quite to the said reflector, and shaped at its lower edge to correspond so as to lie near the reflector but not to conduct heat thereto, all arranged for joint operation as herein specified. 4th. In a bicycle lamp, the perforated case A, imperforate case-ring A², with its window apertures A³, concave reflector K, presenting a substantially annular passage for the flow of air forward between the body of said reflector and the interior of said case-ring, the fount F, and wick-tube I, in combination with a face composed of the glass O, and conical ring P, a cylindrical flange P¹, provided with the coloured side windows P⁴, arranged to allow light to shine forward through the glass O, and also obliquely through said window apertures A³, and said coloured side windows P⁴, all arranged for joint operation substantially as herein specified. 5th. In a bicycle lamp, the perforated case A, imperforate case-ring A², with its window apertures A³, concave reflector K, presenting a substantially annular passage for the flow of air forward between the body of said reflector and the interior of said case-ring, the fount F and wick-tube I, in combination with a face composed of the glass O, and conical ring P, a cylindrical flange P¹, provided with the coloured side windows P⁴, and also with a lighting aperture P⁵, and confining means U, U¹, adapted to allow the face to be partially revolved to bring the aperture P⁵, into and out of coincidence with one of the apertures A³, and also to allow the face to be attached and detached, all arranged for joint operation substantially as herein specified. 6th. In a bicycle lamp, the perforated case A, imperforate case-ring A², wick-tube I, and concave reflector K, the latter presenting a narrow space between its front and the interior of the said case-ring, and having a liberal opening for the insertion and removal of the wick-tube and its adjuncts, in combination with each other and with the skirt K² around said aperture, and the deflector J on said wick tube, all arranged for joint operation substantially as herein specified.

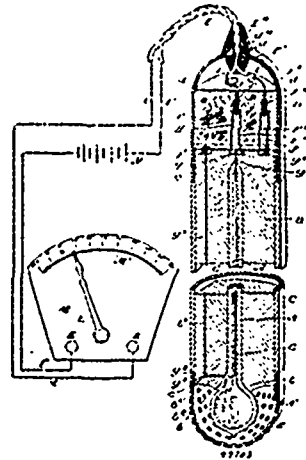
No. 49,703. Electric Transmitting Thermometer.

(*Thermomètre transmetteur électrique.*)

Francis Napier Denison, Toronto, Ontario, Canada, 20th August, 1895; 6 years.

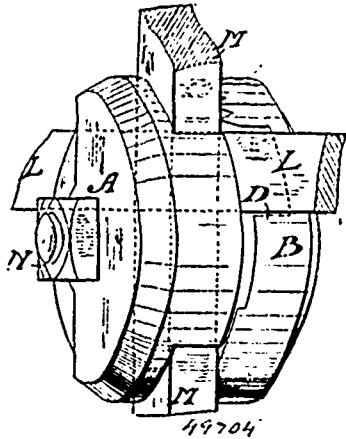
Claim.—1st. In a thermometer, a tube having a central wire or conductor of more or less resistance passing through it and electrical means connected at the ends of such wire for recording the change in temperature as the mercury or other liquid expands or contracts, as and for the purpose specified. 2nd. In a thermometer, a tube having a central wire or conductor of more or less resistance passing through it, an insulating casing for the tube, a platinum wire connected to the top of the high resistance wire in the tube and leading

through the insulating casing, a platinum wire connected to the lower end of the central wire within the glass tube and a conducting



wire leading therefrom, and leads from the ends of both conducting wires to an electrical indicator, as and for the purpose specified. 3. The combination with the mercury tube and bulb held centrally in a suitable solid cylinder of insulating material, a metal casing surrounding such cylinder, a central high resistance wire extending through the major portion of the tube, a wire extending through the upper end of the tube to a screw plug, a heavy wire extending laterally from the lower end of the high resistance wire through the insulating cylinder and vertically to a ring let into the top of the cylinder, a cap screwed on top of the cylindrical casing, an insulating block securely held within the cap from vertical movement, a central hole and plug held in contact with the screw plug in the top of the insulating cylinder by a spring connected to the metal plug at the top, a hole made in the block opposite to the ring on the top of the cylinder, a metal plug held in frictional contact with such ring on the top of the cylinder by a suitable spring within the hole, and wire leads to the indicator, as and for the purpose specified. 4th. The combination with the tube and bulb held centrally in a suitable solid cylinder of insulating material, a metal casing surrounding such cylinder, a central high resistance wire extending through the major portion of the tube, a platinum wire extending through the upper end of the tube in a screw plug, a heavy wire extending laterally from the lower end of the high resistance wire through the insulating cylinder, and vertically to a ring let into the top of the cylinder, a cap screwed on top of the cylindrical casing, an insulating block securely held within the cap from vertical movement, a central hole and plug held in contact with the screw plug in the top of the insulating cylinder by a spring connected to the metal plug at the bottom, a hole made in the plug opposite to the ring on the top of the cylinder, a metal plug held in frictional contact with such ring on the top of the cylinder by a suitable spring within the hole and wire leads to the indicator and a cable containing the lead wires and passing through a hole in the top of the cap and a knot formed within the hole, as and for the purpose specified. 5th. The combination with the tube and bulb held centrally in a suitable solid cylinder of insulating material, a metal casing surrounding such cylinder, a central high resistance wire extending through the major portion of the tube, a platinum wire extending through the upper end of the tube to a screw plug, a heavy wire extending laterally from the lower end of the high resistance wire through the insulating cylinder and vertically to a ring let into the top of the cylinder, a cap screwed on top of the cylindrical casing, an insulating block securely held within the cap from vertical movement, a central hole and plug held in contact with the screw plug in the top of the insulating cylinder by a spring connected to the metal plug at the top, a hole made in the block opposite to the ring on the top of the cylinder, a metal plug held in frictional contact with such ring on the top of the cylinder by a suitable spring within the hole and wire leads to the indicator and a cable containing the lead wires passing through a hole in the top of the cap, and a wrapping passed around the cable to the outside of the hole, as and for the purpose specified. 6th. The combination with the tube and bulb insulated and supported in a suitable casing as specified, and a high resistance wire passing through the major portion of the tube and connected to suitable leads, of a cable, which forms a support for the thermometer casing, as and for the purpose specified. 7th. The combination with the tube and bulb insulated and supported in a suitable casing as specified, and a high resistance wire passing through the major portion of the tube and connected by suitable leads to the cable, which forms the support of the thermometer casing, of a perforated cap secured to the lower portion of the casing and partially surrounding the bulb, as and for the purpose specified.

No. 49,704. Clamp for Hoes. (Lien de houe.)



James Irving, Seaforth, Ontario, Canada, 20th August, 1895; 6 years.

Claim.—An adjustable clamp or fastener for holding hoes, scufflers or other implements for tilling soil and cultivating crops to the beam or frame of the cultivating machine, consisting of two round plates or discs, each disc having a channel in it, the channel in one disc to fit over the beam or frame of the cultivating machine, and the channel in the other disc to fit over the shank of the cultivating tool, the discs being fastened together, the shank of the cultivating tool gripped in position, and the clamp held on the beam or frame of the cultivating machine by means of one bolt passing through a hole in the centre of each disc, substantially as described.

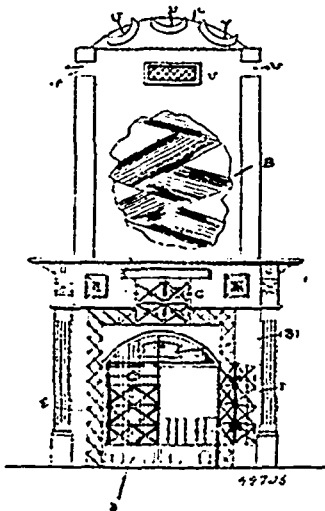
No. 49,705. Process of Preparing an Emulsion of Cod Liver Oil. (Procédé pour préparer l'huile de foie de morue.)

Armond Hudon, Montreal, Quebec, Canada, 20th August, 1895; 6 years.

Claim.—An emulsion of cod liver oil consisting of cod liver oil, glycerine, spirits of wine, hydrocyanic acid, essence of vanilla and mucilage of chondrus, mixed together in the proportions and in the manner substantially as set forth.

No. 49,706. Hot Air Heating Apparatus. (Calorifère à air.)

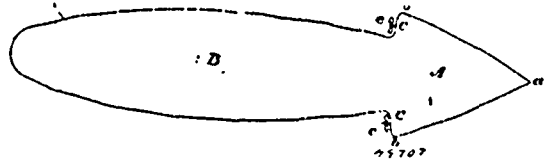
(Calorifère à air.)



Christian Phillip Shindler, Vancouver, British Columbia, Canada, 20th August, 1895; 6 years.

Claim.—The combination of a fire frame A, having an angular-shaped coil B, substantially as and for the purposes set forth.

No. 49,707. Hull for Vessels. (Coque de vaisseau.)

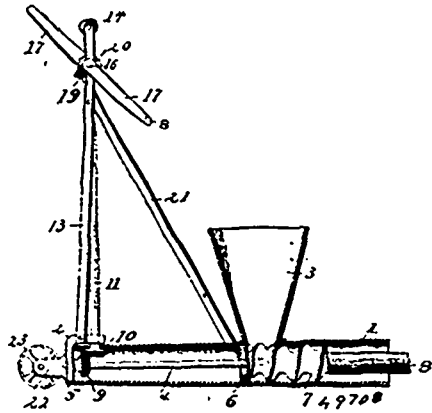


Mark Golinsky, Rahway, New Jersey, U.S.A., 21st August, 1895; 6 years.

Claim.—1st. A hull for marine vessels having a bow which is of the arrow type or form, and whose maximum width or beam is at the rear extremity of the bow and forward of the mid-ship section substantially as shown and described hereinbefore. 2nd. A hull for marine vessels having an arrow shape as shown, that is to say, the bow or front. 3rd. Of the length of the hull widening from the bow rearward and having its greatest width at its junction with the body of the hull, which is narrower at every point than the said bow as shown and described hereinbefore. 3rd. The combination with a hull for a marine vessel, having its bow of the portion forward of the midship section, of arrowhead shape and said bow forming abrupt lateral offsets with the narrower after portion of the hull, of propellers located behind such offsets in the angles of the latter with the midship section as shown and described hereinbefore.

No. 49,708. Machine for Making Pipe. (Machine pour faire les tuyaux.)

(Machine pour faire les tuyaux.)



Robert F. Dockery, Los Angeles, California, U.S.A., 21st August, 1895; 6 years.

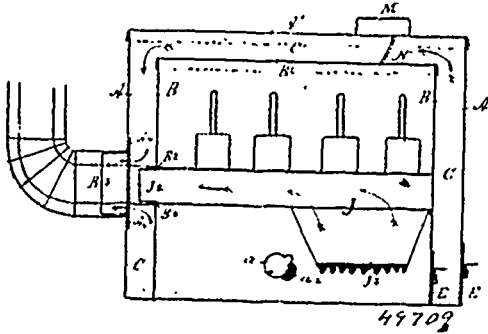
Claim.—1st. In a machine for making pipe, the combination of a cylinder provided with a hopper at its upper side and communicating with its interior, a worm arranged within the cylinder and below the hopper, a core within the cylinder and connected axially with one end of the worm, a shaft fixed to the other end of the worm and mounted centrally within the cylinder, a second shaft perpendicular to the first and geared therewith, a frame rigid on the cylinder and projecting parallel with the second shaft within which the said shaft is journaled, the frame having a hand grasp thereon, and a crank-shaft mounted in the frame and geared with the second shaft, substantially as described. 2nd. In a machine for making pipe, the combination of a cylinder having a feed opening, an angle casting at one end thereof, said casting having a disc-like portion fitting in and closing one end of the cylinder, a carrying-wheel revolvably mounted at the outer side of the disc-like portion, a shaft extending centrally in the cylinder and journaled revolvably therein, a worm within the cylinder and fixed to the shaft, a core fixed in turn to the worm, two bars rigidly fixed to and projecting vertically from the respective sides of the cylinder and provided at their upper ends with a hand grasp, a shaft extending longitudinally therewith and journaled therein and geared with the shaft in the cylinder, and a crank shaft geared to the shaft of the vertical bars, substantially as described.

No. 49,709. Stove for Tailors. (Poêle de tailleurs.)

Albert Lundstrom, Amherst, Nova Scotia, Canada, 21st August, 1895; 6 years.

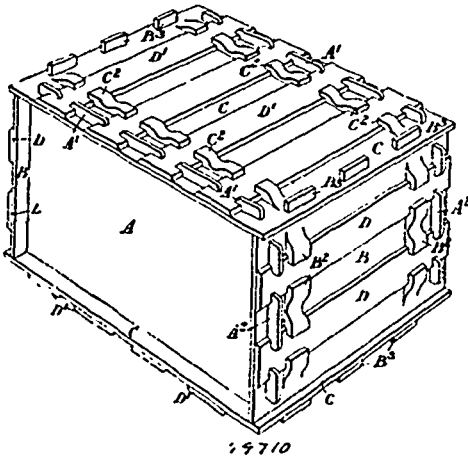
Claim.—1st. The mode of arranging the brick supports d d d, and g g g, the grate D D, and the iron frame G G, an above set out so

they can be easily removed, substantially as and for the purpose hereinbefore set forth. 2nd. The removable fire-box J, the sup-



ports inside the inner box B for supporting said fire-box, and the thimble A⁴, for closing the passage to the air stack, substantially as and for the purpose hereinbefore set forth.

No. 49,710. Artificial Stone.
(Fabrication de pierre artificielle.)



William Owen, London, England, 21st August, 1895; 6 years.

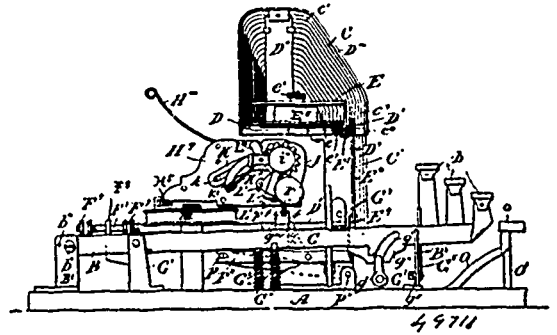
Claim.—1st. The process of manufacturing artificial stone which consists essentially in placing the water and ingredients of which the stone is composed in boxes or moulds, then placing the boxes in a suitable receptacle and subjecting them to air or water pressure sufficient to counteract the pressure caused by the combination of the water and other ingredients, substantially as described and for the purpose specified. 2nd. In a box for containing during the manufacture of artificial stone the ingredients of which such stone is composed, the combination with walls and apertures therein of other walls and projections thereon to engage with the apertures, and means to retain the projections in engagement with the apertures. 3rd. In a box for containing during the manufacture of artificial stone the ingredients of which such stone is composed, the combination with walls and apertures therein and other walls and projections thereon adapted to engage with the apertures, of recesses in the projections and locking bars to engage with the recesses. 4th. In a box for containing during the manufacture of artificial stone the ingredients of which such stone is composed, the combination with walls and apertures therein and other walls and projections thereon adapted to engage with the apertures of recesses in the projections and locking bars to engage with the recesses and lugs to guide the bars. 5th. In a box for containing during the manufacture of artificial stone the ingredients of which such stone is composed, the combination with walls and apertures therein and other walls and projections thereon to enter the apertures, of recesses beneath the projections adapted to engage with the walls having the apertures when the walls are moved relatively to each other.

No. 49,711. Type-writer. (Clavigraphic.)

Thomas Oliver, Dubuque, Iowa, U.S.A., 21st August, 1895; 6 years.

Claim.—1st. A type-bar consisting of a journal rod and a bar bent to form said rod as a base approximately a right angled triangle with the top or apex flattened and made parallel with the rod and the acute angle end bent to join the rod square and having its ends

firmly secured to the ends of said rod, type secured to the flat top opposite the base and a short lever formed at one end of the journal



rod, substantially as set forth. 2nd. In a type-writer, the combination of a type-bar having type faces secured to it, of projections secured to the back of the bar opposite the type face and out of line therewith and higher than the projection of the type face above the face of the bar to which it is secured, substantially as set forth. 3rd. The combination of the bent bar C having its ends secured to a journal rod, a type plate secured thereto opposite said journal rod a lever or crank at one end of said bar and rod, a connecting rod pivoted to said lever and to a key bar below and a key bar to which said connecting rod is pivoted, said bar pivoted at one end and provided with a spring holding it up, a base to which said bar is pivoted, a standard on said base and a bracket on said standard on which the journal rod of the type bar is journaled, substantially as set forth. 4th. A key bar for type-writer, consisting of a flat bar set on edge and having its front end doubled over at a right angle and carrying button b at the upright end, the rear end provided with hook-notch b¹ open at the lower edge, a quirek b², and provided with a spring b³ secured at the upper edge and passing obliquely down the side and through a notch in the bottom of said quirek, substantially as set forth. 5th. In a type-writer, the combination of a base A, a bracket B¹ secured thereon, a pivot rod b¹¹ secured in said bracket, a series of key bars B having hooked notches by which they engage said pivot rod and a bar or rod b¹¹¹ removably secured in said bracket so as to bear on the ends of said key bars and preventing them slipping rearwardly out of said notch, substantially as set forth. 6th. In a type-writer, the combination of a base, standards secured upon it, a horizontal bracket or bearing plate D of triangular and stepped outline secured to each of said standards so that the outline of the front and rear of said plates diverge from the outside towards the centre and a series of type-bars C graduated in size journaled upon each of said plates, substantially as set forth. 7th. In a type-writer, the combination of a bracket or bearing plate D having a triangular and stepped outline, a series of type-bars C having their journal bars secured upon it by a cap plate D¹, an inclined bar D¹¹ having its bifurcated lower end secured to and sloping from the narrow end of said triangle towards the broad end and upwards and connected at the top by a bail D¹¹¹, springing from the heels of the triangle, substantially as set forth. 8th. In a type-writer, the combination of the bracket or bearing plate D suitably supported, a vertical spindle journaled in each, a crown wheel journaled upon said spindle and supported upon a collar or shoulder, a ribbon reel journaled upon said spindle and supported upon said crown wheel, and a milled nut upon the upper end of said spindle adapted to connect said wheel and reel frictionally, and ribbon guides adapted to conduct the ribbon from one reel to the other, substantially as set forth. 9th. In a type-writer, the combination of bearing plates D suitably secured, a vertical spindle journaled upon each, a crown wheel journaled upon said spindle and supported thereon upon a collar or shoulder, a reel journaled upon said spindle and supported upon said crown wheel, a binding nut upon said spindle adapted to bind the wheel and reel together, a pinion gearing in said crown wheel, an axle journaled to said bearing plate and carrying said pinion, a ratchet wheel secured upon said axle, and a pawl held in gear with said ratchet by a spring and suitably actuated with each motion of one of the type-bars, substantially as set forth. 10th. In a type-writer, the combination of bearing plates D, supporting ribbon reels E, upon vertical spindles adapted to run loose or fast on the latter at will, stationary ribbon guides on said plates adapted to conduct the ribbon from one reel to the other, ribbon guides E², upon a rocking axle e², provided with a crank e⁴, and said axle journaled in the tines of a fork held by the carriage, arms e⁵ on said fork extending over the platen and preventing the ribbon touching it, a pitman S², pivoted to the crank e⁴, and actuated by a lever moving in unison with the type bars and adapted to deflect the ribbon over the platen ready to be struck by the type, substantially as set forth. 11th. In a type-writer, the combination of a base plate, standards thereon, angle sectioned brackets D², secured to said standards, a guide rail secured slidably to said brackets, a plate F², having its front end secured to the bottom and centre of said rail, a brace F¹¹¹, secured to the rear of said plate, and having the front end of each of its two arms secured to said rail nearer to the ends and overlapping the

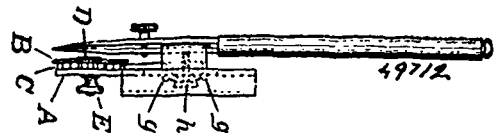
limb of the bracket D⁵, a tail piece secured to said plate F⁴, nuts on said tail piece and a bracket or standard on the base in which said tail-piece slides, substantially as set forth. 12th. In a type-writer, the combination of the brackets D⁵ rigidly secured and of angle shaped cross-section, a guide rail F⁴, notched upon said brackets so as to slide in the direction of the latter, keepers F¹¹, secured to said rail and overlapping the limbs of said brackets at the notches, a friction bowl F¹ in one of the notches and bearing against the edge of said limb and friction bowls F¹¹, pivoted to said rail and bearing on the top of the bracket, substantially as set forth. 13th. In a type writer, the combination of a base A, standards D⁵ secured thereon, brackets D⁵ secured to said standards, a guide rail F⁴ adapted to slide on said brackets and in their direction, a plate F⁶ secured to the centre of said rail and projecting rearwardly, a downwardly projecting lug f⁷ on said plate, a tail piece on said plate supported slidingly in a bracket secured to the base, a pitman pivoted to said lug and to a crank, a rocking shaft G⁷, having crank g⁸ to which said pitman is connected, said shaft adapted to be rocked forward or backward when desired, substantially as set forth. 14th. In a type writer, the combination of a base, two shifter key bars G⁷ pivoted near the rear of said base and provided with a diverging cam slots g¹, a crank pin g⁶ engaging the mouths of said slots, and connecting two cranks g⁷, secured upon a rocking shaft G⁷ journaled upon the base, substantially as set forth. 15th. In a type writer, the combination of a base two shifter key bars G⁷ pivoted near the rear of said base and provided with diverging cam slots adapted to operate a rocking shaft by cranks, posts G¹¹ secured to the base having springs coiled upon them and provided with slots through which the key bars pass and rest upon said springs, substantially as set forth. 16th. In a type-writer, the combination of a base, a shifter key bar G⁷ pivoted upon said base and provided with an oblique slot engaging a crank pin, a guide G¹¹, a supporting spring G¹¹ coiled upon said guide, a cushioned stop G⁷ secured to the base at a suitable elevation against which the spring G¹¹ presses the upper edge of said bar and a locking latch G⁷ pivoted to move at a right angle to said key and overlapping its upper edge when down with a shoulder, substantially as set forth. 17th. In a type-writer, the combination of a base, two shifter keys G⁷ pivoted upon it, a lug g¹¹ secured upon each of said keys one bearing on the front and the other on the rear of the guide rail F when said keys are not depressed, a guide post G¹¹ with spring for each bar, diverging slots in said bars, a rocking shaft having a double crank connected by a pin engaging said slots, a crank at the other end of said shaft, a pitman pivoted to said crank, a plate F⁶, having a lug f⁷ to which the other end of said pitman is pivoted slidingly supported at one end by a tail piece and secured to the guide rail at the other and the guide rail F to which said plate is secured and which abuts against the stops g¹¹ on the key bars, and the brackets D⁵ upon which said rail is slidingly secured, substantially as set forth. 18th. In a type-writer, the combination of the guide rail F having the grooves f and f', a rack plate H¹, a channel rail H² secured to said rack, friction rollers h journaled in said channel and adapted to run in the top groove f of the rail F, a side plate H¹ secured to the rear web of said channel rail having its lower edge below the edge of the web and portions of it turned up at a right angle to form lugs or runners h' adapted to slide in the said groove f, substantially as set forth. 19th. In a type-writer, the combination of the carriage bed F, F¹¹, F⁴, F⁶ and F⁷ having grooves a, and f', and friction roller P⁵, and lug f', with the channel rail H², having friction rollers h, and slide plate H¹, having runners h', top plate H¹¹, bottom plate H², back rail H³ and end plates H⁴, forming the frame of the carriage, substantially as set forth. 20th. In a type-writer carriage, the combination of the rack plate H¹, curved top plate H¹¹, curved bottom plate H², back rail H³, and the end plates H⁴, to which all the former are secured, slots h², in said plates, an axle I¹¹, journaled in said ends towards the rear end provided with a hand crank outside said ends, cranks secured to said axle inside said ends, links pivoted to said cranks and journaled at the other end upon the platen axle, a platen I, fast upon an axle passing through the slots in the ends and through the slots in the ends and through the said links, substantially as set forth. 21st. In a type-writer carriage, the combination of a rack H¹, top plate H¹¹, bottom plate H², back rail H³, and the end H⁴, to which all the former are secured, platen I, upon an axle I¹, journaled in said ends, a shaft H⁷, journaled in said ends and connected thereto by a spring and having spring arms bearing against said plate and pressing it towards the platen, substantially as set forth. 22nd. In a type-writer carriage, the combination of the end plates H⁴, having secured to them a rack H¹, and bottom plate H², all secured to said ends and the latter secured at its rear portion and its front portion curved forward and upward and free to feather and provided with a scale h³, a rod H⁵, secured to said plate below said scale and having rollers h³, journaled upon it which project through slots in said plate and adapted to bear on the platen and a platen I, secured upon an axle I¹, journaled in said ends, substantially as set forth. 23rd. In a type-writer carriage, the combination of the end plates H⁴, rack H¹, back rail H³, bottom plate H², and top plate H¹¹, all rigidly secured to said ends and an axle H⁷, journaled in said ends at the top and near the rear and above and near the front edge of the top plate and connected to the ends by a spring and provided with arms h², adapted to bear upon the platen and a platen I, upon an axle I¹, journaled in said ends, substantially as set forth. 24th. In a

type writer carriage, the combination of end plates connected by a rack, back rail, bottom plate and top plate, an axle I¹¹, with hand crank outside said ends and cranks inside said ends, links pivoted to said cranks, a platen axle I¹, journaled in said links and passing through slots in said ends and provided with a button b¹, at one end, an extension I¹¹, of said axle in which the axle I¹, is journaled at the other end, a clutch centered spur wheel J, mounted upon said end of the axle, a slotted guide arm K, journaled upon said axle between the end plate H⁴, and the spur wheel and engaging said end plate by a pin adapted to slide in said slot and a return end K, of said guide arm secured upon the extension I¹¹, substantially for the purposes specified. 25th. In a type-writer carriage, the combination of the end plates H⁴ suitably connected, a platen I journaled therein by an axle I¹, an extension I² of said axle in which one end is journaled, a clutch centered spur wheel mounted upon said axle, a slotted guide arm K journaled upon said axle near the end plate and the slotted end of same engaged by a pin on said plate and the return end K² secured upon said extension, a spring detent K² secured to the free end of said guide arm and carrying a friction bowl engaging said spur wheel, a clamp latch K¹ pivoted to said arm K¹ and engaging said detent and provided with spring clamp k¹ and thumb piece k², substantially as set forth. 26th. In a type-writer carriage, the combination of the end plates H⁴ suitably connected, a platen I fast upon an axle I¹ journaled in said ends, a clutch centered spur wheel J mounted upon one end projecting from said plate, an extension I² with button b¹ in which said end of the platen axle is journaled, a slotted guide arm K journaled upon said axle between said end plate and the spur wheel and having its slotted end guided on said end plate by a pin engaging its slot and the return K² of said arm secured upon said extension, a pendant latch L having a long hub journaled upon said extension and abutting against a substantial shoulder or collar, a spring coiled upon said hub and engaging the arm K¹ tending to swing said latch rearwardly, a pawl L² pivoted to said latch L at its inner face and near the periphery of the wheel J and having a forwardly extended arm adapted to engage said wheel and a downwardly extending arm provided at its lower edge with a friction bowl L², substantially as set forth. 27th. In a type-writer carriage, the combination of the platen axle journaled in end plates suitably connected, a double arm K K² having one part journaled upon said axle and the other secured upon said extension and held slidingly on the end plate, a clutch centered spur wheel secured upon said axle, a pendant latch L having a long hub journaled upon said extension and against a collar or shoulder on same, a latch L² pivoted to the arm K¹ and adapted to abut against the latch L in different positions, a pawl L² pivoted to the latch L near to the periphery of the spur wheel and having an arm projecting forwardly carrying a pin adapted to engage said wheel and an arm projecting downward and rearward and carrying a friction bowl L² and being limited to said latch by a notch b¹ engaging a pin b¹ on the latch, substantially as set forth. 28th. In a type-writer carriage, the combination of the end plates connected by a rack and other parts, a channel bar secured to said rack, a side plate secured to said channel and provided with side lugs, a rod l² adapted to slide in said lugs, a bevelled head L² on said rod projecting through one of the ends and bearing against the bowl L², a spring L² coiled upon said rod and secured to a collar fast upon said rod and retracting said head after having been projected, an axle pivoted in said end plates and carrying a platen, an extension of said axle in which the end of the axle is journaled, a pendant latch L journaled upon said extension by a long hub l, a pawl L² pivoted to said latch carrying the bowl L² and a pin p¹ adapted to engage the teeth of a spur wheel, a spur wheel mounted upon the axle I¹, substantially as set forth. 29th. In a type-writer, the combination of a guide rail F having grooves f and f' and suitably secured, a carriage having a rack H¹ secured to end plates H⁴, a channel bar H² secured to said rack and provided with rollers h running in the groove f, a side plate H¹ secured to said channel bar and having runners h¹ running in said groove f, lugs h² on side plate, a slide rod l² running on said lugs and having a bevelled head L² projecting through the end plate, a spring L² coiled upon said rod and secured thereto by a collar between the lugs h², perforations in the right hand end of said guide rail, a three sided box N encircling said rail, a pivoted latch N¹ on the open side of said box, a spring n¹ on the inner face of said latch and bearing in the groove f, a pin on said latch adapted to engage one of the perforations in the guide rail, a lug n¹ projecting from the latch N¹ and having its upper edge hollowed out to form a passage for the rod l², and a thumb latch N¹ pivoted in said lug and adapted to open or stop the passage in the upper edge, substantially as set forth. 30th. In the marginal stop of a type-writer, the combination with the guide rail F having a side groove f' and perforations or notches near one end, a three sided box N adapted to slide on said rail, a latch N¹ adapted to swing horizontally on said box and from the fourth side thereof, a spring n¹ secured to the inner face of said latch and bearing in the groove f, a pin on the inner face of said latch adapted to engage one of the notches in said guide rail, a lug n¹ on the pivoted end of said latch having its upper edge concave, and a thumb-latch N¹ pivoted in said lug and adapted to clear or stop said concave edge, substantially as set forth. 31st. In a type-writer, the combination of a rack H¹ secured to end plate H⁴, a narrow release plate H¹ pivoted above the rack in the end plates of the carriage on an axis allowing its lower part to swing, a bell crank lever R¹ pivoted to the top of the rack and adapted to bear on the lower part

of said plate with one arm, and a rod R pivoted to the other arm and passing through one of the end plates and provided at the end with a button r, substantially as set forth. 32nd. In a type-writer, the combination of a guide rail F slidingly bedded, a bed plate F^o secured to said rail and provided with a tail piece slidingly supported and having its forward part secured to the underside of said rail and provided with a bifurcated end f^o projecting forward, a bracket Q^o secured to and extended down from said bed plate and having a foot q^o projecting forward, a vertical shaft Q stepped upon said foot, a journal Q¹¹ at the upper end under said bifurcated end f^o and sliding in said bifurcation, a spring Q¹ secured to said journal and to the bracket Q^o and drawing the upper end of said shaft towards said bracket, substantially as set forth. 33rd. In a type-writer, the combination of a guide rail F slidingly bedded, a bed plate F^o secured to said rail, and provided with tail piece slidingly supported and having a forward projecting bifurcated end f^o, a carriage adapted to slide upon said rail and having a rack H¹¹, a bracket Q^o secured to said bed plate and having a forward projecting foot q^o, a vertical shaft Q stepped upon said foot and held at the upper end in a journal adapted to slide in the bracket end f^o, a spring Q¹ secured to said journal and bracket and drawing said shaft towards said bracket, an escape wheel Q¹ fast upon the lower end of the shaft, a pinion Q¹¹ fast upon the upper end of said shaft above the bracket end f^o, and gearing in the rack H¹¹, and a disc Q² journaled upon said shaft above said pinion and adapted to have the release plate R¹¹ bearing against its edge and disengage it from said rack, substantially as set forth. 34th. In a type-writer, the combination of the carriage bed having a bed plate F^o with forward projecting bifurcated end f^o, and depending bracket Q^o secured to said bed plate and having a forward projecting foot q^o, a vertical shaft Q stepped upon said foot, an escape wheel Q¹ fast upon the lower end of said shaft, a spring detent Q² pivoted on a vertical axis at the rear of the bracket Q^o and adapted to engage the escape wheel, a branch q^s at the rear of said bracket Q^o, a lever S pivoted in said branch engaging at its rear end a link on the presser bar, a head on said lever having a mouth 14 formed by an outside forward lip s² and two outside rearward lugs or lips s¹ and s¹¹, a spring actuated notched latch or tongue S¹ pivoted at the bottom of said mouth and adapted to be thrown by the spring against the forward lip s², and to abut against the lip s¹, in line with the lip s¹¹, substantially as set forth. 35th. In an escapement lever having an up and down motion, the combination in the head of a forward lip s², an upper rear lip s¹, a lower rear lip s¹¹, below the lip s¹, but the thickness of the latch plate more forward, two lugs at the bottom, a latch or tongue S¹ pivoted in said lugs, and having a notch s³, adapted to pass the lip s¹¹, and a spring s^o coiled upon the pivot of the latch, and adapted to throw the same against the lip s², said latch when abutting on the lip s¹, forming a straight line with the lip s¹¹, standing in the notch s³, substantially as set forth. 36th. In a type-writer, the combination with an escapement lever S adapted to be operated by a presser bar, of an extension S¹ secured thereto and projecting forward, a pitman S² pivoted to said extension, a ribbon guide E³ journaled in the tines of a fork E², and having a crank e⁴ to which said extension is pivoted at the upper end, a bracket F¹ is secured to the carriage bed and having an extension f¹, and the ribbon fork E² secured to said extension f¹, substantially as set forth. 37th. In a type-writer, the combination of a base A, having a vertical tubular journal M¹¹, a spindle M¹ journaled therein, a drum M journaled upon said spindle, a spring M¹ wound in said drum upon said spindle and connecting said drum and spindle, a rat-het-wheel and milled head m¹¹ fast on said spindle, a double ratchet M² pivoted to the base and engaging said ratchet wheel, a tongue secured to said drum and adapted to be hooked to the carriage, substantially as set forth. 38th. In a type-writer, the combination with the base A of spacing key bars O connected by a bore o, a spring actuated axle O¹ journaled to the underside of the base and having said key bars secured upon it, stops O¹¹ under said key board a cushioned stop O² over said bars and a cross bar o¹¹ connecting said bars and adapted to engage hooks, substantially as set forth. 39th. In a type-writer, the combination of a base A, a spring actuated axle P¹¹ journaled in brackets secured to said base, levers P² secured to the ends of said axle, a presser bar P secured to the other ends of said levers and adapted to be depressed by the key bars P² connecting said axle, and presser bar and hooks P¹¹ pivoted to said connecting bars and adapted to be engaged by the cross-bar of the spacing bars, substantially as set forth. 40th. In a type-writer, the combination of a presser bar P secured to levers fast upon a spring actuated axle and connected thereto by intermediate bars P⁴ adapted to be drawn down by the spacing keys by means of hooks P¹¹, and said presser bar placed under the type key bars and adapted to be depressed by them a link p secured to said presser bar and having a slot adapted to be engaged by a pin on the escapement lever, substantially as set forth. 41st. In a type-writer, the combination of a presser bar P secured to levers fast upon a spring actuated axle secured to the base and adapted to be depressed by the type key bars, levers P² journaled to extensions of the standards D⁴ engaging the ends of the presser bars and the pawl E² pivoted to the forward ends of said levers, substantially as set forth. 42nd. In a type-writer, the combination of a base A, a standard or bracket F² secured thereto, a bell secured to said standard or bracket, a bracket T¹ secured to said base adjacent to said bell, a hammer T¹¹ having its shank t¹¹ extended to form a cross shank t¹ which is journaled in said bracket and having secured

thereto an upwardly projecting cam t¹, substantially as set forth. 43rd. In a type-writer, the combination of a carriage suitably bedded to travel forward and backward and provided with a back rail H², a clasp T² adapted to be clamped upon said back rail by its downward extending sides, a binding screw T² with milled head T² clamping said clasp, and a tilt latch T¹ pivoted upon said screw shank between the plates of the clasp and adapted to deflect the hammer of a signal bell when moving in one direction, substantially as set forth. 44th. In a type-writer, the combination of a base A having standards with brackets, a carriage bed held slidingly upon and in said brackets, a carriage held slidingly upon said bed and having a back rail H², a clasp upon said rail, a tilt latch T¹ pivoted in said clasp, type key bars B pivoted at the rear upon said base, a presser bar P under said key bars held by levers secured upon a spring actuated axle and adapted to be depressed by any one of said key bars, a stop U having upturned ends u pivoted to said base under said presser bar and provided with lever lug u¹, a rod U¹ pivoted to said lug, a vertical rod U² journaled in said base and actuated by a spring to keep said stop inclined and out of the way of the presser bar and having a lower horizontal arm u¹ to which said rod is pivoted and an upper horizontal arm u² standing at right angle to the back rail H² and adapted to be deflected by the latch T¹, substantially as set forth. 45th. In a type-writer, the combination of a base A, a vertical rod U¹ journaled in said base and having a horizontal arm u¹ at the lower end of another arm u² at the upper end at a right angle to each other, a spring U² tending to turn said rod, a connecting rod U³ pivoted to the lower arm, and the stop U pivoted upon said base and having bent up ends u and a downward projecting lug u¹ to which said connecting rod is pivoted, substantially as set forth.

No. 49,712. Instrument for Making Broken Lines.
(Instrument pour faire les lignes rompues.)



James Harner Knight, Philadelphia, Pennsylvania, U.S.A., 21st August, 1895; 6 years.

Claim.—1st. A broken line device for drawing instruments, having a contact roller or wheel and a separate and detachable tripping or actuating wheel, a movable carrier or piece actuated by the said wheel, and a clamp, substantially as and for the purpose set forth. 2nd. As an improvement in an instrument for making broken lines and in combination with the other operating parts, a contact roller or wheel, a tripping wheel driven thereby, a movable carrier piece, or jigger, actuated by the said tripping wheel, and a marking instrument moving with the said carrier piece, or jigger, substantially as set forth. 3rd. As an improvement in an instrument for making broken lines, a contact roller or wheel having a continuous and preferably milled contact edge, a tripping or actuating wheel and a carrier provided with a tongue co-operating with the said tripping wheel for giving broken line motion to the pen, pencil, or other marking instrument, substantially as and for the purposes set forth. 4th. The combination of a suitable mechanism for producing a vertical reciprocating motion and actuated by contact with the paper through a roller or contact wheel, with a pen, pencil, or other marking instrument operating directly at the side of the said roller or contact wheel, substantially as and for the purposes set forth. 5th. In an instrument for making broken lines, in combination, a sliding carrier, means for securing a pen, pencil or other marking instrument, and a tripping or actuating wheel engaging with a dog or tongue on the carrier, substantially as and for the purposes set forth. 6th. In an instrument for making broken lines, a tripping or actuating wheel provided with projections or teeth, in combination with a sliding carrier having a tongue actuated by gravity against the said tripping or actuating wheel, substantially as and for the purposes set forth.

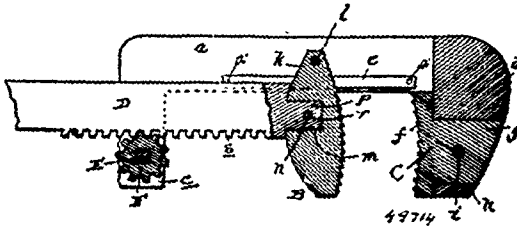
No. 49,713. Process of Making Paper Pulp Boards.
Procédé pour faire des planches de pâte à papier.

William Norris Cornell, Brownville, New York, U.S.A., 21st August, 1895; 6 years.

Claim.—1st. An improved process of making paper pulp board in imitation of natural wood, which consists in winding convolutionally on a paper machine, a pulp board of less than the desired thickness, then in adding a separate piece or pieces of pulp to the partially finished pulp board and finally in finishing the winding of the pulp board to the desired thickness, whereby said separate piece or pieces of pulp cause the pulp board to slip and wrinkle on the forming roll, substantially as set forth. 2nd. An improved process of making pulp board in imitation of natural wood, which consists in winding convolutionally on a paper machine, a pulp board of less than the desired thickness, then in adding to the partially finished pulp board a separate piece or pieces of pulp of greater density or drier, and of another colour than the pulp board and finally in finishing the winding of the pulp board to the desired thickness,

whereby the said separate piece or pieces of pulp cause the pulp board to slip and wrinkle on the forming roll, substantially as set forth. 3rd. An improved process of making pulp board in imitation of natural wood, which consists in winding convolutionally on a paper machine, a pulp board of less than the desired thickness, then in adding to the partially finished pulp board a separate piece or pieces of pulp of greater density or drier, and of a darker colour than the pulp board, then in finishing the winding of the pulp board to the desired thickness whereby said separate piece or pieces of pulp cause the pulp board to slip and wrinkle on the forming roll then in removing the pulp board from the machine and finally in drying, sand papering, and finishing pulp board, substantially as set forth.

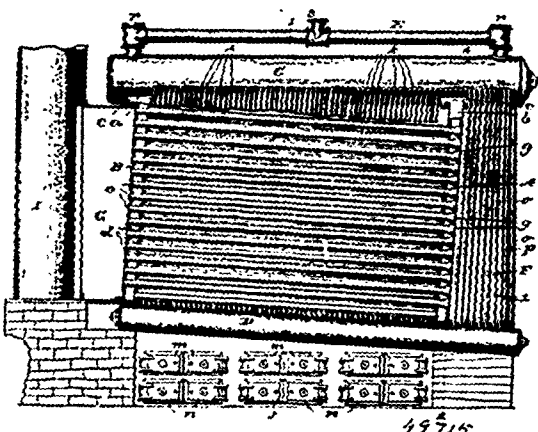
No. 49,714. Wrench. (Clé à écrou.)



Karl August Klose, Richfield Centre, Minnesota, U.S.A., 21st August, 1895; 6 years.

Claim.—1st. The adjustable pipe wrench, comprising the frame having the two parallel branches, provided on their inner sides with parallel slide bearings, and also having the seat for a removable jaw at one end and depending parallel branches at the opposite end, in combination with the slidable jaw, having the head constructed to slide below the under side of said parallel branches, and having the ear or projection carrying the stud or cross pin, the detachable handle having the rack teeth, a pinion engaging said teeth, and a suitable means for fixing the position of the pinion, substantially as specified. 2nd. A pipe wrench, comprising a frame, having a seat for a removable jaw, and also having arms or bearings for a transverse shaft, in combination with a transverse shaft, a pinion on the shaft, and a ratchet-wheel also on the shaft, a spring-backed dog for engaging the ratchet-wheel, and a slidable jaw having a handle provided with teeth for engaging the pinion, substantially as specified.

No. 49,715. Steam Generator. (Générateur de vapeur.)



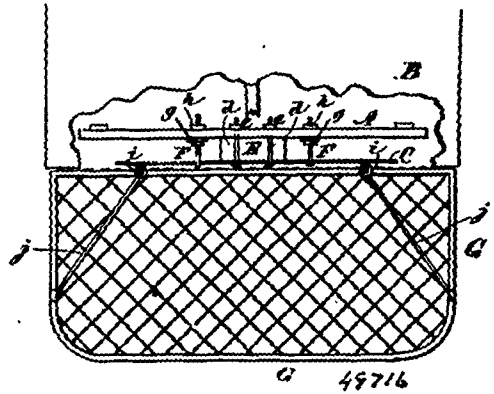
Samuel E. Light, Lebanon, Pennsylvania, U.S.A., 21st August, 1895; 6 years.

Claim.—1st. In a steam generator, continuous and seamless headers the height and width of the generator, provided with contracted necks at their upper ends and with holes or openings in their inner and outer walls, in combination with concentric water and fire tubes, the latter expanded across one of the headers from the inner to the outer wall to the diameter of the water tubes. 2nd. In a steam generator a header provided with tube openings of the same diameter in its inner and outer walls in combination with concentric water and fire tubes, the latter of less diameter than the former and expanded across the header from the inner to the outer wall and to the diameter of the water tube. 3rd. In a steam generator, front and rear headers connected by longitudinal tubes, in combination with a steam drum or separator, water drums on each side of the generator and at the lower end thereof and vertical water tubes arranged in tiers on each side of the generator from the front end of the front uptake to rear header and connecting the steam drum to the water 4th. In a steam generator, a steam drum, and water drums on each

side of the generator, tubes connecting said drums and arranged in two tiers one overlapping the other, in combination with a coating of refractory material applied to and supported by the outer tier of pipes.

No. 49,716. Car Fender Attachment.

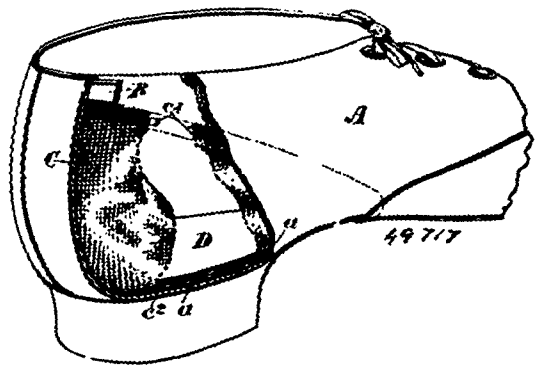
(Attache de défense de chars.)



Benjamin Ernest Charlton, Hamilton, Ontario, Canada, 21st August, 1895; 6 years.

Claim.—1st. In combination with a street car and street car fender, an adjustable spring bar interposed between the fender and the front car beams to support and provide a flexible resistance to a fender or life guard attached to the front of a car, when the fender meets with resistance or strikes an object, all constructed substantially as described. 2nd. In combination with a street car and street car fender, or life guard, the adjustable spring bar C, attached to the bar A by clamps d, d, and adjustable screws F, F, and nuts g, h, all constructed and arranged substantially as and for the purpose specified. 3rd. In combination with a street car and street car fender, or life guard, the adjustable spring bar C attached to the bar A in front of a car, or to its equivalent, substantially as and for the purpose described.

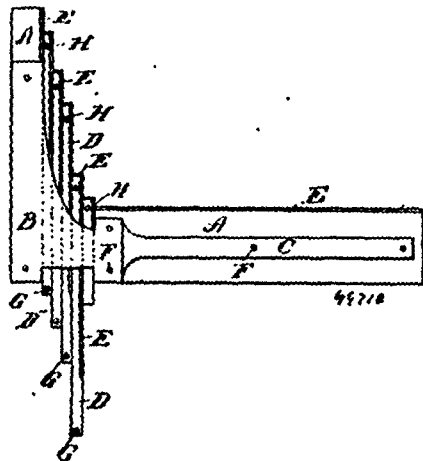
No. 49,717. Boot and Shoe. (Chaussure.)



James Ferguson Sharpe, Toronto, Ontario, Canada, 21st August 1895; 6 years.

Claim.—1st. The combination with the heel portion and lining of a shoe, of an open work spring and elastic material counter inserted between the leather and the lining as and for the purpose specified. 2nd. The combination with the heel portion, outer leather and the lining of a shoe, of a woven spring wire cloth counter inserted between the outer leather and the lining and having the upper edge of the counter turned over flat against the major portion of the counter as and for the purpose specified. 3rd. The combination with the heel portion, outer leather and the lining of a shoe, of a woven spring wire cloth counter inserted between the outer leather and the lining and having the upper edge of the counter turned over flat against the major portion of the counter and a steel ribbon stiffener through the turned over portion as and for the purpose specified. 4th. The combination with the outer leather having the inwardly turned lower portion c, the lining having the inwardly turned portion b, the spring elastic woven wire having the inwardly turned portion c', the whole being suitably stitched together and inserted between the sole D and heel E as and for the purpose specified. 5th. The combination with the top portion of a shoe and lining thereof, of a tip of an open work spring and elastic material inserted between the leather and the lining as and for the purpose specified.

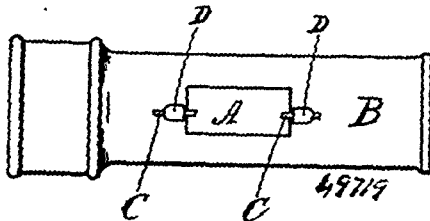
No. 49,718. Reversible Paper Cutter. (Coupe-papier.)



Laura C. Peters, New Orleans, Louisiana, U.S.A., 21st August, 1895; 6 years.

Claim.—The herein described paper cutter provided with five or more slides for cutting checks, coupons, receipts, or other documents at different angles, said slides being held in position by a plate attached to an arm which is also used for cutting paper as set forth.

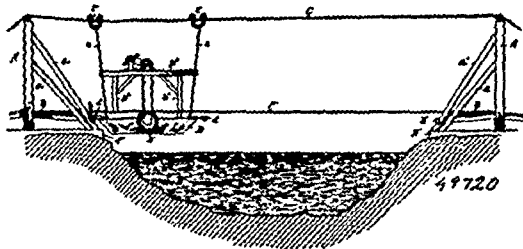
No. 49,719. Sewer Pipe, etc. (Tuyau d'égouts, etc.)



Moïse Courtemanche, Montréal, Québec, Canada, 22 août, 1895; 6 ans.

Résumé.—Une feuille de tuyau formée de deux parties séparées A et B pouvant être fixées solidement ensemble au moyen de coins C, entrant dans les projections D, de la partie B, le tout tel que décrit et pour les fins indiquées.

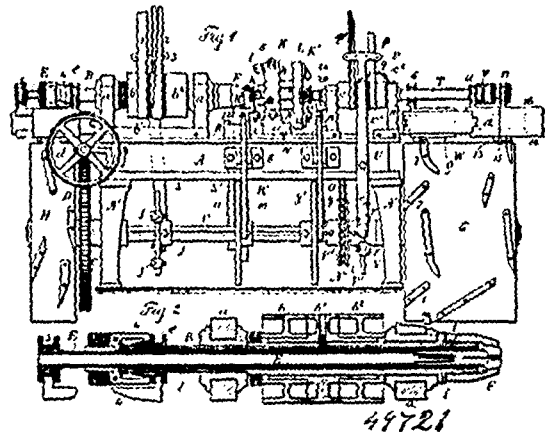
No. 49,720. Aerial Tramway. (Tramway aérien.)



Levi Johnson, Omaha City, Nebraska, U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. In an aerial tramway, the combination, of the supporting posts A A, having cables which extend parallel with each other from post to post, operating cables or flexible connections also extending from the supporting posts and secured thereto so as to be of less distance apart than the supporting cables, together with a car having supporting rods which extend from pulleys mounted on the supporting cables and converging therefrom to the car to which they are connected, and pulleys carried by the car around which the operating cables or flexible connections pass, substantially as shown and for the purpose set forth. 2nd. In combination with the supporting posts having cables C C, and drums over which pass cables F F, of a car D having supporting rods e e, connected to pulleys E E, which travel upon the cables C C, pulleys D', carried by the side pieces of the car, said pulleys being adapted to be rotated in unison, the cables F being passed around said pulleys, together with hooks d d, pivoted to the car and cross-pieces B' secured to the supporting posts, substantially as shown and for the purpose set forth.

No. 49,721. Machine for making screws. (Machine pour faire les vis.)



Christopher Miner Spencer, Wind-or, Connecticut, U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. The combination with the main spindle and the turret for holding tools and means for turning such turret progressively, of a secondary spindle in line with the main spindle, a chuck for receiving the article from the main spindle and means for giving to the secondary spindle the required movements, substantially as set forth. 2nd. The combination with the main spindle and the turret for holding tools and means for turning such turret progressively, of a secondary spindle in line with the main spindle, a chuck for receiving the article from the main spindle and means for giving to the secondary spindle the required movements, a secondary turret moving with the main turret and adapted to receive tools for acting upon the article presented to them by the secondary spindle, substantially as set forth. 3rd. The combination in a machine for making screws and other articles, of two spindles in line with each other and provided with chucks, one spindle being hollow and adapted to receive through it the rod or wire to be acted upon, a turret head for carrying the tools made use of, a stop projecting from the periphery of the turret head and a stationary arrester for the stop, means for rotating the turret progressively and for giving end motion to such turret to clear the stop from the arrester, substantially as set forth. 4th. The combination with two spindles in line with each other and having chucks at their adjacent ends, of two turrets a shaft upon which one turret is secured and means for giving end motion to such turret, a tube around the shaft and a secondary turret carried by such tube, means for rotating the tube and its turret and a connection from the same to rotate the shaft and the main turret, substantially as set forth. 5th. The combination with the main spindle, of a turret a shaft for supporting the same, means for giving end motion to the shaft, a sprocket-wheel and chain and a driving sprocket frictionally connected with its driving shaft and stops on the turret and an arrester whereby the friction applied to the chain-wheel holds the stop against the arrester during the action of the tool upon the turret, substantially as set forth. 6th. The combination with the turret for holding tools and its shaft, means for rotating the same and for giving an end movement to the shaft, of a main spindle and its chuck, mechanism for rotating the same and for feeding the wire or rod through the chuck progressively, a secondary spindle in line with the main spindle, means for giving an end movement to the secondary spindle, a tight pulley and loose pulleys at the opposite sides of the tight pulley, a straight and cross belt, a belt shifter, a cam shaft and cams for actuating the belt shifter for rotating the secondary spindle in either direction or allowing it to remain quiescent while the tools are acting upon the article carried by such secondary spindle, substantially as set forth. 7th. The combination with a turret for holding tools and its shaft, means for rotating the same and for giving end movement to the shaft, of a main spindle and its chuck, mechanism for rotating the same and for feeding the wire or rod through the chuck progressively, a secondary spindle in line with the main spindle, means for giving an end movement to the secondary spindle, a tight pulley and loose pulleys at the opposite sides of the tight pulley, a straight and cross belt, a belt shifter, a cam shaft and cams for actuating the belt shifter for rotating the secondary spindle in either direction or allowing it to remain quiescent while the tools are acting upon the article carried by such secondary spindle, and a friction pad for arresting the movement of the tight pulley when the belts are out of contact with the same, substantially as set forth. 8th. The tubular secondary spindle and its bearings or supports in combination with a tight pulley having a screw or key entering a longitudinal groove in the tubular spindle, loose pulleys at opposite sides of the tight pulley and between the bearings for the spindle, means for giving an end motion to the secondary spindle, a chuck at the end of the secondary spindle, a rod within the spindle and means for actuating

the same to open and close the chuck and a turret head and means for revolving the same progressively to bring the tools held by such turret into position for acting upon the article carried by the chuck of the secondary spindle, substantially as set forth. 9th. The combination with a spindle having a chuck and means for rotating the spindle and for giving to the same a longitudinal movement, of a turret, means for rotating the same progressively, a circular saw and its shaft carried by such turret, a pulley around the axis of the turret and bevel gear connecting the pulley and the shaft of the circular saw, substantially as set forth.

No. 49,722. Stock for Screw Cutting Dies.

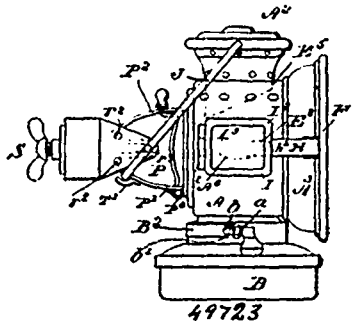
(*Filière mécanique.*)



John J. Harrison, Excelsior, Minnesota, U.S.A., 22nd August, 1895; 6 years.

Claim.—The combination, with screw-cutting dies, of a stock carried by one of two handles the other of which spans the stock and is detachably connected thereto by set-screws, and ratchet-and-dog device connecting the permanent handle with the dies, substantially as set forth.

No. 49,723. Lamp. (Lampe.)



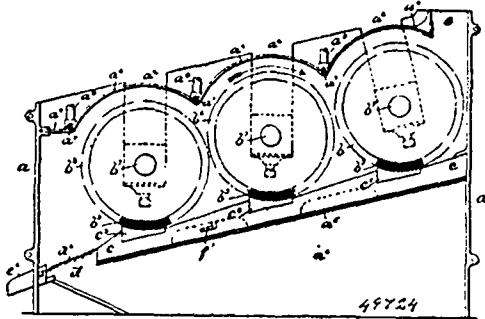
Lewis Fulton Betts, Brooklyn, New York, U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. In a lamp, the combination of a casing having a side opening and a shield for said opening, held at a distance from the casing, with a reflector within said casing having a side opening to serve with said opening in the lamp casing, and means to permit air to enter said casing and to surround said reflector, substantially as set forth. 2nd. In a lamp, the combination of a casing having a side opening, and a shield therefor held at a distance from the outer wall of said casing, but in line with said opening, to permit air to circulate between said casing and said shield, with a reflector within said casing having a side opening to correspond with the opening in the casing, means to permit air to enter said casing and surround said reflector, and perforations in the back of said casing for the passage of air, substantially as set forth. 3rd. In a lamp, the combination of a casing having a side opening and a shield therefor, with a reflector within said casing having a side opening to correspond with said opening in the casing, means to permit air to enter said casing and surround said reflector, and perforations in the back of said casing for the passage of air, substantially as set forth. 4th. In a lamp, the combination of a casing having suitable air outlets, with a reflector within said casing having apertures E^1 , E^2 , means to permit air to enter said casing at the forward portion of said reflector around the latter, a ring located at the forward portion of the casing and adapted to direct air back of said reflector and forming part of the means to permit air to enter the casing, and a transparent protector between said apertures and said reflector, substantially as set forth. 5th. In a lamp, the combination of a casing having air outlets and an aperture A^1 at one side thereof, and a shield carried by said casing in line with the aperture A^1 , and arranged to form a space between the casing and said shield, with a reflector having apertures E^1 , E^2 , and an apertures at one side to correspond to the apertures A^1 in the side of the casing, means to permit air to pass into the casing from the forward portion of said reflector so as to surround the latter, a ring F adapted to be connected with the forward portion of said casing and to lead to said reflector, a transparent protector carried by said ring, the arrangement being such that air can enter said casing through the ring and pass back of and surround the contained reflector, substantially as set forth. 6th. In a lamp, the combination of a casing having

apertures for the exit of air, a side aperture A^1 , a window or door hinged to said casing so as to extend across the opening A^1 , and means to hold said window or door at a distance from said casing to permit the circulation of air between said door and casing, with a reflector having apertures E^1 , E^2 , and a side aperture E^3 , to correspond with the aperture A^1 in the casing, a transparent protector at or near the forward portion of said reflector and a ring having apertures, the latter being located in front of said protector, the parts being arranged so as to permit air to enter said apertures and to pass into said casing around said reflector, substantially as set forth. 7th. In a lamp the combination of a casing having air-outlet apertures, a side aperture A^1 and a shield for said aperture, arranged to permit air to circulate across said aperture, with a reflector having lugs at its forward edge to provide spaces between said reflector and said casing for the passage of air, said reflector having an aperture E^3 to correspond with the aperture A^1 in the casing, a ring F having apertures leading into said casing, and a protector located between the apertures in said ring and the main portion of the reflector, substantially as set forth. 8th. In a lamp the combination of a casing having air-outlet apertures, a side aperture A^1 and a shield for said opening, arranged substantially as set forth, with a reflector carried within said casing, and adapted to permit air to pass around it into the said casing, a ring F located at the flaring mouth of said casing and having a curled edge f adapted to receive the flaring mouth of said casing, and a transparent protector, said ring having apertures located forward of said protector to permit air to pass into the casing back of the reflector, and a spring arm H having a curved end to take under the curl of said ring, said spring arm being carried by said casing, substantially as set forth. 9th. In a lamp a casing having air-outlets and a side opening A^1 , a transparent window carried by the casing at a distance from said opening, so as to permit the circulation of air past said opening, with a reflector having an opening corresponding to the opening in the casing, and means to permit air to enter said casing in advance of said reflector so as to pass around the latter, substantially as herein specified. 10th. In a lamp the combination of a casing having air-outlet openings, and a side opening A^1 , a window I consisting of a framing I^1 hinged to the casing and carrying the transparent protector I^2 , said frame having a projection i^2 , which with the hinge serves to hold the window at a distance from the side of the casing, with a reflector within said casing having a side opening E^3 to correspond with the opening A^1 in the casing, and also having openings E^1 , E^2 , with means to permit air to enter said casing in advance of said reflector so as to pass around the same within the casing, substantially as set forth. 11th. The combination of a casing having a flaring mouth A^2 and a side opening A^1 , with a window or shield covering said opening adapted to permit circulation of air past said opening, a reflector within said casing having openings E^1 , E^2 , and a side opening E^3 , to correspond with the opening A^1 in the casing, a ring F having a curled edge to engage the edge of the flaring mouth of the casing, a transparent protector carried by said ring and located at or near the forward end of the reflector, said ring having apertures forward of said protector, a spring arm H carried by the casing and having a curved end to take under the curl of the ring F , and a bar k to hold the free edge of said window, substantially as set forth. 12th. The combination of a casing having perforations at its top, a flaring mouth A^2 at one side, said casing having perforations on the side directly opposite said flaring mouth, said casing also having openings A^1 on opposite sides, shields or windows over said openings held at a distance from said casing to permit the circulation of air past said opening between said windows or shields and said casing, with a reflector carried within said casing and having openings E^1 , E^2 , at the bottom and top thereof, side openings E^3 adapted to substantially align with the openings A^1 in the casing, said reflector having means at its forward portion to permit air to pass between it and the casing, a cone-like ring F , adapted to lap the forward edges of said reflector, said ring having apertures forward of the transparent protector adapted to permit air to pass into the casing and between it and the reflector, and means for removably holding the ring F upon the casing, substantially as set forth. 13th. The combination of a spring having two outwardly extending arms adapted to be attached to a lamp, the central portion of said spring being doubled upon itself in substantially W -form, with a clip having two parallel arms to enclose said doubled portion of said spring, substantially as set forth. 14th. The combination of a spring having two outwardly extending arms adapted to be attached to a lamp, the central portion of said spring being doubled upon itself in substantially W -form, with a clip having two parallel arms, said clip forming a socket to receive a support, and rivets, bolts or like connecting said arms of said clip, and passing respectively through the looped portions of said spring, substantially as set forth. 15th. The combination of a spring having two outwardly extending arms, one of said arms having an opening or slot with a brace secured to the opposite arm, and having a shoulder adapted to rest against the arm having the slot, said brace being adapted to pass into said slot, to release the spring arm from the shoulder and brace, substantially as set forth. 16th. A spring having two outwardly extending arms, the outer ends of said arms being bent side-wise, and a shoulder or abutment carried by one of said arms, substantially as set forth. 17th. In a lamp the combination of a casing and a bail carried thereby, with a spring support adapted to be attached to said casing, and arranged to connect with said bail to steady the lamp upon said spring substantially as herein specified. 18th. In a lamp the com-

bination of a casing and a bail carried thereby, with a spring adapted to be attached to said lamp to support the latter, said spring being adapted to be connected with said bail to steady the lamp and a clip to retain the bail in proper connection with the spring, substantially as set forth.

No. 49,724. Heating Engine for Paper Stock.
(*Cylindre à broyer la matière pour papier de pâte.*)



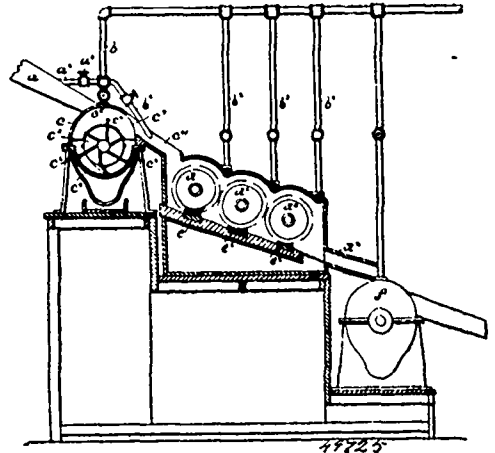
Thomas C. Cadwgan, Anderson, Ind., and The O. S. Kelly Company, Springfield, Ohio, both of the U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. A beating engine consisting essentially of an outer casing and horizontally-arranged cylinders in series, each formed of ribs or serrations on the periphery thereof, a movable bed plate supported on inclined ways, and supporting concaves adjacent to said cylinders, and means, substantially as described, for moving said bed plate longitudinally on said ways so as to adjust said concaves uniformly with reference to said cylinders, substantially as specified. 2nd. In a beating engine, a series of horizontally-arranged cylinders each having a serrated periphery, the serrations in said cylinders being of different pitch in successive order, concaves adjacent to said cylinders, and an inclined bed plate for supporting said concaves, and means for moving said bed plate, substantially as specified. 3rd. The combination with the outer casing and the revolving cylinders, movable bearing blocks supported in said outer casing to support said cylinders, an inclined bed plate having concaves arranged opposite to said cylinders, said cylinders and concaves being serrated, as described, and means for adjusting said bed plate longitudinally to adjust said concaves to or from said cylinders, substantially as specified. 4th. The combination with an outer casing having slotted side plates as described, bearing blocks in said side plates, horizontal cylinders arranged in said casing and supported in said bearing blocks, an inclined bed plate having removable concaves therein, means for adjusting said bed plate longitudinally, a top plate for said casing, a series of shower pipes arranged therein above and between said cylinders, substantially as specified. 5th. The combination with an outer casing and horizontally-arranged cylinders therein, concaves below each of said cylinders arranged in an inclined bed plate, said cylinders being each formed of a series of longitudinal bars to produce a ribbed or serrated periphery, said concaves being correspondingly serrated, shower pipes adjacent to said cylinders, and a screen between the end of said bed plate and the discharge opening in said casing, substantially as specified. 6th. The combination with the serrated or ribbed cylinders and serrated or ribbed concaves adjacent thereto, an inclined movable bed plate in which said concaves are supported, side pieces having ways or flanges for supporting said bed plate, a tapered adjusting bar extending through said side pieces so as to bear at one end against said side pieces and at the other against said bed plate, and means for moving said adjusting piece longitudinally to produce an adjustment of said bed plate, substantially as specified. 7th. The combination with a cylinder, and a concave opposed thereto, an inclined movable bed plate for supporting said concave, a tapered adjusting piece adapted by its longitudinal movement to produce a movement of said bed plate, and a screw threaded adjusting nut for moving said tapered piece, substantially as specified. 8th. The combination with an inclined movable bed plate, of a tapered adjusting piece bearing against the same, a screw threaded stud adjacent to said adjusting piece, and a movable nut on said stud adapted to operate said adjusting piece, substantially as specified. 9th. An outer casing having slotted openings therein, bearing blocks in said openings, and horizontal rollers extending through said casing and journaled in said bearing blocks, said rollers being each provided with a concave, and means for adjusting said concaves uniformly, as described, each of said bearing blocks being provided with adjusting devices whereby the rolls may be independently adjusted, substantially as specified.

No. 49,725. Process of Preparing Paper Stock.
(*Procédé pour préparer la matière pour papier de pâte.*)

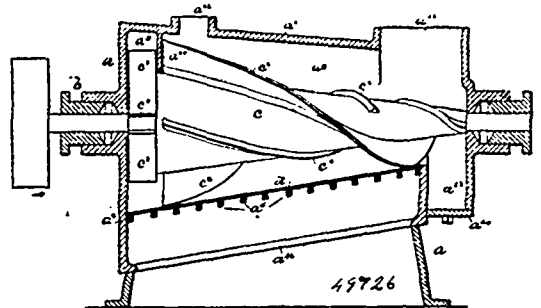
Thomas C. Cadwgan, Anderson, Ind., and The O. S. Kelly Company, Springfield, Ohio, both of the U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. The process of preparing paper stock which consists in, first, breaking and separating the stock by the action of water



under pressure; second, washing the stock by a rubbing process in the water by which it is first treated, and then screening the stock from the water, and discharging it substantially free from the water, substantially as specified. 2nd. The process of preparing paper stock which consists in, first, breaking and separating the stock by the action of water, rubbing and screening the stock so as to separate it from the water, then disintegrating the stock by successive grinding or tearing operations while subjected to the action of water, and finally separating the stock from the water by rubbing the same in contact with a screen, substantially as specified.

No. 49,726. Machine for Preparing Paper Stock.
(*Machine pour préparer la matière pour papier de pâte.*)



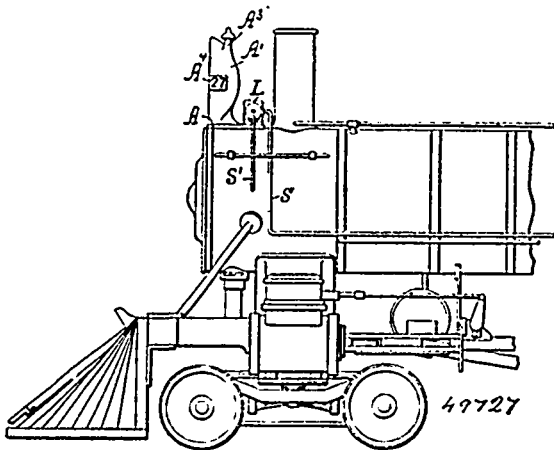
Thomas C. Cadwgan, Anderson, Ind., and The O. S. Kelly Company, Springfield, Ohio, both in the U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. A machine for washing paper stock consisting essentially of an outer casing, an inner revolving cylinder having ribs or rubbers thereon, a closed chamber formed at the top of said casing above said cylinder, and a water discharge at the bottom of said casing below said cylinder, and means for preventing the escape of the stock through the water discharge, substantially as specified. 2nd. In a machine for washing paper stock, the combination with an outer casing and an inner revolving cylinder, flexible wipers or rubbers on said cylinder, a concave screen in the bottom of said casing with which said rubbers are adapted to contact as the cylinder revolves, and an upper extended chamber formed in said casing above said cylinder, said chamber being closed at the top and pivoted with a water supply, substantially as specified. 3rd. The combination with an outer casing and an inner cone-shaped revolving cylinder, a concave screen formed concentric with said cylinder arranged in the bottom of said casing, and an enlarged chamber or reservoir in the top of said casing, and a partition extending downwardly in said reservoir to form an auxiliary chamber, and blades or lifting paddles secured to said cylinder and adapted to operate in said auxiliary chamber, and a discharge opening leading from said auxiliary chamber, substantially as specified. 4th. The combination with the outer casing formed in two parts as described, the lower part being recessed at each side to receive the side bars of a screen retaining support, a concave screen supported on said side bars, a cone-shaped cylinder revolving in suitable bearings in said casing and formed concentric with said screen, a supply opening in said casing at the small end of said cylinder, and a discharge opening at the large end of said cylinder, and inclined blades or paddles on said cylinder revolving opposite said discharge opening, substan-

tially as specified. 5th. The combination with the outer casing having an inner revolving cone-shaped cylinder, ribs and wipers on said cylinder, and a screen in the bottom of said casing concentric with said cylinder, an enlarged chamber or reservoir in the top of said casing above said cylinder, and an auxiliary chamber divided from said reservoir by a partition extending downwardly from said casing, a water supply opening adjacent to said partition, and lifting blades or paddles connected to said cylinder and adapted to revolve in said auxiliary chamber, and a discharge opening leading from said auxiliary chamber, substantially as specified. 6th. The combination with the outer casing formed at each end with suitable glands adapted to form bearings, a cone-shaped revolving cylinder revolving in said bearings, a concave screen in the bottom of said casing, an enlarged chamber or reservoir in the top of said casing, ribs or wipers arranged spirally on said cylinder, blades or paddles at the enlarged end of said cylinder, and a partition extending downwardly from the top of said casing to divide said wipers from said paddles, a supply opening at the small end of said casing and a discharge opening at the large end of said casing, a pocket or chamber under said supply opening, and said discharge opening being arranged opposite the blades or paddles, substantially as specified. 7th. The combination with an outer casing having an inlet or supply opening, and a pocket or chamber under the same, a concave screen extending from a point in proximity to said pocket or chamber to the rear end of said casing, spirally arranged ribs or rubbers on said cylinder adapted to revolve in proximity to said screen, and inclined blades or paddles also connected to the large end of said cylinder, each alternate blade or paddle being extended so as to run in close proximity to said screen, and a discharge opening opposite said blades or paddles, substantially as specified. 8th. The combination with an outer casing having an upper enlarged chamber or reservoir, and a lower water discharge opening, a concave screen in the lower part of said chamber, and a revolving cone-shaped cylinder having wipers adapted to run in proximity to said screen, a partition in the upper part of said casing to form an auxiliary chamber, and inclined blades or paddles operating in said auxiliary chamber, a supply opening leading to said chamber, and a pocket or chamber under said supply opening, a water inlet arranged in proximity to said partition and extending into said chamber or reservoir, and a discharge opening leading from said auxiliary chamber to a point above the centre of said cone or cylinder, substantially as specified.

No. 49,727. Electric Head-light.

(Lumière électrique pour l'avant des locomotives.)

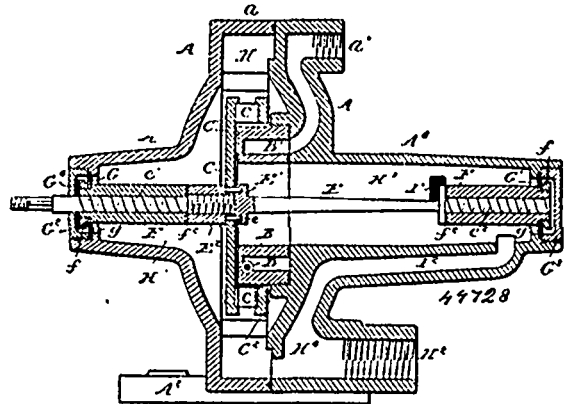


Edgar Ambrose Edwards, Cincinnati, Ohio, and Charles W. Adams, Chicago, Illinois, both of the U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. In an electric head-light, the combination with the reflector, and supporting case therefor, the case conforming substantially to the contour of the reflector and the edge of which practically coincides with a plane passing through the focus of the reflector, of an electric lamp arranged in the focus thereof, the said lamp comprising a case having carbons parallel to each other and to the axis of the reflector, and incandescent material arranged between the carbons, substantially as described. 2nd. In an electric head-light, the combination with a reflector, of a lamp arranged in the focus thereof, the said lamp comprising a case having carbons arranged parallel to each other and to the axis of the reflector and an incandescent material between the carbons and arranged to throw the light rays all substantially in one direction, substantially as described. 3rd. In an electric lamp, the combination with a case, of the parallel carbons, the incandescent material between the carbons, a re-lighter for the carbons, and a differential solenoid connected to the lighter for automatically establishing the arc, substantially as described.

4th. In an electric head-light, the combination with a reflector, of an electric lamp mounted in the focus thereof, the said lamp being supported on a standard and being provided with parallel carbons and having a block of incandescent material between the carbons, a re-lighter for the carbons, and a differential solenoid, the core of which is connected to the lighter, substantially as described. 5th. In an electric head-light, the combination with a base, of a casing formed integral therewith, and conforming substantially in contour to the reflector carried thereby, the base having an extension, and a generator and motor mounted on said extension, substantially as described. 6th. The combination with a locomotive, of a motor having a wheel adapted to be driven by steam impact, steam connections between the motor and the locomotive, a generator connected to the motor, and electric lighting devices connected to the generator, substantially as described.

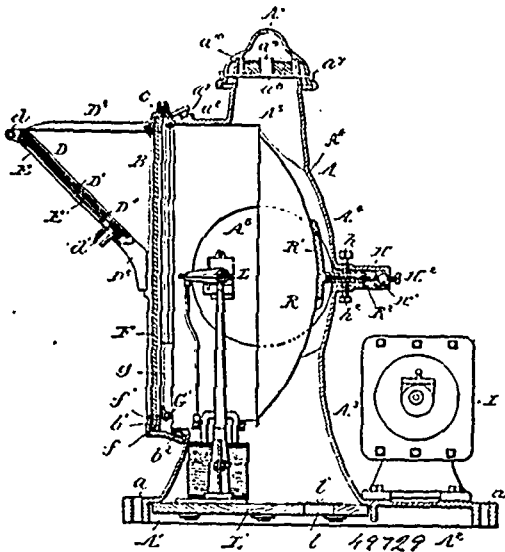
No. 49,728. Steam Turbine. (Turbine à vapeur.)



Edgar Ambrose Edwards, Cincinnati, Ohio, and Charles W. Adams, Chicago, Illinois, both in the U.S.A., 22nd August, 1895; 6 years.

Claim.—1st. In a turbine wheel, the combination with buckets, of an induction port having an expansion chamber with parallel sides and provided with a reduced inlet, substantially as described. 2nd. In a turbine wheel, the combination with the buckets, of an induction port having an expansion chamber and provided with a reduced inlet, the port being arranged to discharge its jet in the plane of rotation of the wheel, substantially as described. 3rd. In a turbine wheel, the combination with the buckets curved in the plane of rotation of the wheel, of induction ports having expansion chambers and reduced inlets and arranged to deliver the jets of steam against the buckets in the plane of rotation of the wheel, substantially as described. 4th. In a turbine wheel, the combination with the ring of buckets, of an annular steam chest within the ring, induction ports delivering steam jets from the chest outwardly against the buckets, and an annular exhaust chamber outside the buckets, substantially as described. 5th. In a turbine wheel, the combination with the ring having buckets curved in the plane of rotation of the wheel, of induction ports arranged at substantially right angles to the radii of the ring of buckets and delivering steam jets outwardly against the curved surface of the buckets, substantially as described. 6th. In a turbine wheel, the combination with a casing made in two parts and having central extensions forming supports for the bearings of the shaft, of an annular steam chest secured to one of the parts, a steam passage leading thereto, induction ports delivering jets to the buckets in the plane of rotation of the wheel, an annular exhaust chamber outside the buckets, and a shaft mounted in the exhaust chamber and supporting the wheel, substantially as described. 7th. In a turbine wheel, the combination with the casing, of a shaft, a bucket wheel mounted thereon, and suspension diaphragms for supporting the shaft, substantially as described. 8th. In a turbine wheel, the combination with the casing forming supports for the bearings of the shaft, of a bearing surrounding said shaft, and suspension diaphragms supporting the bearings, substantially as described. 9th. In a turbine wheel, the combination with the casing having lateral extensions forming supports for the bearings of the shaft, of a bearing for the shaft mounted in the exhaust chamber, the bearing portion of the shaft being provided with a spiral groove, substantially as described. 10th. In a turbine wheel, the combination with the casing having lateral extensions forming supports for the bearings of the shaft and forming a divided exhaust chamber, of means for directing the exhaust into both portions of the chamber, substantially as described. 11th. In a turbine wheel, the combination with the casing having lateral extensions forming supports for the bearings and forming a divided exhaust chamber, of a shaft mounted in bearings in said extensions, the bearing portion of the shaft having spiral grooves, and means for directing the exhaust to both of the bearings, the said means including the throttle and passages in the casing, substantially as described.

No. 49,729. Head-light. (Lumière d'avant.)

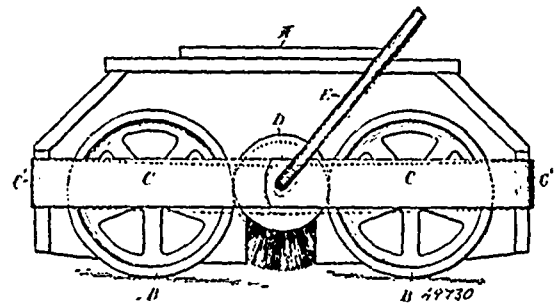


Edgar Ambrose Edwards, Cincinnati, Ohio, and Charles W. Adams Chicago, Illinois, both of the U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. A head-light case comprising the base, the circular column, the circumferential shell, the cylindrical extensions, and the ventilating tube formed in one integral metal casting, substantially as described. 2nd. A head-light casing comprising a base, a supporting column, a cylindrical shell having cylindrical lateral extensions, the rear portion of the case conforming substantially to the outline of the reflector, substantially as described. 3rd. A head-light casing, comprising a base, a supporting column, a cylindrical shell having lateral cylindrical extensions, and name plates having central openings secured to said lateral extensions, substantially as described. 4th. In a head-light casing, a cylindrical portion provided with a recess for a gasket, in combination with a goggle-frame having a flaring flange, substantially as described. 5th. In a head-light casing, the combination with the goggle-frame, of the auxiliary plane reflector secured thereto and projecting at an angle therefrom, substantially as described. 6th. In a head-light casing, the combination with the goggle-frame, of the auxiliary plane reflector secured to the goggle and projecting at an angle thereto, and the bar connecting the other portion of said plate with the goggle frame and presenting a narrow edge to the line of reflection, substantially as described. 7th. A head-light casing provided with an inclined reflector, in combination with an emergency signal, substantially as described. 8th. A head-light casing provided with an inclined auxiliary reflector, in combination with a hinged frame containing a coloured, transparent medium, substantially as described. 9th. In a head-light casing, the combination with the inclined auxiliary reflector, of a hinged frame connected thereto, means for securing the frame in position against the reflector, and means for supporting it in a position to intercept the rays of light from said auxiliary reflector, substantially as described. 10th. A head-light casing provided with pockets formed thereon, in combination with a roller arranged in said pockets and supporting a screen, substantially as described. 11th. The combination with a head-light casing, of the reflector and means connected with the reflector and case whereby the reflector may be adjusted from the exterior of the case, substantially as described. 12th. The combination with the head-light case having an extension, of a reflector having a bracket secured thereto, and adjusting devices between said bracket and projection whereby the reflector may be accurately adjusted, substantially as described. 13th. The combination with the head-light case, provided with a rearward hollow extension, of a reflector provided with a bracket having a tubular extension, the adjusting screws, and the adjusting rod, substantially as described. 14th. The combination with the head-light case having a hollow rearwardly projecting extension provided with a spherical socket, of a reflector having a bracket provided with a hollow tubular extension with squared outer surfaces, the adjusting set screws, and the adjusting rod having a spherical enlargement, substantially as described. 15th. A head-light case composed of metal having an open base piece, in combination with a wooden plate secured thereto, and having a ventilating opening therein and a ventilating opening at the top of the case, the openings being covered with wire screens, substantially as described. 16th. In a locomotive electric head-light, the combination with the casing containing the lamp and reflector, of a generator and a motor, and a reduction gear connecting the generator and motor, substantially as described. 17th. An electric head-light comprising a metal case having an extension, a

lamp and reflector arranged within the case, an electric generator mounted on the extension, a motor also mounted on the extension, reducing gears connecting the motor and generator, and an enclosing case for said reducing gears, substantially as described.

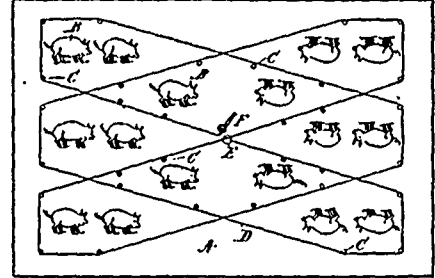
No. 49,730. Carpet Sweeper. (Balayeuse de tapis.)



T. Stewart White, Thomas Friant, Gains W. Perkins and Charles J. Reed, assignees of Silas Horatio Raymond, all of Grand Rapids, Michigan, U.S.A., 23rd August, 1895; 6 years.

Claim. 1st. In a carpet sweeper, vertically flexible guard bars supporting a bale and brush shaft, substantially as described. 2nd. In a carpet sweeper, guard bars attached to the case at their ends and projecting outward from said case, and having openings near their middle, a bale having inwardly turned ends adapted to engage said openings, and a brush shaft journaled on said ends, substantially as described. 3rd. In a carpet sweeper, a bale and brush shaft supported by guard bars secured to the case at their ends and having overlapping and pivoted portions near their middle, substantially as described. 4th. In a carpet sweeper, guard bars secured to the case at their ends and projecting outward from the same, said bars having overlapping portions near the middle and openings through said overlapping portions, a bale having inwardly turned ends adapted to engage said openings and to form journals for the brush shaft, substantially as described.

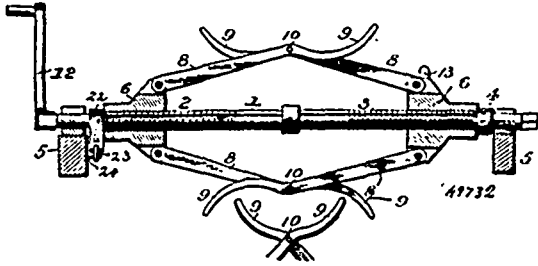
No. 49,731. Puzzle. (Jeu de patience.)



Alphonse William Ziegler and Henry Utard, both of New York, State of New York, U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. A game or puzzle, consisting of a board, provided with a number of pins or plugs, a number of pictures or characters, representing certain people or other objects or things, and means for attaching the ends of a cord at or near the centre of the board, the arrangement being such that when one end of the cord is attached to or connected with the board at the centre the cord may be passed between and around the pins or plugs and the free end also secured at the centre, so as to form a predetermined number of pins in which are a predetermined number of pictures or characters, representing certain people or other objects, and that the cord will not touch either of the pictures or characters, or either of the pins or plugs more than once, substantially as shown and described. 2nd. A game or puzzle, consisting of a board, provided with a number of pins or plugs, a number of pictures or characters, representing certain people or other objects or things, and the names of a predetermined number of nations and means for attaching the ends of a cord at or near the centre of the board, the arrangement being such that when one end of the cord is attached to or connected with the board at the centre, the cord may be passed between and around the pins or plugs and the free end also secured at the centre, so as to form a predetermined number of pins in which are a predetermined number of said pictures or characters and the name of one of the nations, and that the cord will not touch either of the pins or plugs more than once nor either of the said names of the nations, and a cord one end of which is secured at the centre of the board, and the other end of which is adapted to be secured at the same place, substantially as shown and described.

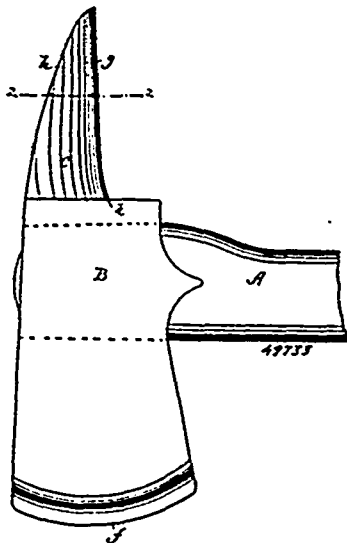
No. 49,733. Wire Reel. (Dévidoir pour fils de fer.)



Louis William Hanne and Frederick H. Hanne, assignees of Marcus Eli Fretwell, all of Jacksonville, Florida, U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. In a reel, the combination with a support and a shaft mounted therein and having oppositely threaded portions, of hubs provided with threaded bores corresponding to and engaging the threads of the shaft, arms arranged in pairs and pivotally connected at one end with the hubs, the arms of each pair being pivoted together toward their outer ends, and fingers carried by the said arms adapted to receive coils of wire, as described. 2nd. In a reel, the combination with a support and a shaft mounted therein and having oppositely threaded portions, of hubs provided with threaded bores corresponding to and engaging the threads of the shaft, arms arranged in pairs and pivotally connected at one end with the hubs, fingers carried by the said arms, and means for locking the hubs in their adjusted positions, comprising a movable pin carried by a hub, and adapted to engage with a groove in the shaft, said pin being provided with recesses and an intermediate projection or stud, and a projection or stud on the hub adapted to engage in one or the other of the recesses in the manner described. 3rd. In a reel, the combination with a support and a shaft mounted therein and having oppositely threaded portions, of hubs provided with threaded bores corresponding to and engaging the threads of the shaft, arms arranged in pairs and pivotally connected at one end with the hubs, fingers carried by the said arms, and means for locking the hubs in their adjusted positions, comprising a radially movable pin arranged within a recess in the hub, the shaft having longitudinal grooves, with which said pin is adapted to engage, and said pin being provided in one edge with recesses, a projection or stud arranged between said recesses and having a rounded end, and a rounded projection or stud on the hub within its recess adapted to engage in one or the other of the recesses in the pin, and a spring operating upon the pin to effect the engagement of the projection on the hub with a recess of the pin, for the purpose specified. 4th. In a reel, the combination with the reel shaft, a support therefor, a collar on said shaft, a band adapted to encircle said collar and provided at one end with a slot and bolt, and the opposite end of said band being secured to the said support, and a lever pivotally connected to the latter and adapted to engage with the bolt of the band, as and for the purpose specified.

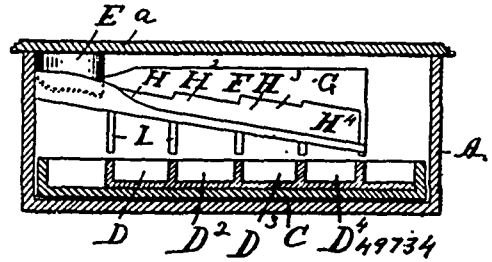
No. 49,733. Firemen's Axe. (Hache de pompier.)



The Hall Manufacturing Company, Rockland, Maine, assignee of Samuel Hix Hix, Chelsea, Massachusetts, both in the U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. A fireman's axo provided on its head with a pick having a cutting edge. 2nd. The herein described fireman's axo comprising the head B, having the cutting edge f, the curved pick C, formed integral with said head and having the cutting edge g, substantially as and for the purpose set forth.

No. 49,734. Cash Till. (Caisse de comptoir.)

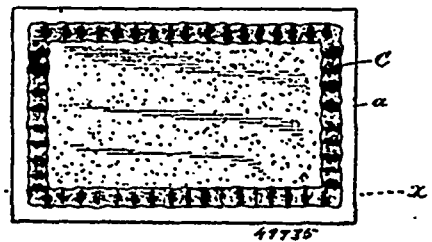


Joseph Leopold Coyle and Henry Michael McClory, both of Ottawa, Ontario, Canada, 23rd August, 1895; 6 years.

Claim.—1st. A cash till, consisting of a suitable casing having a lid or cover on top, an aperture in the said lid or cover in one corner thereof, a chute formed under the said aperture, an inclined race formed so as to receive the coins dropped through the aperture on the said chute, the said race being V-shaped in cross-section and having a slot formed on that side on which the coins lean when rolling down the said race, the said slot being of different widths, the smallest at the top and the largest at lowest portion, a drawer having a compartment for each width of the said slot, the said drawer sliding in the said casing under the said race, substantially as set forth. 2nd. In a cash till, the combination with the chute B, inclined race F, having a slot on one of its sides the said slot being of varying widths, the smallest at the highest point and the largest at the lowest point of the said race, of a receptacle having compartments, one of each of the said compartments being immediately under each different width in the said slot in the said V-shaped race, substantially as set forth. 3rd. In a device for sorting coins of different values, the combination with a V-shaped inclined race having a slot formed on the side on which the coins slide as they roll down the said race, the said slot being of several widths the smallest at the top, and increasing as the race descends, a ledge formed at the bottom of the slot, of a receptacle divided into compartments to receive the coins as they fall through the said slot.

No. 49,735. Sticky Fly Paper.

(Papier tue-mouche à glue.)



The O. and W. Thum Company, assignee of Otto Thum, both of Grand Rapids, Michigan, U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. A sheet of sticky fly paper provided with a retaining border composed of sealing material weakened transversely at intervals, substantially as described. 2nd. Sticky fly paper having a retaining border composed of sealing material transversely corrugated, substantially as described.

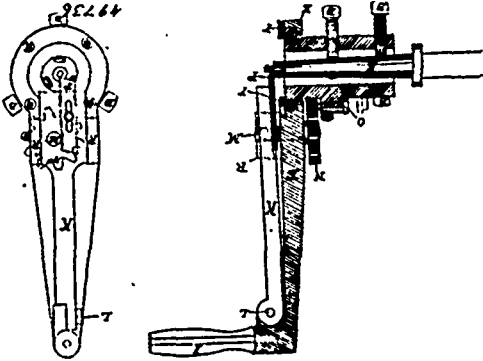
No. 49,736. Machine for Cutting Axles.

(Machine pour couper les essieux.)

A. B. Jardine and Company, assignees of James Jardine, all of Hespeler, Ontario, Canada, 23rd August, 1895; 6 years.

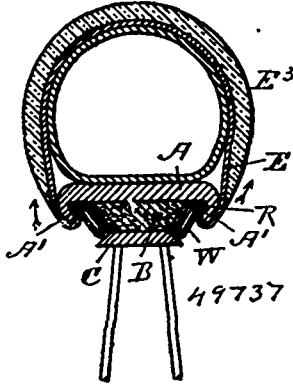
Claim.—1st. In an axle cutter, the combination with the sleeve A, and the revolving ring and arm E, of the tool holder K, pivoted at L, as set forth. 2nd. The combination with the sleeve A, and the revolving ring and arm E, of the tool holder K, and the feed screw M, as set forth. 3rd. The combination with the sleeve A, and the revolving ring and arm E, of the tool holder K, the feed

screw M, and the star wheel N, as set forth. 4th. The combination with the sleeve A, and the revolving ring and arm E, of the tool



holder K, the feed screw M, the star wheel N, and the movable pin O, as set forth.

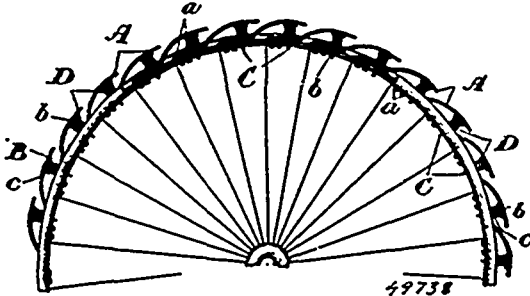
No. 49,737. Pneumatic Bicycle Tire. (Bandage pneumatique de bicycles.)



Peter Krumschoid and Philip Joseph Duggan, both of Boston, Massachusetts, U.S.A., 23rd August, 1895; 6 years.

Claim.—In a bicycle tire, the combination of an envelope, the edges of which are formed of thin flexible material, wound over and over a wire core, said wire core being formed of wire bent as described so as to form a tape like strip, the edges of which constitute a straight, continuous and rigid support for the over wound thin fabric, with a rim having recesses as described, substantially as and for the purposes set forth.

No. 49,738. Tire for Bicycles. (Bandage de bicyclette.)

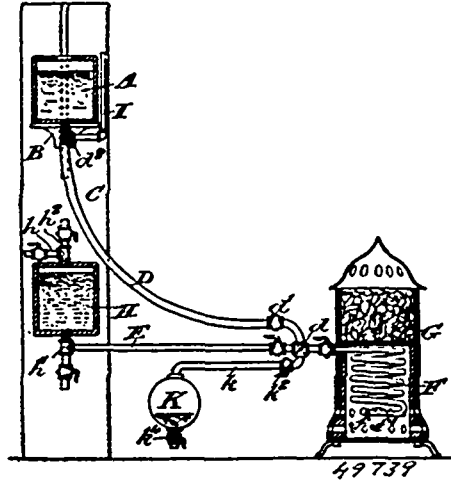


Manuel Baker and James Harvey Pearson, both of Toronto, Ontario, Canada, 23rd August, 1895; 6 years.

Claim.—1st. In a tire for bicycles, a rim in combination with a series of plates connected at one end to the said rim, and having the other held above it by spring pressure, substantially as described and for the purpose specified. 2nd. In a tire for bicycles, a rim in combination with a series of flat metal springs, each spring having one end rigidly connected to the rim and the other extending above it, substantially as described and for the purpose specified. 3rd. In a tire for bicycles, a rim in combination with a series of flat metal springs, each spring having one end rigidly connected to the said rim and the other extending above it, and a coil spring located between the free end of the spring and the said rim, substantially as described and for the purpose specified. 4th. In a tire for bicycles,

the combination of the rim B, the curved flat metal springs A, A, bolted at a, a, to the said rim, the pins C, C, fast to the free ends of the spring A, and passing through holes in the rim B, and the coil springs D, located on the said pins between the ends of the spring A, and the rim of the wheel, substantially as described and for the purpose specified. 5th. In a tire for bicycles, the combination of the rim B, the curved flat metal springs A, A, bolted at a, a, to the said rim, the pins C, C, fast to the free ends of the spring A, and passing through holes in the rim B, the coil springs D, located on the said pins between the ends of the spring A, and the rim of the wheel, the washers b, and the leather cylinder c, substantially as described and for the purpose specified.

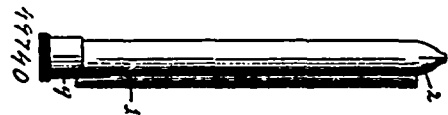
No. 49,739. Apparatus for Supplying Liquid Fuel to Burners. (Foyer à hydrocarbures.)



Samuel Turner, New York, Cora Louisa Turner, Brooklyn, both in New York State, Henrietta Ehrenzella Chaufran, Long Branch, and Annie Sophia Patten, Pleasure Bay, both in New Jersey, all in the U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. A receptacle for containing a body of liquid hydrocarbon under head or pressure, a pipe for feeding the said hydrocarbon to a burner and a return pressure chamber in connection with said feeding pipe, substantially as set forth. 2nd. A receptacle for containing a body of water, a receptacle for containing a body of liquid hydrocarbon under head or pressure, a connection for transmitting pressure upon the water through the medium of the liquid hydrocarbon and pipes for bringing the two liquids into intimate contact in their passage to the burner, substantially as set forth. 3rd. A receptacle for containing a body of water, a receptacle for containing a body of liquid hydrocarbon under head or pressure, a connection for transmitting pressure upon the water through the medium of the liquid hydrocarbon, pipes for bringing the liquids into intimate contact, and a return pressure chamber in communication with said pipes for bringing the liquids into intimate contact, substantially as set forth. 4th. A receptacle for containing a body of liquid hydrocarbon, a pipe for feeding the said liquid hydrocarbon to a burner and a vent pipe in connection with said feed pipe for flushing it, substantially as set forth. 5th. A receptacle for containing a body of liquid hydrocarbon, a feed pipe for feeding the liquid hydrocarbon to a burner, a check valve in said feed pipe and a return pressure chamber in communication with said feed pipe between the check valve and the burner, substantially as set forth.

No. 49,740. Match Magazine Lighter. (Allumeur pour boîtes à allumettes.)

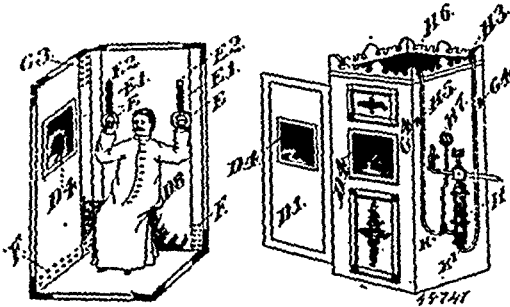


Edwin Seaborn, London, Ontario, Canada, assignee of Frank Goff, Camden, and Thomas H. Joiner, Burlington, both in New Jersey, U.S.A., 23rd August, 1895; 6 years.

Claim.—1st. In a lighting implement, the combination of a casing provided with interiorly roughened or serrated friction or igniting fingers, concentric guide and feed tubes provided at their corresponding ends with co-operating jaws to engage successively the frictionally ignitable heads or enlargements of a continuous taper, the guide tube being fixed and a spring-actuated operating cap connected to said feed-tube and slidably fitted upon the lower end of the casing, substantially as specified. 2nd. In a lighting implement,

the combination of a casing provided with friction or iguiting fingers, a guide-tube arranged concentrically in the casing and fixed thereto, a slidable jaw-bearing-rod mounted exteriorly upon said guide-tube, and a slidable spring-actuated operating cap fitted upon the lower end of the casing, connected to said lead-tube, and provided with an aperture registering with the guide-tube to enable papers to be inserted without removing the cap, substantially as specified.

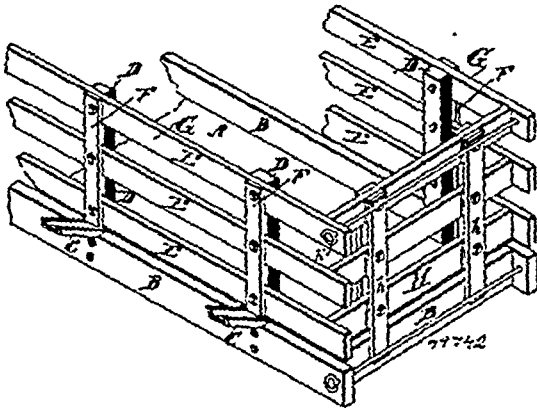
No. 49,741. Medical Appliances. (Appareil médical.)



Daniel D. Wilson, Toronto, Ontario, Canada, 23rd August, 1895; 6 years.

Claim.—1st. In a medical appliance, the medical jar or cup having in the main part of the cup, a distributing substance and arranged for the steam to pass through the bottom of this substance, and having the filler attached, substantially as described and for the purpose set forth. 2nd. In a medical appliance, the combination of the boiler with the cup C, containing the distributing substance and with the cabinet D, and with the steam pipes connecting same, all substantially as set forth. 3rd. In a medical appliance, the combination of the boiler, with the cup C, and with the steam compelled to pass through the bottom of the lower part of the cup, and with the filler above the cup, and with the cabinet D, and with the clamping apparatus over the edges of the door of the cabinet, and with the ventilating space between the walls of the cabinet, and with the air pump attached to the cabinet, all substantially as shown and for the purpose specified.

No. 49,742. Rack for Wagons. (Ratelier pour wagons.)

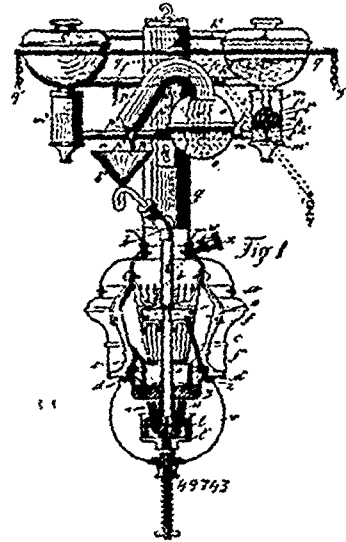


Richard McLane, Colchester, Ontario, Canada, 23rd August, 1895; 4 years.

Claim.—1st. In a convertible hay and stock rack, the combination of a wagon frame or body provided with end and side frames, and brackets secured to said wagon body, said side frame being flexibly connected with said brackets, substantially as described. 2nd. In a convertible hay and stock rack, the combination of a wagon frame or body, provided with end and side frames and brackets secured to said wagon body, said side frames provided with bars D, flexibly engaged to said brackets, substantially as described. 3rd. In a convertible hay and stock rack, the combination of a wagon frame or body, provided with end and side frames, said side frames, consisting of bars D and rails E, and brackets secured to the wagon body, said side frames having a flexible connection with said brackets by means of a bolt C passing through a slot or opening in the bars D, substantially as described. 4th. A convertible hay and stock rack provided with end and side frames, brackets to support said side frames, which have flexible connection therewith and sockets or openings in the wagon body to receive the ends of bars forming a part of said side rails, for the purpose of manufacturing said side rails in a vertical position, substantially as described. 5th. A convertible hay and stock rack provided with end and side frames, bolts connecting said side frames together for the purpose of supporting the

end frames, brackets to support said side frames which have flexible connection therewith and openings or sockets to receive the ends of the bars forming a part of said side frame, substantially as described. 6th. A convertible hay, stock rack and wagon provided with end and side frames, brackets to support said side frames which have flexible connection therewith, suitable means for locking said frames in a vertical position and additional side rails to slide between the rails forming the end and side frames, said additional rails held in position by straps or bars F, substantially as shown and described.

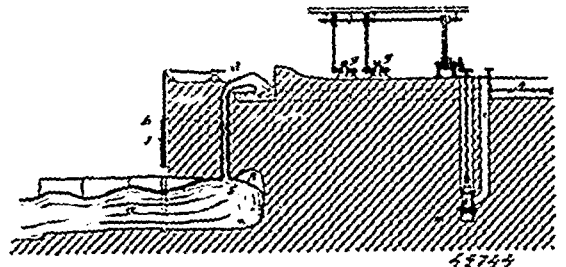
No. 49,743. Lamp. (Lampe.)



Julius Schulke, Berlin, Germany, 23rd August, 1895; 6 years.

Claim.—1st. In a lamp, an oil supply, a reservoir connected thereto, a pivoted pipe connected to the top of the reservoir, a wick placed in the pipe and extending down into the reservoir, and means connected to the pipe for tilting it, combined with a pipe, into which the oil drips, and a burner where the oil is vaporized and burned, substantially as shown. 2nd. In a lamp, an oil supply, provided with a valve in its lower end, a chamber into which the lower end of the oil supply projects, a reservoir connected to said chamber, a pipe, provided with a wick, and pivoted in the top of the reservoir, a rod connected to the pipe, and cords, chains, or wires connected to the ends of the rod for operating it, combined with a pipe into which the oil drips, and burner at the lower end of the pipe, substantially as described. 3rd. A main reservoir, a pipe leading therefrom, a second reservoir connected to the main one, by the pipe, and a curved pipe pivoted above the reservoir a, and having a wick placed therein, combined with a tilting rod for adjusting the curved pipe, and a pipe, connecting with the rotor, and into which the oil is led, substantially as shown. 4th. The second reservoir a, the tilting curved pipe N pivoted above the reservoir, and the wick placed in the pipe, combined with a receptacle for holding spirits, and the pipe b, the receptacle being connected with the pipe, substantially as specified.

No. 49,744. Method of Using the Sea as a Motive Power. (Méthode de se servir de la mer comme force motrice.)



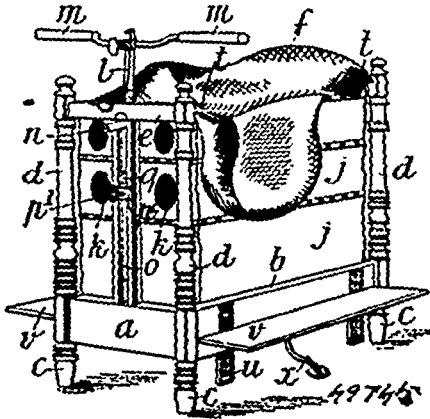
George Walter Blands, Sydney, New South Wales, Australia, 23rd August, 1895; 6 years.

Claim.—1st. An uptake having a delivery bend at the top in conjunction with an air compressing chamber or air compressing cham-

bers, substantially as described and shown on the drawing and for the purpose herein set forth. 2nd. A channel wide at the mouth and narrow at the back in conjunction with an uptake having a delivery bend at the top and with an air compressing chamber or chambers, substantially as described and shown on the drawing and for the purpose specified. 3rd. A channel wide at the mouth and narrow at the back, an uptake having a delivery bend at the top and an air compressing chamber or air compressing chambers, in combination with a storage reservoir, substantially as described and shown on the drawing and for the purpose herein set forth. 4th. The method employed for elevating the water of the sea, for use as a motive power, and for the purposes specified herein, in which a single channel wide at the mouth and narrow at the back, concentrates the force of the waves or swell of the sea, beneath an uptake having a delivery bend at the top, and inside an air compressing chamber, or air compressing chambers, where by its means air is sharply compressed, which on expansion raises a large volume of water through the up-take into a storage reservoir, substantially as described and shown on the drawing. 5th. The method employed for elevating the water of the sea, for use as a motive power, and for the purposes specified, in which a series of channels, wide at the mouth and narrow at the back, concentrates the force of the waves or swell of the sea beneath uptakes having delivery bends at top and inside air compressing chambers, which are at one level, or at different levels to suit various tides, where air is compressed, which on expansion raises a large volume of sea water by means of the uptakes into a storage reservoir, substantially as described and shown in the drawings. 6th. An adjustable lip in connection with an air compressing chamber, substantially as described and for the purpose herein set forth. 7th. An air compressing chamber the lip of which, and an uptake at the bottom of which is protected by metal or other suitable material, substantially as and for the purpose set forth. 8th. A channel wide at the mouth and narrow at the back, an air compressing chamber or air compressing chambers and an uptake, in combination with a gate for shutting out the sea, if repairs are necessary. 9th. A channel wide at the mouth and narrow at the back, across which is a barrier, for breaking the waves or swell of the sea before reaching the compressing chamber or compressing chambers, in combination with an air compressing chamber or air compressing chambers, an uptake having a delivery bend at the top and a storage reservoir, substantially as described and shown on the drawings. 10th. The construction or use of a channel wide at the mouth and narrow at the back, an air compressing chamber or air compressing chambers, and an uptake having a delivery bend at the top, built out in the sea, of concrete stone or any other suitable material, in combination with a storage reservoir, substantially as and for the purpose herein set forth.

No. 49,745. Exercising Apparatus.

(Appareil gymnastique.)



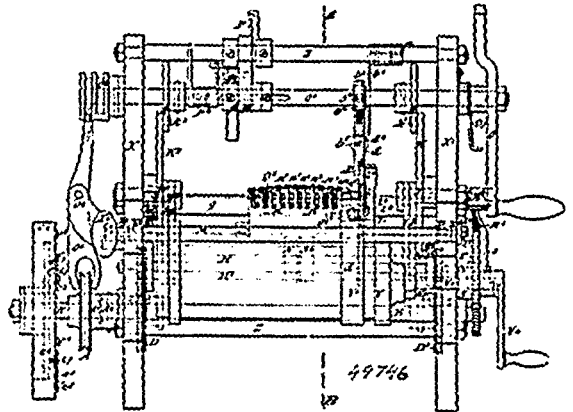
Richard Henry Bath, London, England, 23rd August, 1895; 6 years.

Claim.—1st. An exercising apparatus having a saddle provided with guide pins, spring supports for said saddle, vertical guides engaging said pins and elastic buffers adjustably secured to said guides in the path of said pins for limiting the vertical movements of the saddle, substantially as described. 2nd. An exercising apparatus having saddle supporting devices including two or more series of springs located in different horizontal planes and retaining boards interposed between the springs of two adjacent series, substantially as described. 3rd. An exercising apparatus having saddle supporting devices including two or more series of springs located in different horizontal planes, retaining boards separating the springs of two adjacent series and a flexible covering secured to said boards, and provided with apertures for the egress and ingress of air, substantially as described. 4th. In an exercising apparatus the combination with saddle supporting devices, including two or more series of springs located in different horizontal planes and retaining boards separating said series of springs, or adjustable foot supports,

substantially as described. 5th. In an exercising apparatus, the combination with the saddle and its supporting springs, of vertical guides for said saddle and elastic buffers for engaging parts connected with the front and rear of said saddle, and means for adjusting said buffers independently, whereby one of said buffers may be placed at a point higher than the other to impart a rocking movement to said saddle, substantially as described. 6th. In an exercising machine the combination with the supporting frame and spring saddle supports, of the supplemental feet pivoted to the main frame as described whereby said supplemental feet may be moved beneath the frame when not in use or may be swung outwardly to engage the floor at a distance from the frame, substantially as described.

No. 49,746. Machine for Making Cigars.

(Machine pour faire les cigares.)



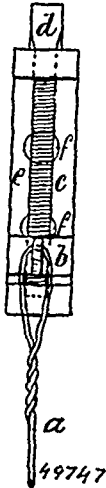
Jean Rense, Engien, Belgium, 24th August, 1895; 6 years.

Claim.—1st. In a cigar-making machine in which manipulators are employed for forming the cigars, the combination of standards provided with recesses or openings, spindles which carry the said manipulators and the ends of which project into the said recesses or openings, plates placed loosely in the said recesses or openings and adapted to bear against the said ends, and screws which are screwed through fixed supports and are adapted to bear against the said plates, substantially as described. 2nd. In a cigar-making machine, the combination of a pair of manipulators, for forming the cigars, a pair of levers carrying the said manipulators, a pair of rotary bodies each of which is provided with a recess or opening, a spindle which is adapted to operate the said levers and which engages with its ends in the recesses or openings, a pair of collars which surround the said rotary bodies and through which openings are made, a pair of oscillatory bodies each of which has a notch in it, and projections on the said oscillatory bodies adapted to engage with the said spindle and to compel it to leave the said recesses or openings in the rotary bodies and to pass through the said opening in the collars into the said notches, substantially as set forth. 3rd. In a cigar-making machine, the combination of a fly wheel, a body mounted co-axially with the said fly wheel, a pin carried by the said body, a spring connecting the said pin to the said fly wheel, and a body adapted to be brought into the path of, and to arrest, the said pin, substantially as set forth. 4th. In a cigar-making machine, the combination of a fly wheel, a body mounted co-axially with the said fly wheel, a pin carried by the said body, a spring connecting the said pin to the said fly wheel, a bar, lever or other body adapted to be brought into the path of and to arrest the said pin, a tumbler which is pivoted to the said fly wheel and is adapted to be raised by and afterwards to fall down behind the said bar, lever or other body, and stops adapted to limit the movements of the said tumbler, substantially as set forth. 5th. In a cigar-making machine, the combination of a fixed mould for the point-ends of the cigars, a knife adapted to cut off the excess of tobacco at the point-ends, a plate fixed at a distance from the said mould about equal to the thickness of the said knife, and means for causing the said knife to move between the said mould and the said plate, substantially as set forth. 6th. In a cigar-making machine, the combination of a knife adapted to cut off the excess of tobacco at the point-ends of the cigars, a support for the said knife comprising two parts, and means for adjusting the said parts relatively to each other, substantially as set forth. 7th. In a cigar-making machine, the combination of a mould for forming the point-ends of the cigars, a pivotally mounted body, and means for adjusting the said mould and the said body relatively to each other, substantially as set forth. 8th. In a cigar-making machine, the combination of a suspended mould for forming the point-ends of the cigar, a guide by means of which the said mould is adapted to be oscillated, means for actuating the said guide, and means for adjusting the said guide relatively to the said operating means, substantially as set forth. 9th. In a cigar-making machine, the combination of a suspended mould for forming the point-ends of the cigars, a guide for oscillating the said mould, means for operating the said guide, a lever for

holding the said guide out of operation by the said operating means, the said lever comprising two parts, and means for adjusting the said parts relatively to each other, substantially as set forth. 10th. In a cigar-making machine, a stationary mould for forming the point-ends of the cigars and means for adjusting the position of the said mould, substantially as set forth.

No. 49,747. Method of Stringing Piano.

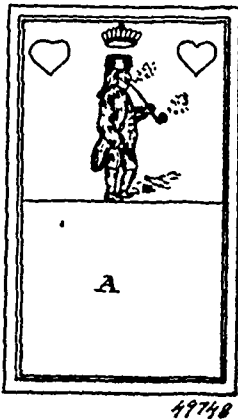
(Méthode d'accorder les pianos.)



Dominick Francis Ward, St. Catharines, Ontario, Canada, 24th August, 1895; 6 years.

Claim.—The combination, with a piano forte, of the frame *c*, secured to pin block or west plank *p*, the screw-threaded shaft *c* journaled in the ends of said frame, and the draw nut *b* screwing on said shaft, and attached to the string *a*, as and for the purpose set forth.

No. 49,748. Cards for Playing Game. (Cartes à jouer.)



Paul Lehmann, Saxony, Germany, 24th August, 1895; 6 years.

Claim.—Playing cards having the usual figures and pictures confined to about half the card surface and having caricatures, rhymes or verses on the remaining part of the surface, substantially as described.

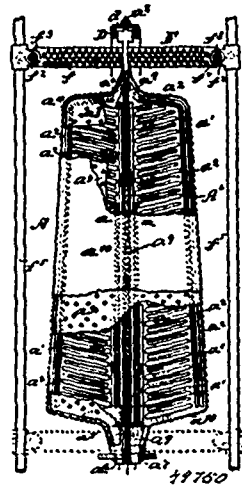
No. 49,749. Treatment of Tobacco.

(Traitement du tabac.)

Edward John Lushy, London, England, 24th August, 1895; 6 years.

Claim.—1st. Treating tobacco by impregnation with the oil or tarry products obtained from coniferous pine trees, substantially as set forth. 2nd. Tobacco impregnated with the oil or tarry products obtained from coniferous pine trees, or the odours thereof, substantially as set forth.

No. 49,750. Filter. (Filtre.)



Fredrich Breyer, Vienna, Lower Austria, Austria-Hungary, 24th August, 1895; 6 years.

Claim.—1st. An asbestos filter consisting of a filter casing B, within which are arranged a number of upright porous hollow filter bodies A, of lens-shaped section, having a filter layer of asbestos conglomerate cement, rendered microbe-proof, the lower ends of which filter bodies communicate with an element base *c*, serving for collecting the filtered water from the several elements and communicating with the discharge pipe for filtered water C, the filter casing B, being capable of connection by branch pipes C^a C^b, with the supply of water to be filtered, and with the supply of the sterilizing liquid, as also with the sludge discharge pipe E, substantially as described. 2nd. In the construction of asbestos filter such as herein described, the use of hollow filter bodies A, formed of perforated sheet metal a², provided with a covering a¹⁰ of textile fabric, and soldered at intervals to a middle piece A¹, provided with vertical and inclined ribs a and a¹, as also with edge ribs a² and a central tube a³, for leading off the filtered water and gases to the discharge opening a⁴, substantially as described. 3rd. In combination with the hollow filter bodies such as herein described, the use of a filter layer composed of an asbestos-water-glass cement which is rubbed into the textile covering, then solidified and thereby rendered washable, which layer is rendered microbe-proof by means of a mixture of asbestos, finely ground by the aid of salt crystals, and of alumina, substantially as described. 4th. In an asbestos filter such as herein described, the use of a brushing apparatus consisting of brush plates F of corrugated section capable of being moved up and down between the filter elements, which plates have rows of bristle tufts *f* applied to the surfaces of the filter elements, the bristle tufts being introduced into sockets *f*¹ that are afterwards pressed flat and are forced into holes in the brush plates so that the tufts lie with their flat sides in the direction of the horizontal length of the brush plates, the said tufts being brought to the required length by singeing with hot irons, substantially as described. 5th. In the construction of brush apparatus for the purposes herein set forth, the arrangement of the brush plates F on transverse bars *f*² fixed to guide rods *f*³, passing through stuffing boxes *f*⁴ and tubes *f*⁵ of the filter casing B, and receiving an up and down motion by means of a toothed rack and pinion, the brushes being kept at the proper distance apart by means of ferrules *f*⁶ threaded on the transverse rods, substantially as described. 6th. In a brush apparatus such as herein set forth, the use of an automatic stopping gear for stopping the motion of the brushes when arriving at their highest and lowest positions, which stopping gear consists of pivoted tappets *g*¹ at the ends of the toothed rack *g*², so arranged that when the pinion *g* gearing with the rack is turned in one direction the tappets yield to the pressure of its teeth, while when it is turned in the contrary direction they become fixed and serve as teeth for imparting the pinion's motion to the rack, substantially as described. 7th. In the construction of a filter such as herein set forth, the use of a stretching device for the filter elements A for preventing these from becoming buckled by the brushing process, such stretching device consisting of screw bolts a³ fixed to the head pieces a⁴ of the elements and passing through slots *d* in a bridge piece D fixed to the filter casing B and having screw nuts by turning which the stretching of the elements is effected, substantially as described.

No. 49,751. Paving and Roofing Composition and Method of Making the same. (Composition et méthode de pavage et toitures.)

The Asphaltina Company of America, assignee of John Augustus Just, both of Syracuse, New York, U.S.A., 24th August, 1895; 6 years.

Claim.—1st. The herein described method of preparing a composition of matter which consists in adding rosin and sulphur to the petroleum sediment known as "B.S." substantially in the proportion specified and at a comparatively low temperature and then raising the temperature to about 400° F. whereby the petroleum sediment and the rosin are conjointly sulphurized, substantially as set forth. 2nd. The herein described composition of matter consisting of petroleum residuum, sulphur and calcium resinate, substantially as set forth. 3rd. The herein described composition of matter consisting of petroleum residuum, sulphur, calcium resinate and free rosin, substantially as set forth. 4th. The herein described method of producing a composition of matter which consists in adding rosin and sulphur to petroleum residuum in the proper proportion to sulphurize both substances, raising the temperature to effect a chemical action of the sulphur upon both substances, and then lowering the temperature and adding lime in the proper proportion to combine with the rosin and form calcium resinate, substantially as set forth.

No. 49,752. Paving and Roofing Composition and Method of Making the same. (Composition et méthode de pavage et toiture.)

The Asphaltina Company of America, assignee of John Augustus Just, both of Syracuse, New York, U.S.A., 24th August, 1895; 6 years.

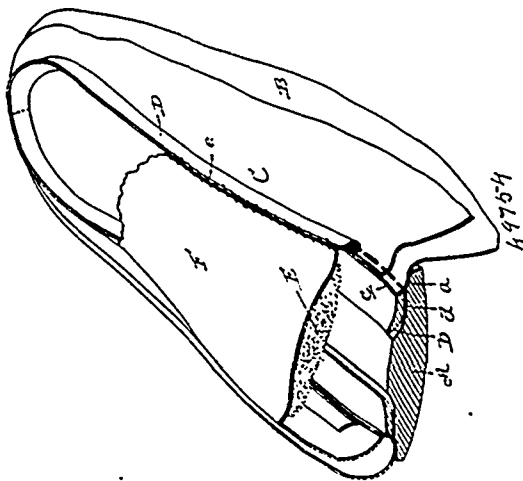
Claim.—1st. The herein described composition of matter consisting of a calcium resinate, a heavy hydrocarbon, tar and sulphur, substantially as set forth. 2nd. The herein described composition of matter consisting of calcium resinate, rosin, a heavy hydrocarbon, tar and sulphur, substantially as set forth. 3rd. The herein described method of producing a composition of matter which consists in forming a solution of calcium resinate in free rosin, adding thereto a heavy hydrocarbon and sulphurized tar, and heating the mixture, substantially as set forth.

No. 49,753. Paving and Roofing Composition and Method of Making the same. (Composition et méthode de pavage et toiture.)

The Asphaltina Company of America, assignee of John Augustus Just, both of Syracuse, New York, U.S.A., 24th August, 1895; 6 years.

Claim.—1st. The herein described method of producing a composition of matter which consists in treating tar with sulphur in substantially the proportion specified at a temperature of from 280-400° Fahr., and then lowering the temperature and adding rosin to the sulphurized tar, substantially as set forth. 2nd. The herein described composition of matter consisting of tar combined with sulphur substantially in the proportion specified, rosin and a sulphurized heavy hydrocarbon, substantially as set forth. 3rd. The herein described method of producing a composition of matter which consists in treating tar with sulphur in substantially the proportion specified, at a temperature of from 280-400° Fahr., then lowering the temperature and adding rosin to the sulphurized tar, and then adding a sulphurized heavy hydrocarbon, substantially as set forth.

No. 49,754. Shoe. (Chaussure.)



Adam Reed, St. Joseph, Missouri, U.S.A., 24th August, 1895; 6 years.

Claim.—1st. A turned shoe having its sole channelled on its inner marginal edge, the vamp or upper secured in said channel by stitches and a tape secured to the upper and channelled edge of the sole, and also having the soft felt or cushion covering the inner side of the sole and the covering for the felt having its edge secured to the tape, substantially as specified. 2nd. The improved turned shoe described consisting of the leather sole A, having the marginal ridge or channel on its inner side, and also having the slit or undercut adjacent to the channel or ridge, the upper having its turned edge placed in the ridge, the vamp lining placed in a similar manner upon the upper, and the tape also placed in the ridge against the lining, and the whole secured by stitches to the channelled wall of the sole and through the slitted portion, the felt cushion E, of lamb-wool covering the sole on the inner side, and the leather F, covering the felt, and secured to one edge of the tape by stitches, substantially as shown and described.

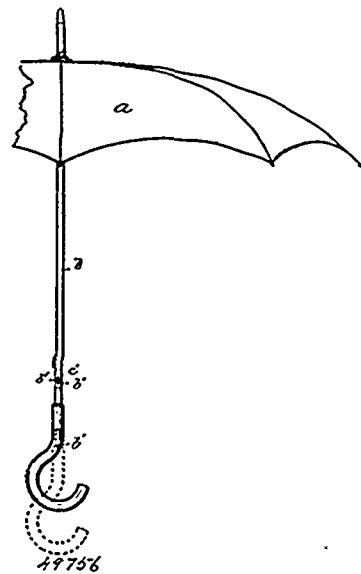
No. 49,755. Method of Manufacturing Cement.

(Méthode de fabrication de ciment.)

Jasper Whiting, Chicago, Illinois, U.S.A., 24th August, 1895; 6 years.

Claim.—1st. The method of manufacturing cement from slags which consists in chilling molten slag, drying and grinding the product and adding thereto caustic soda or its equivalent in a dry state. 2nd. The method of manufacturing cement from slags which consists in chilling molten slag in water as it comes from the furnace, drying and grinding the slag and adding thereto slaked lime and caustic soda in a dry state and in the proportions substantially as set forth. 3rd. A cement composed of blast furnace or other slag in a dry pulverized form and caustic soda in a dry state, in substantially the proportions set forth. 4th. A cement composed of blast furnace or other slag in a dry pulverized form and caustic soda and slaked lime in a dry state and substantially in the proportions set forth.

No. 49,756. Umbrella. (Parapluie.)



The Gripsack Umbrella Company, assignee of Clarence C. Frost, both of Glens Falls, New York, U.S.A., 24th August, 1895; 6 years.

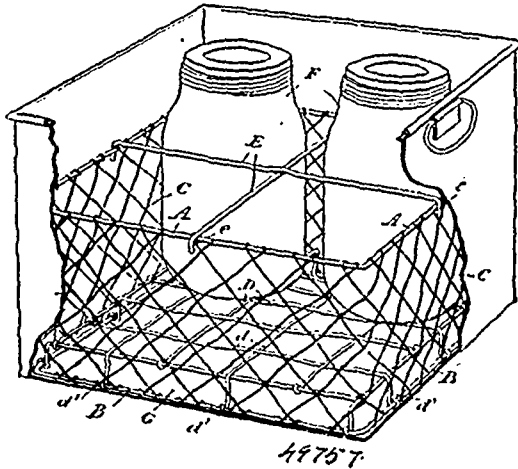
Claim.—In an umbrella, in combination, a stick having a circumferentially slotted and chambered end, a handle section reduced to enter said chambered end and provided with a spring latch adapted to interlock with said circumferential slot, all substantially as and for the purpose specified.

No. 49,757. Combined Vessel and Crate for Preserving Fruit, etc. (Vaisseau et caisse pour préserver les fruits, etc.)

Elizabeth Ann Hegler, Toronto, Ontario, Canada, 24th August, 1895; 6 years.

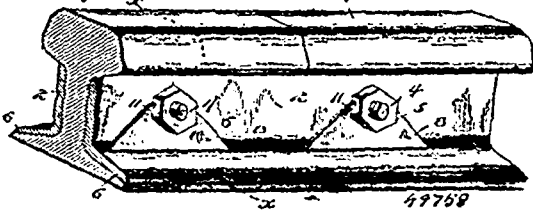
Claim.—The combination with the vessel for holding the boiling water, of a crate provided with top edge and bottom edge, open

work sides and raised bottom supported upon the bottom edges of the crate by the depending ends of the cross wires or bars having the



depending ends fitting over the top edge of the crate as and for the purpose specified.

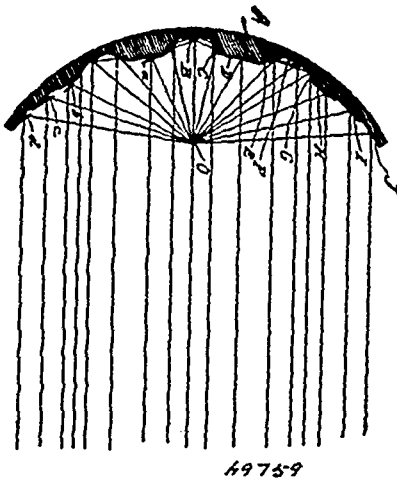
No. 49,758. Nut Lock. (Arrête écrou.)



George H. Beaumont, Quincy, Illinois, U.S.A., 24th August, 1895; 6 years.

Claim.—A nut lock for rail joints consisting of a reversible triangular-shaped non-resilient washer-plate provided with a straight lower edge, and an elongated vertically disposed bolt slot or opening adapted to fit over a bolt and permitting an adjustment of the washer plate to bring the straight lower edge thereof against the flange of the fish-plate of the rail joint, said reversible washer-plate being further provided at both sides of its upper angle or apex with angular cut-away portions or notches, forming opposite triangular side locking tongues or points, either of which tongues or points is adapted to be bent out from the plane of the plate against the side of the nut, substantially as set forth.

No. 49,759. Reflector. (Réflecteur.)

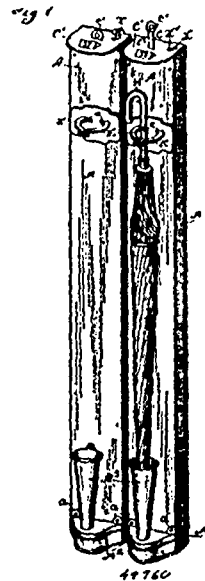


Hercule Alexander Crevier, Montreal, Quebec, Canada, 24 août, 1895; 6 ans.

Résumé.—Un réflecteur ayant la forme générale d'une calotte sphérique, constituée par une charpente en bois ou en métal à laquelle se trouvent fixées de la manière cidessus décrite des rangées

de facettes B, C, D, a, b, c, d, réfléchissant parallèlement les rayons lumineux provenant d'un foyer o.

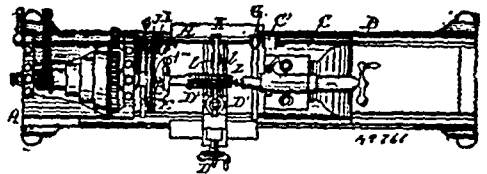
No. 49,760. Umbrella Stand. (Porte-parapluie.)



Henry Westphal and Henry W. Beauchamp, both of Chicago, Illinois, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. The combination of a support or casing with a receptacle at its lower part for the lower end of the umbrella, a clasp pivotally secured in the casing to engage the upper part of the umbrella, a locking mechanism located in the upper part of the casing and a bar uniting the clasp and lock, provided with a projection to engage the latter and a device to engage the inner ends of the arms of the clasp and to hold it in a closed position, substantially as described. 2nd. A lock comprising a casing, a sliding plate, a recessed cam, and tumblers to engage the plate, a key-guide and a forked cam to engage with and to extend and retract the sliding plate, substantially as described.

No. 49,761. Lathe. (Tour.)

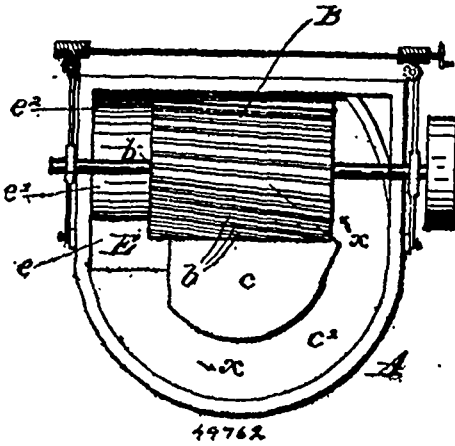


William Anderson Robertson, Cedar Rapids, Iowa, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. The combination with a lathe, substantially as described of cams mounted on its face-plate and separated a short distance therefrom by intermediate washers or thimbles, a flange traveller mounted on an upwardly extending arm, connected with a rectangular rock-shaft, suitable bearings for said rock-shaft, a crank arm mounted to slide freely on said rock-shaft, and a bar connecting said crank with the tool-slide, and means for holding said traveller in contact with the cams, substantially as and for the purpose set forth. 2nd. In a lathe the combination with its face-plate of adjustable cams corresponding in lumbe. to the sides of the work designed to be turned, a crank arm provided with a suitable traveller adapted to ride on the outer faces of cams, means for retaining the same in contact with said cam surfaces, a rock-shaft on which said arm is mounted, a crank thereon and a connection of said crank with the tool-slide, substantially as and for the purpose set for. 3rd. The combination with a lathe, substantially as described, of one or more cams mounted on the face-plate, a rock-shaft, bearing blocks adapted to retain said rock-shaft, a crank arm or lever, with a traveller connected therewith, adapted to ride on the side cams, a crank connection of said rock-shaft with the tool-slide, a spring connected with an arm extending from said rock-shaft to draw the traveller into contact with the cams, and a stop to limit the inward throw of said traveller. 4th. In a lathe the combination of a face-plate provided with one or more cams mounted thereon, the rock-shaft H, angular in cross section, the arm I suitably fixed thereto, and provided with a traveller moving on the surface of said cams, the crank K adapted to slide on said

rock-shaft, connecting rod or bar L, bearings h h, and the bearing blocks G G, substantially as and for the purpose set forth. 5th. In a lathe the combination with the face-plate provided with one or more cams of the rock-shaft H, the traveller J and its arm I connected with said rock-shaft, crank K adapted to slide on said rock-shaft, connecting bar L, lever M, spring N, and adjustable post P, substantially as and for the purpose set forth.

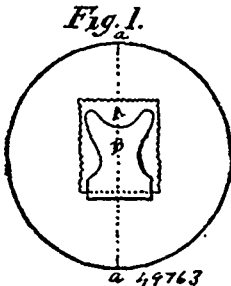
No. 49,762. Pulp Engine. (Machine à pulpe.)



Larkin Ashley Thomas, Banning, Georgia, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. In a pulp-engine, a cylinder carrying knives and running in the concave portion of the casing, a channel formed in said casing terminating at each end of the said cylinder, the aforesaid concave portion being cut away at the channel outlet to expose a portion of the working face of said cylinder to the direct flow of stuff, substantially as and for the purpose specified. 2nd. In a pulp-engine, a concave and a cylinder mounted thereon, knives set in said concave and cylinder, a channel leading from the bottom of said concave and a vertically adjustable dam therein near the said cylinder, for the purpose specified. 3rd. In a pulp-engine, a concave and a channel leading therefrom, a cylinder mounted in the said concave, a curved piece set and sliding circumferentially within said concave at the point of the opening therefrom of the said channel, and means for securing said curved piece in any set position, for the purpose specified. 4th. In a pulp-engine, a concave and a channel leading therefrom, a cylinder mounted in said concave, a curved plate set and sliding circumferentially in said concave at the point of the opening therefrom of the said channel, a leaf hinged to the upper edge of the said plate its free end resting upon the bottom of the channel, and means for securing the said plate in any set position substantially as and for the purpose specified.

No. 49,763. Watch Case. (Boîte de montre.)

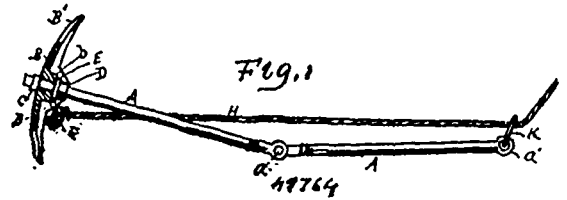


William Marion Rush, St. Joseph, Missouri, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. As a new article of manufacture, a watch case having inside of the same and attached to one of its lids or discs a holder for stamps consisting of a thin piece of material overlapping and retaining the stamps against lateral displacement substantially as and for the purpose described. 2nd. A watch case provided with a stamp holder in one of its lids or discs and a corresponding recess or depression in the adjacent lid or disc to accommodate the stamp holder, substantially as shown and described. 3rd. As a new article of manufacture, a watch case having inside of the same and attached to one of its lids or discs, a holder for stamps consisting of a thin piece of material fixed to the lid or disc in central position and overlapping and retaining the stamps against lateral displacement, substantially as shown and described. 4th. As a new article of manufacture, a watch case having inside of the same and attached

to one of its lids or discs a holder for stamps consisting of a thin piece of elastic or springing material fixed to the lid or disc in central position and overlapping and retaining the stamps against lateral displacement, substantially as shown and described. 5th. As a new article of manufacture, a watch case having inside of the same and attached to one of its lids or discs, a holder for stamps consisting of a thin piece of elastic or springing material fixed to the lid or disc in central position and overlapping and retaining the stamps and side flanges on each side of said holder, substantially as and for the purposes described. 6th. As a new article of manufacture, a watch case having inside of the same and attached to one of its lids or discs in central position an overlapping stamp holder and having this same lid or disc recessed or depressed at a point opposite such holder, substantially as and for the purpose described.

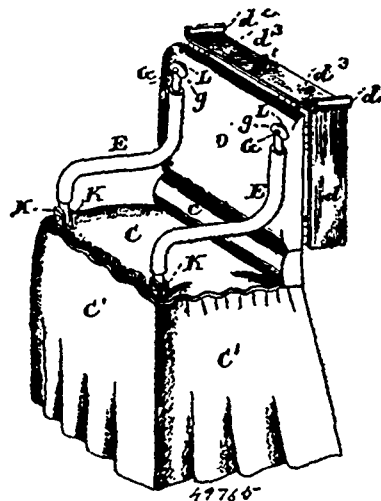
No. 49,764. Anchor. (Ancre.)



Charles Rodenck Reeves, Fitchburg, Massachusetts, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. In an anchor of the character described, the combination of the head B, provided with radial flukes B¹, set at such a curve or angle as to project substantially vertically into the sea bottom or ground, and the jointed shank A, A¹, provided with the ring K, said shank being furnished with means for attaching the rope or warp-chain to it near the head and said warp-chain being thereby attached and extending through said ring K, substantially as described. 2nd. The hereinbefore described improved anchor, comprising the head B, provided with the radial flukes B¹, the jointed shank A, A¹, the portion A thereof being secured to the head and being provided with the check-ring D, and the portion A¹ thereof being provided at its free end with the ring K, and the double looped ring E, E¹, secured loosely on the portion A, of the shank between said head and check-ring, and the rope or warp chain H, extending from said double looped ring E, E¹, through said ring K, substantially as set forth.

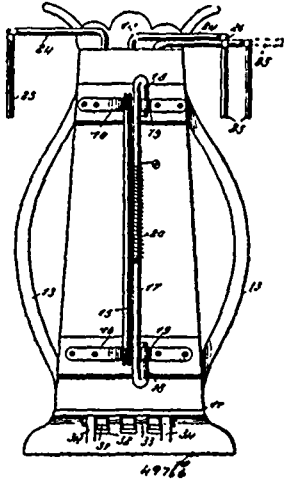
No. 49,765. Trunk. (Coffre.)



William Christian Thoras Hansen, Seattle, Washington, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. A trunk having an upholstered lid or cover C, with a rigid back c at right angles thereto, in combination with a sofa back D, hinged to the back c, the side-flaps d d', hinged to back D, and the top-flap d¹, having the up-turned flanges d², d², whereby said trunk may be converted into a sofa as set forth. 2nd. In trunks which are convertible into sofas, the combination with the true cover and the sofa back, of the braces E E, hinged at one end to the true-cover and connected detachably to the back by a hook and bolt, the said braces being adapted to turn down on their hinges to lie between the cover and back, substantially as shown and described.

No. 49,766. Music Leaf Turner.
(*Tourne feuille de musique.*)

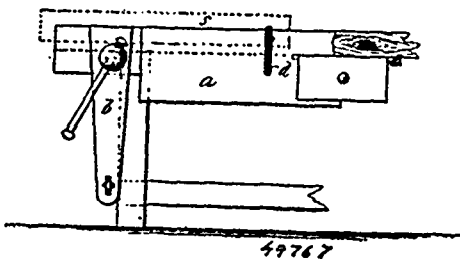


James Flemming, Buffalo, New York, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. A music leaf turner, comprising a supporting frame, a holder on the front of the frame, spring-pressed arms journalled on the back of the frame near the top and bottom thereof, and extending over the top and front of the frame, a projection on each of said arms arranged near the lower end thereof, means for engaging the said projection, and a releasing key for each arm fulcrumed in the frame, the rear ends of the said keys being adapted to engage the lower ends of the arms and lift the same to disengage the projection, substantially as described. 2nd. The combination, with the frame, and the vertically movable and spring-turned rods thereon having at their upper ends depending fingers to engage the music leaves, of the fixed bushings encircling the rods and provided with shoulders, pins on the rods to engage the shoulders of the bushings, and keys fulcrumed beneath the rods and adapted to engage the lower ends thereof, substantially as described. 3rd. The combination, with the frame, and the leaf turning mechanism thereon, of the holder comprising a longitudinally extending rod supported in front of the body of the frame, and a second swinging spring-pressed rod arranged parallel with the first rod and having its ends doubled to form cranks, the crank ends being journalled on the front of the frame, substantially as shown and described. 4th. The combination, with the frame, and the leaf turning mechanism thereon, of the holder comprising springs secured to the front of the frame near the top and bottom thereof, a rod arranged on the front of the frame and supported on the free ends of the said springs, brackets secured on the front of the frame opposite the said springs, and a second swinging spring-pressed rod journalled in the said brackets and held parallel with the first rod, substantially as described. 5th. The combination, with the frame, and the leaf turning mechanism thereon, of the holder comprising a rod held on the face of the frame in spring supports, a second rod doubled at its ends to form cranks, the second rod being parallel with the first, brackets secured to the frame to support the cranks, and a spring on the second rod secured to the rod and to the frame, substantially as described.

No. 49,767. Combined Bench Pin, Guide and Knife, for Carpenters. (*Cheville d'établi, guide; et couteau de charpentier combinés.*)

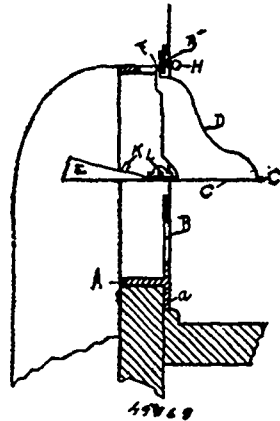
5661



Jacob Henry Fredericks, Newark, New Jersey, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. An adjustable and removable stay pin bracket for carpenter's benches, consisting of a slotted angle bracket provided with pins on one arm adapted to enter the face of the bench to support and secure the bracket thereon and a support adapted to be raised or lowered in the slot of said bracket along the side of the bench, and with a bench knife pivotally secured to the arm of the bracket which is secured to the face of the bench, substantially as described. 2nd. In a carpenter's bench an adjustable and removable stay pin bracket consisting of two portions at right angles to each other, one portion being parallel to the face of the bench and provided with pins adapted to secure said bracket to the face of the bench and also carrying a bench knife which is pivotally secured thereto while the other is parallel to the side of the bench and slotted to receive a removable supporting spool adapted to be adjusted therein, substantially as described. 3rd. The combination in the bracket *d*, of the slotted portion *e* and portion *f*, with the bolt *h*, spool *g* and lug *i* sliding in the slotted portion *e*, and with the pins *k* and bench knife *l* secured to the portion *f*, substantially as described. 4th. The combination in the bracket *d*, of the slotted portion *e* and portion *f* at right angles thereto, with the pins *k* and with a bench knife pivotally secured to the portion *f*, all said parts substantially as and for the purpose described.

No. 49,768. Warm Air Register. (*Registre à air chaud.*)

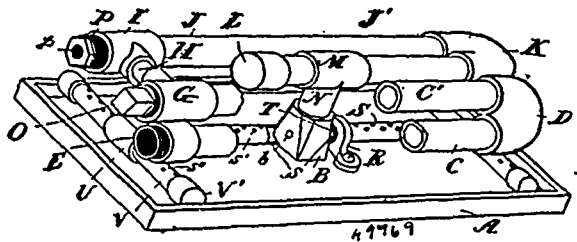


Charles H. Foster, Omaha, Nebraska, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. In a warm air register, comprising a suitable supporting frame, the combination of a solid valve panel, horizontally pivoted within said frame, and provided with an open fretted foot rest, substantially as and for the purpose set forth. 2nd. In a warm air register comprising a suitable supporting frame, the combination of a solid valve panel, horizontally pivoted and radially adjustable within said frame, and provided upon the rear with a dirt receptacle, and foot rest, substantially as shown and for the purpose set forth. 3rd. In a warm air register, the combination of the following instrumentalities, to wit, the frame A, provided with the guard B, the valve panel C, provided with the foot rest D, and dirt receptacle E, the catch H, and the springs K, all arranged substantially as shown and described.

No. 49,769. Hydro-Carbon Burner.

(*Foyer à hydro-carbures.*)



William Midgley, assignee of John C. Burke, both of Paris, Ontario, Canada, 26th August, 1895; 6 years.

Claim.—1st. In a hydro-carbon burner, a retort composed of gas pipes and steam pipes with an oil inlet orifice in the end of one of the gas pipes, and a water inlet orifice in the end of one of the steam pipes, in combination with a nipple connecting that end of the gas pipe in which the oil inlet orifice is located with that end of the steam pipe which is remote from the water inlet orifice, suitable couplings, a down pipe connected with the inner gas pipe and centrally located so as to fit onto a hollow standard provided with

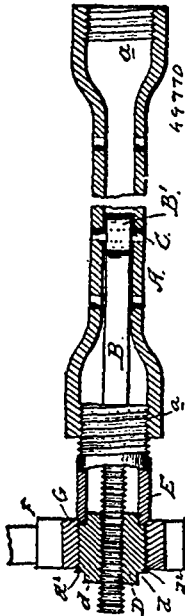
orifices for the gas, burners supported on brackets with flame orifices and with mouths facing the orifices in the standard, a pan on which the hollow standard is centrally formed or fixed, an oil pipe and a water pipe for conducting the water and oil from suitably located tanks to the water inlet and oil inlet of the retort, and cocks for regulating the flow of the oil, substantially as specified.

2nd. In a hydro-carbon burner, the combination of the pan A, the hollow standard B, with orifices *b*, the burners S, with flame orifices *s*¹, and mouths *s*, facing orifices *b*, brackets R, coupling U, and transverse burners V, with flame orifices *s*¹¹, the coupling M, the down pipe N, gas pipes J, J¹, cap L, coupling K, the coupling I, plug P, with threaded orifice *p*, to receive the end of the oil pipe Q, nipple H, coupling G, plug O, steam pipe C, located above the steam pipe C, coupling D, water inlet E, to receive the end of the water pipe F, and located in the end of the lower steam pipe C, substantially as described and for the purpose specified.

3rd. In a hydro-carbon burner, the combination of the pan A, hollow standard B, with orifices *b*, steam pipes C, C¹, of the retort, coupling D, water inlet E, water pipe F, cock *f*, water tank V, T-coupling G, plug O, nipple H, T-coupling I, plug P, with threaded orifice *p*, oil nipple W, oil pipe Q, cock *q*, oil tank X, gas pipes J, J¹, of the retort, U-coupling K, cap L, T-coupling M, with down pipe N forming the shank and centrally located, brackets R, burners S, with mouths *s*, and flame orifices *s*¹, T-coupling U, transverse burners V, and flame orifices *s*¹¹, caps V¹, chamber G¹, chamber I, and cover Z, with perforations *s*, substantially as described and for the purpose specified.

4th. In a hydro-carbon burner, the combination of the hollow standard B, with orifices *b*, the burner S, with flame orifices *s*¹, the coupling M, the down pipe N, gas pipes J, J¹, cap L, coupling K, the coupling I, plug P, with threaded orifice *p*, to receive the end of the oil pipe Q, nipple H, coupling G, plug O, steam pipe C¹, steam pipe C, coupling D, water inlet E, to receive the end of the water pipe F, and located in the end of the steam pipe C, substantially as described and for the purpose specified.

No. 49,770. Nipple Holder. (Porte-mamelon.)



Joseph Canney, Butte City, Montana, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. In combination, with the stock and rod of a nipple holder, substantially as described, a holding nut seated on the end of the rod and having a shoulder equal in diameter to the exterior diameter of the nipple against which it bears, said shoulder being exteriorly threaded whereby the die is seated thereon and is guided and forced directly by the shoulder-thread upon the nipple, substantially as herein described.

2nd. In combination, with the stock and rod of a nipple holder, substantially as described, a holding nut seated upon the end of the rod, said nut having a shoulder equal in diameter to the exterior diameter of the nipple against which it bears, and having a length equal to the thickness of the die, said shoulder being exteriorly threaded and adapted to engage the die whereby the latter is guided and forced directly upon the nipple, substantially as herein described.

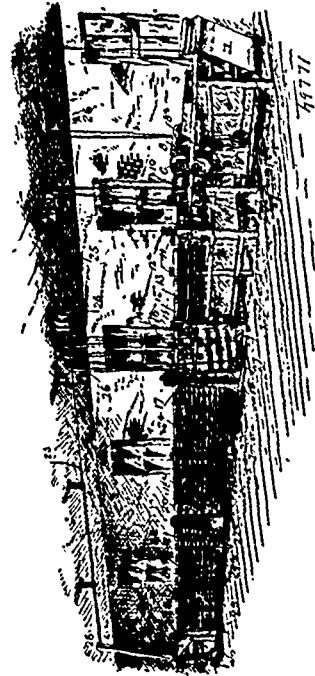
3rd. In a nipple holder of the character herein described, the combination of a bushing adapted to be seated in the end socket of the stock of the holder, and holding nuts having exteriorly threaded shoulders with diameters equal to the interior diameters of the several bushings, substantially as herein described.

4th. In a nipple holder of the character herein

described, the combination of the stock having upon its end the exterior threads, the internally threaded socket seated upon said stock and adapted to receive the nipple end, and holding nuts having exteriorly threaded shoulders with diameters equal to the exterior diameter of the nipples to be cut, substantially as herein described.

No. 49,771. Machine for Coating Paper.

(Machine à enduire le papier.)



Walter Sparks, New York, State of New York, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. In a machine for coating or enamelling paper, the combination with the coating-applying brushes and the polishing brushes, of two separate sets of combined dryers and feeders, to wit, a first or preliminary dryer, located between the coating-applying brushes and the polishing or burnishing brushes, and a second or finishing dryer, located in front of said polishing-brushes and comprising one or more stacks of heated endless aprons for the final drying and finishing of the web or webs of coated or enamelled paper, each one of said dryers comprising a stack of movable endless aprons adapted to be heated, substantially as set forth.

2nd. The combination with a machine for coating or enamelling paper in continuous webs, of one or more combined dryers and feeders, comprising, each, a stack of movable endless aprons adapted to be heated, substantially as set forth.

3rd. The hereinbefore described coating or enamelling machine, comprising the coating-applying brushes between which the web or webs of paper pass, the combined feeding and drying endless aprons for receiving said web or webs from the coating brushes, the transversely reciprocating polishing brushes adapted to polish and burnish the opposite faces of the web or webs of paper, and the stacks of drying and feeding aprons for finishing the coating, substantially as set forth.

4th. The herein described method of drying coated or enamelled paper as it comes from the polishing brushes of the coating or enamelling machine proper, which consists in feeding the paper alternately forward and backward between a series of movable endless aprons, comprising a stack, adapted to be heated and to gently push the paper along by friction between the series of contiguous or adjacent heated aprons comprising the stack, substantially as set forth.

No. 49,772. Machine for Compressing Metal Rings.

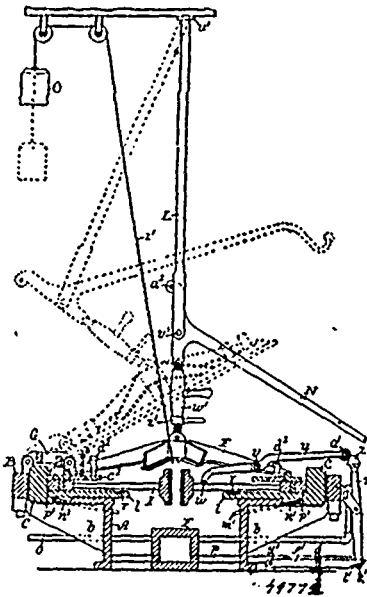
(Machine à compresser les anneaux en métal.)

Jonathan Burns West, Rochester, New York, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. A machine for setting tyres, comprising a frame and a series of movable cylinders or compressing jaws held thereon, and means to operate the latter, in combination with a straightening ring or spider over the jaws or cylinders, connected with the frame, with means for controlling said straightening ring.

2nd. A machine for setting tyres, comprising a frame and a rigid base ring supported thereon, a series of pistons secured to the inner face of said base ring, radially movable cylinders within the ring, supported by the

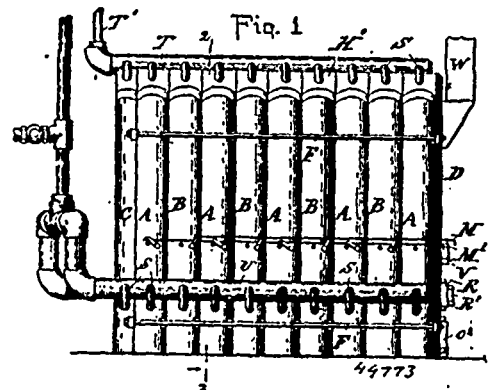
frame and co-acting with the pistons, and a pump or similar means for supplying a fluid under pressure to the interiors of the cylinders



to urge the latter toward the centre of the ring. 3rd. A machine for setting tyres, having a frame holding a rigid base ring, a series of stationary pistons on the interior of the base ring, radially movable cylinders within the ring, held by the frame to co-act with the pistons, a floor for the wheel, a pump and pipes connecting it with the spaces within the cylinders, a cock for controlling the flow of fluid from the pump, an arm or lever adapted to bear upon the spokes of the wheel, and gearing connecting said arm or lever with the cock whereby the disc of the wheel operates the cock to control the flow of the fluid. 4th. A machine for setting tyres, comprising a frame and a rigid base ring held thereby, a series of stationary pistons on the inner face of the base ring, radially movable cylinders within the ring co-acting with the pistons, formed with inward projections to receive the wheel, said projections being provided with equalizers to cause the cylinders to move uniformly, and a pump or similar means to force fluid into the interiors of the cylinders. 5th. A machine for setting tyres, comprising a frame and a rigid base ring supported thereon, a series of pistons secured to the inner face of said base ring, movable cylinders within the ring supported by the frame and co-acting with the pistons, and a pump or similar means for supplying a fluid under pressure to the interiors of the cylinders to move the latter against the tyre, and springs to push the cylinders back toward the base ring. 6th. A machine for setting tyres, comprising a frame and a rigid base ring held thereby, a series of stationary pistons on the inner faces of the base ring, movable cylinders within the ring, co-acting with the pistons, formed with inward projections to receive the wheel, a straightening ring or spider over the wheel with standard and lever to press it upon the wheel, and a pump or similar means for supplying a fluid under pressure to the interiors of the cylinders. 7th. A machine for setting tyres, comprising a frame and a rigid base ring held thereby, a series of stationary pistons on the inner face of the base ring, movable cylinders within the ring, co-acting with the pistons, formed with inward projections to receive the wheel, a straightening ring or spider over the wheel with standard and lever to press it upon the wheel, and a pump or similar means for supplying a fluid under pressure to the interiors of the cylinders, the spider being provided with removable concentric rings, with means to control them. 8th. A machine for setting tyres, having a frame and a base ring supported thereon provided with a series of pistons on its inner surface, and a series of cylinders co-acting with the pistons and adapted to slide in bearings upon the frame, in combination with a fluid chamber within the frame, connected with the cylinders by a series of pipes, and means to force fluid into the chamber. 9th. A machine for setting tyres, comprising a frame, and a series of movable cylinders or compressing jaws held by the frame, forming a floor for the wheel, and means to operate the compressing jaws, in combina-

tion with a series of blocks or dies upon said floor for the wheel, co-acting with the compressing jaws or cylinders, and formed concave on their inner faces to fit the tyre.

No. 49,773. Water Heater. (Calorifere.)



Charles Tuck Toulmin, New York, State of New York, U.S.A.,
26th August, 1895; 6 years.

Claim.—1st. A water heater or boiler constructed of a series of cast vertical sections, each formed with side water-legs G G¹, a transverse steam and water head H, a transverse water-waist I, and a transverse water-bridge J or J¹ of less thickness than the water-legs and head, the combined spaces below the water-waists constituting the combustion chamber, and the vertical spaces between the water-bridges a succession of vertical flues connected with the back of the combustion chamber, and supply the return pipes connected respectively with the head and water-leg of each section, substantially as herein shown and described. 2nd. A water heater or boiler constructed of a series of vertical sections, each formed with side water-legs G G¹, a transverse steam and water head H, a transverse water-waist I, and a transverse water-bridge J or J¹ of less thickness than the water-legs, the combined spaces below the water-waists I, constituting the combustion chamber, and the alternate sections formed with spaces respectively between the water-bridges J and the water-heads H and between the water-bridges J¹ and the water-waist I, said spaces and the vertical spaces between said water-bridges to constitute a vertically zig-zag escape flue connected with the back of the combustion chamber, and supply and return pipes connected respectively with the head and leg of each section, substantially as herein described. 3rd. A water heater or boiler constructed of a series of vertical sections, each formed with side water-legs G G¹, a transverse steam and water-head H, a transverse water-waist I, and a transverse water-bridge J or J¹ of less thickness than said water-legs, the combined spaces below the water-waists I constituting the combustion chamber, and the alternate sections formed respectively with spaces between the water-bridges J¹ and the water-waists I, and both above and below the water-bridges J, said spaces and the vertical spaces between said water-bridges to form a vertically zig-zag escape flue, cut-offs in the spaces below the water-bridges J, means for operating said cut-offs, and supply and return pipes connected with the head and leg, respectively, of each section, substantially as herein described. 4th. In a sectional water-heater or boiler a section A formed with a transverse water-bridge J connecting the vertical water-legs G G¹ which are thicker than said bridge, separated from the water-head H by a space K, and formed with a V-shaped top J², as and for the purpose hereinbefore set forth. 5th. The sectional water-heater or boiler herein described having water-legs G G¹, and abutting water-waists I forming the sides and top respectively of the combustion chamber, said water-legs being formed with ledges P, in combination with a tubular water grid G resting on the ledges P above the grate and below the water waists I, to be connected at opposite ends with the supply and the return pipes respectively, as set forth. 6th. In a sectional water-heater or boiler as described, the combination with each water-section and the collecting pipe provided with threaded coupling sleeves S², S¹, of a bend S³ having coupling ends threaded oppositely to the respective coupling sleeves S², S¹, and couplers S⁴, S⁵, each having its ends oppositely threaded, substantially as and for the purpose hereinbefore set forth.

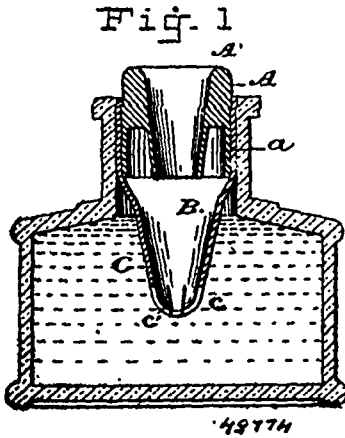
No. 49,774. Attachment for Ink Bottles, etc.

(Attache pour encriers, etc.)

Levi Hoffman Thomas, New York, State of New York, U.S.A.,
26th August, 1895; 6 years.

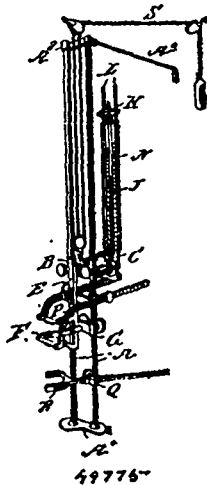
Claim.—1st. An attachment for ink bottles and the like, consisting of a stopper proper having a central aperture, a recess or groove opening downwardly and arranged around the said aperture, and a tube extending down from the outer wall of said recess or groove and having a flexible lower end provided with a suitable valve or valves, substantially as described. 2nd. An attachment for ink bottles and the like, consisting of a stopper proper having a central

aperture, tube extending down from said stopper and having a flexible lower valved end, and a recess or groove intermediate of the



stopper and said tube. 3rd. An attachment for bottles and other liquid or semi-liquid containing receptacles, consisting of a stopper proper having a central aperture, an annular recess or groove around said aperture, and a flexible tube projecting down from the stopper proper and having its upper portion tightly clamped between the stopper proper and the neck of the bottle, and its lower end provided with suitable valves, substantially as and for the purpose described. 4th. As a new article of manufacture, a liquid or semi-liquid containing receptacle having a suitable neck, a stopper proper inserted in said neck and having a central aperture and an annular recess or groove around said aperture, and a tube extending down from the outer side of said stopper proper and having a valved flexible lower end. 5th. An attachment for bottles and other liquid or semi-liquid containing receptacles, consisting of a stopper proper having a central aperture and a flexible tube projecting down from the stopper proper and having its upper portion tightly clamped between the stopper proper and the neck of the receptacle, and its lower end provided with a suitable valve, substantially as and for the purposes described.

No. 49,775. Testing-machine. (Machine à éprouve)



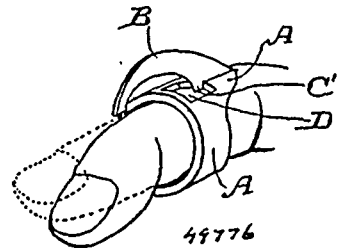
John H. Kellogg, Battle Creek, Michigan, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. A testing machine comprising a vertical standard, a cross-head adjustable vertically on the standard, a horizontal cylinder mounted on the cross-head and provided with a piston having a piston rod extending toward the standard, a fluid-containing chamber communicating with the cylinder and provided with a graduated indicator tube, and a vertically rocking lever pivotally connected with the standard and having one arm extending in operative relation to said piston rod, substantially as described. 2nd. A testing machine comprising a vertical frame or standard, a vertically adjustable counter-balanced cross-head on the standard, a cylinder carried thereby and provided with a piston having its rod extending through one end, a liquid-containing chamber communicating with the cylinder and having an indicating tube, a second adjustable cross-

head on the standard and a lever pivoted to the cross-head and extending at one end into operative relation with the piston rod, substantially as described. 3rd. A testing machine comprising a vertical standard provided with a series of vertically adjustable cross-heads, a cylinder on the upper cross-head provided with a piston having a piston rod extending through one end, and a liquid-containing chamber communicating with said cylinder and provided with an indicator tube, a horizontal rest adjustable in the middle cross-head, and a lever mounted on the lower cross-head and extending at one end into operative relation with said piston rod, substantially as described. 4th. A testing machine comprising a cylinder, a piston in the said cylinder and adapted to be pressed by the muscular power exerted by the operator, a vessel connected with the said cylinder and containing mercury, water and oil, of which the latter extends into the cylinder, and a tube extending into the said mercury to permit the latter to ascend in the tube, substantially as shown and described. 5th. A testing machine comprising a vertical standard, and a counter-balanced indicator mechanism vertically adjustable on the standard toward and from the said indicator mechanism and in operation thereto.

No. 49,776. Finger Ring Twine Cutter. (Coupe-ficelle.)

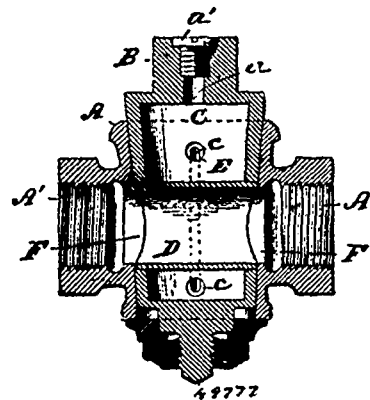
Fig. 1



James Wallace, Oakland, California, U.S.A., 26th August, 1895; 6 years.

Claim.—A twine cutting device consisting of a ring adapted to fit the finger having a rearward extension upon the back and an opening made between said extension and the front edge of the ring, a concave-convex blade, the rear end of which is fixed to said rearward extension, the front end projecting over and beyond the front edge of the ring and having the inner concave sharpened edge in a plane above the opening in the ring.

No. 49,777. Stop Cock. (Robinet ordinaire.)

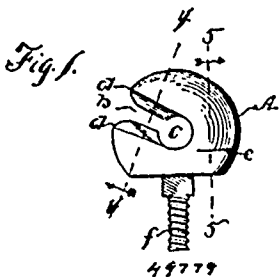


Edward Merrill Dart, Stanton B. Champlin and George B. Champ- lin, all of Providence, Rhode Island, U.S.A., 26th August, 1895; 6 years.

Claim.—The herein described stop cock, consisting of a shell which provides a seat for the plug, a plug formed as a shell and fitting closely therein, said plug having a lubricant-containing chamber extending entirely throughout the same so that the plug consists simply of a thin enclosing wall, said chamber having lateral openings on the sides of the plug which are closed by the wall of the surrounding shell, and said plug having also a top inlet opening communicating with the inner chamber through which lubricating material may be placed within the chamber, the horizontal pipe or tube secured tightly at its opposite ends in openings in the side

walls of the plug so that the said tube may provide a transverse passage through the plug and the vertical grooves formed in the interior face of the wall of the shell and arranged to be in communication at their upper and lower ends with the lateral openings in the lubricant-containing chamber whenever the plug is opened but not in communication therewith when the plug is closed, the whole arranged so that the lubricating material within the chamber may spread itself by capillary attraction through the joints between the plug and the seat, substantially as described.

No. 49,778. Rein Holder. (Porte-rênes.)

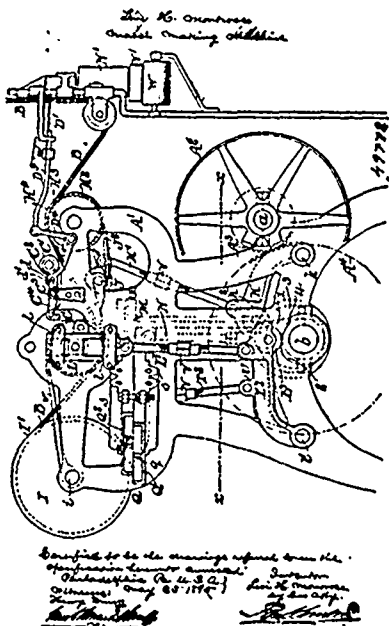


Fred W. Powers, Reinbeck, Iowa, assignee of David F. Maine, Mansfield, Ohio, all in the U.S.A., 26th August, 1895; 6 years.

Claim.—1st. A rein holder consisting of two parts, to wit: A hook-shaped part that has a journal bearing in its centre and an open slot extending outward rearwardly and its bottom adapted in form to be fixed to a harness saddle, and a loop adapted to admit a rein and provided with a forward extension and a journal at the end of the extension, as shown and described. 2nd. A rein holder composed of a check-hook part A, having a slot *b*, a journal bearing *c*, at the inner end of the slot, ribs *d* on the faces of the slot, and a part B, consisting of a loop *h* having an integral journal *i*, provided with grooves at its centre and flanges *k* at its ends, and adapted to traverse the slot *b*, to operate in the journal bearing *c*, in the manner set forth for the purposes stated.

No. 49,779. Match Making Machine.

(Machine à faire les allumettes.)



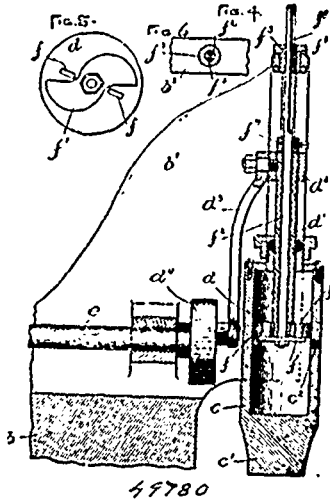
Levi H. Montross, Camden, New Jersey, and Adolph Segal, Philadelphia, Pennsylvania, U.S.A., 26th August, 1895; 6 years.

Claim.—1st. In a match making machine, the combination of a movable splint carrying apron, a reciprocating splint cutter and means to intermittently depress the splint carrying apron toward the cutter to take the splints therefrom. 2nd. In a match making machine, the combination of a splint carrying apron, an intermittently operated driving cylinder for said apron, a reciprocating splint cutter, and means to intermittently depress the driving cylinder towards the cutter to cause the apron to receive the splints. 3rd. In a match making machine, the combination of a movable

splint carrying apron, a reciprocating splint cutter, feeding devices for feeding a block of wood to the cutter, means to intermittently operate the splint cutter and wood feeding devices respectively, so timed that the wood is fed under the cutters when they are in a raised position, and means to depress the splint carrying apron toward the cutter after the wood feeding devices have operated. 4th. In a match making machine, the combination of a splint carrying apron, an apron driving cylinder or drum below which said apron passes, means to intermittently rotate said cylinder or drum, a reciprocating splint cutter, and means to intermittently depress the apron driving cylinder towards the cutter. 5th. In a match making machine, the combination of a splint carrying apron, an apron driving cylinder or drum under which said apron passes, a reciprocating splint cutter and alternately operating means to intermittently rotate the apron driving cylinder or drum and to depress it toward the cutter. 6th. In a match making machine, the combination of two driving cylinders or drums, a splint carrying apron or drum passing above one cylinder or drum and below the other, means to intermittently rotate said cylinders or drums in opposite directions, a reciprocating splint cutter located below the cylinder or drum under which the apron passes, and means to intermittently depress the latter cylinder or drum and thereby carry the apron toward the splint cutter. 7th. In a match making machine, the combination of two driving cylinders or drums, a splint carrying apron or drum passing above one cylinder or drum and below the other, to intermittently rotate said cylinders or drums in opposite directions, a reciprocating splint cutter located below the cylinder or drum which the apron passes, and means to intermittently depress the latter cylinder or drum and thereby carry the apron toward the splint cutter. 8th. In a match making machine, the combination of two driving cylinders or drums, a splint carrying apron or drum passing above one cylinder or drum and below the other, to intermittently rotate said cylinders or drums in opposite directions, a reciprocating splint cutter located below the cylinder or drum under which the apron passes, means to intermittently depress the latter cylinder or drum and thereby carry the apron toward the splint cutter, and guides for said apron beyond the latter cylinder or drum. 9th. In a match making machine, the combination of two driving cylinders or drums provided with oppositely arranged ratchets, a rock shaft, pawls carried by said rock shaft on opposite sides thereof and engaging said ratchets, means to intermittently operate said rock shaft, a splint carrying apron passing over one cylinder or drum and under the other, and a cutter to cut a series of splints and deliver them to the apron. 10th. In a match making machine, the combination of a splint carrying apron, a reciprocating cutter, intermittently operating devices to feed a block of wood to the cutter, and means to intermittently drive the apron and depress it toward the cutter. 11th. In a match making machine, the cutter frame consisting of a base frame, and a removable cutter carrying plate provided on its upper surface with transverse end ribs *M* and a continuous longitudinal guide for holding a series of cutters in alignment. 12th. A cutter carrying plate for a match making machine provided with a flat surface, and transverse end ribs and a continuous longitudinal guide for holding a series of cutters in alignment. 12th. The combination of a cutter plate of a match making machine and the cutter adapted thereto, said cutter plate and cutter being provided with an engaging device consisting of a projection on one of the parts and a recess on the other, the member of the engaging device which is carried by the cutter plate being continuous to permit the cutter to be moved laterally thereon without disengagement or affecting its longitudinal adjustment. 13th. The combination of a cutter plate of a match making machine and a cutter adapted thereto provided with a series of engaging parts located at different distances from the eye of the cutter plate, the cutter being provided with a complementary longitudinal continuous engaging part adapted to engage any one of the engaging parts of the cutter and permit the cutter to be moved laterally without disengagement or affecting its longitudinal adjustment. 14th. In a match making machine, the combination with the cutter frame of a cutter plate carried thereby, provided with transverse shoulders at its ends and a continuous longitudinal engaging part on its face, a series of splint cutters lying side by side upon the face of the cutter plate between the transverse ribs and provided with an engaging part adapted to engage the longitudinal engaging part on the face of the cutter plate to hold the cutters in longitudinal adjustment with freedom of lateral movement, and a key to clamp said cutters firmly between said shoulders at the ends of the cutter plate. 15th. In combination with the splint cutting devices, and intermittently depressed apron, of compensating devices acting on the apron for taking up the slack therein. 16th. The combination with the splint cutting mechanism, splint carrying apron, and devices for intermittently depressing the apron to the splint cutting mechanism, of compensating devices for taking up the slack in the apron when the devices for depressing the apron rise, and intermediate connections between the compensating devices and apron depressing mechanism. 17th. The combination with the splint carrying belt composed of linked bars of the reciprocating match ejecting plate. 18th. The combination with the splint cutting machine, of the endless travelling splint receiving and carrying belt, and the match devices operated from the splint cutting machine for expelling the matches from the travelling belt. 19th. The boxing mechanism consisting of the comb, the shifting box, and carrier for carrying the match boxes. 20th. In a match making machine, a splint carrying apron or band composed of a series of transversely

arranged parallel bars united at their ends and having adjacent opposed convex surfaces between which the match splints are received.

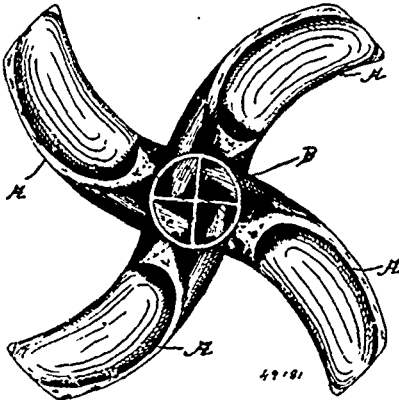
No. 40,780. Power-Hammer. (Marteau mécanique.)



Royal Bullard Boynton, West Townsend, Daniel Lyman Chandler, Ayre, and Elliott Warren, West Townsend, assignees of Frank Everett Tenney, Ayre, all of Massachusetts, 26th August, 1895; 6 years.

Claim.—1st. A power-hammer comprising in its construction a cylinder and piston, a hammer-head carried by one of said parts, means for reciprocating the other part, and a restricted passage affording communication from one side of the piston to the other throughout the piston's stroke. 2nd. A power-hammer comprising in its construction a cylinder and piston, a hammer-head carried by one of said parts, means for reciprocating the other part, a restricted passage affording communication from one side of the piston to the other throughout the piston's stroke, and a valve controlling the area of said passage. 3rd. A power-hammer comprising in its construction a cylinder and piston, a hammer-head carried by one of said parts, means for reciprocating the other part, a restricted passage extending through the piston, and a valve adjustable to cover said passage or to leave it uncovered throughout the piston's stroke. 4th. A power-hammer comprising in its construction a cylinder having a centrally-located atmospheric port, a piston, a hammer-head carried by one of said parts, means for reciprocating the other part, and a restricted passage affording communication from one side of the piston to the other, throughout the piston's stroke.

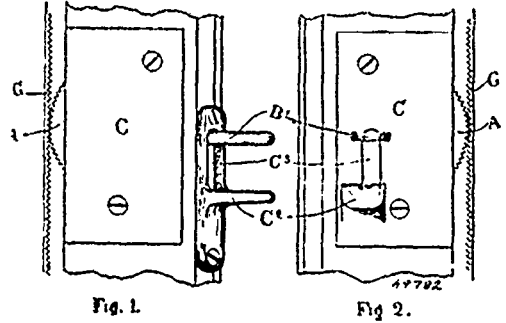
No. 40,781. Screw Propeller. (Propulseur à hélice.)



Bruno Wesschman and Wilhelm Becker, both of Gottinger, Russia, 27th August, 1895; 6 years.

Claim.—An improved propeller having recesses in its blades adapted to catch and convey the water in such a manner on the rotation of the propeller that the water is accumulated and expelled at the rear in an axial or almost axial direction in one or more jets or streams which exert a push on the water lying behind the screw, whereby the ordinary screw action is combined with a pushing action capable of being utilized both for propelling and for steering the ship or the like, substantially as described and illustrated.

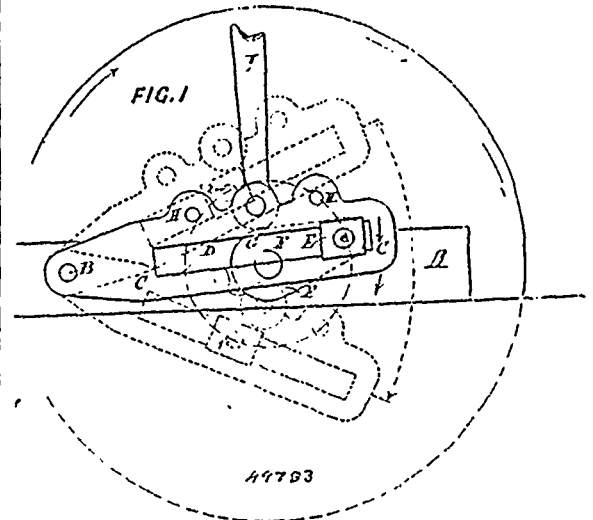
No. 40,782. Sash-Lift, Balance and Lock. (Arrête-croisée, etc.)



Frank Henry Peters, Montreal, Quebec, Canada, 27th August, 1895; 6 years.

Claim.—1st. The combination of sash-lift, balance and lock, as herein described. 2nd. In a sash-lock, the combination of a pivoted toothed lock piece, a wedge and spring. 3rd. In a sash-lock, the combination of a pivoted toothed lock piece, a wedge and spring, and a push connected to the wedge, and adapted to lower it. 4th. In a sash-lock, the combination of a pivoted toothed lock piece, a wedge, spring, push and lifting hook. 5th. In a sash-lock, the combination of a pivoted toothed lock piece, a wedge and a toothed rack adapted to intermesh with lock piece.

No. 40,783. Apparatus for Boring Wells, etc. (Appareil pour creuser les puits, etc.)



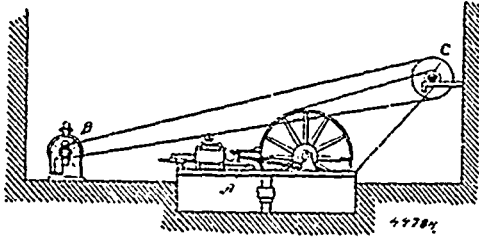
William Latham Burton, Adelaide, South Australia, 27th August, 1895; 6 years.

Claim.—1st. In apparatus that is specially applicable to well-boring machinery, in combination, a revolving crank arm and pin, a sliding block, a rocking lever that is pivoted at one of its ends, and that is provided with a longitudinal-slot in which the block will slide, and a pitman or connecting rod that may be secured to any point on the upper side of the rocking lever, whereby, during a portion of the revolution of the crank arm, extra power with a consequent diminution of speed will be conveyed to the pitman, while, during the remainder of the revolution, extra speed with a consequent diminution of power will be conveyed to the same, as herein specified. 2nd. In apparatus that is specially applicable to well-boring machinery, a rocking arm or lever that is pivoted at one of its ends, such pivot being susceptible of horizontal adjustment, the rocking lever being slotted longitudinally, and the slot provided with a sliding block that is connected with the crank arm on the motive power shaft of the machine, and such rock arm being connected by pitman or connecting rod to the rocking beam of the derrick, as herein set forth. 3rd. In apparatus that is specially applicable to well-boring machinery, a slotted rocking arm such as that referred to in the previous claims that is provided with adjusting points whereby the pitman or connecting rod may be moved nearer to, or further from the fulcrum or pivot of such rocking lever so that the travel of the pitman and consequently of the boring tool may be increased or diminished as desired. 4th. In apparatus that

is specially applicable to well-boring machinery, the combination with an appliance conveying rotary motion, such, for instance, as a crank or eccentric, of a pivoted and slotted rocking lever, such as that referred to in the previous claims, whereby power shall be gained but speed lost during the lifting of the boring tool, but speed shall be gained and power lost during the descent of the tool, as herein specified.

No. 49,784. Steam Engine. (Machine à vapeur.)

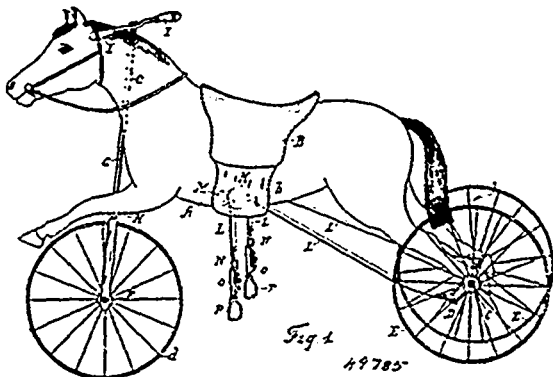
Fig 7



The Honourable Charles Algernon Parsons, Newcastle-on-Tyne, Northumberland, England 27th August, 1895; 6 years.

Claim.—1st. The combination with a reciprocating steam engine of a steam turbine, substantially as described. 2nd. The combination of a reciprocating steam engine, a steam turbine, a condenser, and steam pipes for conveying steam from the engine to the turbine and thence to the condenser, substantially as herein described. 3rd. The combination of a reciprocating steam engine, a steam turbine, a dynamo coupled directly to the turbine spindle, a condenser, and steam pipes connecting the engine and the turbine, and the turbine and the condenser, substantially as herein set forth and described. 4th. The combination of a reciprocating steam engine, a steam turbine, a condenser, and steam pipes connecting the same, the shafts of the engine and turbine being coupled together, substantially as described. 5th. The combination of a reciprocating steam engine, a steam turbine, a condenser, steam pipes connecting the engine and the turbine, and the turbine and the condenser, a cut-off pipe or bye pass connecting the engine directly to the condenser, and stop valves in said steam pipes, whereby the steam may be conducted from the engine through the turbine to the condenser, or directly from the engine to the condenser, as desired, substantially as set forth and described. 6th. The combination of a source of steam supply, a reciprocating steam engine, a steam turbine, a condenser, independent steam pipes for supplying steam to the engine and the turbine, steam pipes connecting the engine and turbine, and the turbine and condenser, a cut-off pipe or bye pass between the engine and condenser, and stop valves in said steam pipes, whereby the engine and the turbine may be operated independently or together as desired, substantially as described. 7th. The combination of a reciprocating steam engine, a steam turbine, a condenser and steam pipes provided with suitable stop valves connecting the same, said engine and turbine being adapted to operative separate and independent driving or operating shafts, substantially as described.

No. 49,785. Velocipede. (Vélocipède.)

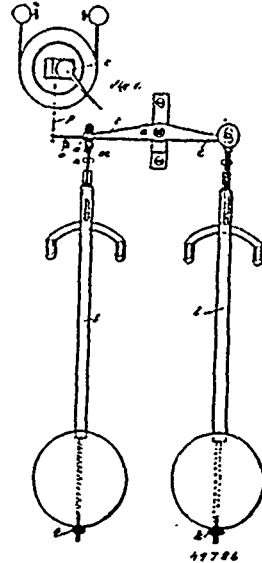


Arthur F. Kemp, London, Ontario, Canada, 27th August, 1895; 6 years.

Claim.—1st. The combination of an imitation horse or other form A, saddle or seat B, wheels E, E, guiding wheel F, crank shaft C, straps or bands L, anti-friction bearings K, and stirrups P, substantially as and for the purpose hereinbefore set forth. 2nd. A horse-velocipede consisting of an imitation horse or other form A, saddle or seat B, shaft C, formed with the cranks D, D, wheels E, E, straps or bands L, L, grooved anti-friction pulleys K, K, stirrups P, and

flaps b, in combination with the forked stem G, and guiding wheel d, substantially as and for the purpose set forth. 3rd. A horse velocipede consisting of an imitation horse or other form A, saddle or seat B, shaft C, formed with the cranks D, D, wheels E, E, straps or bands L, L, grooved anti-friction pulleys K, K, keeper pulleys M, M, stirrups P, straps O, and flaps b, extending over said pulleys, in combination with the forked stem G, shaft F, guiding wheel d, and handles I, substantially as and for the purpose set forth.

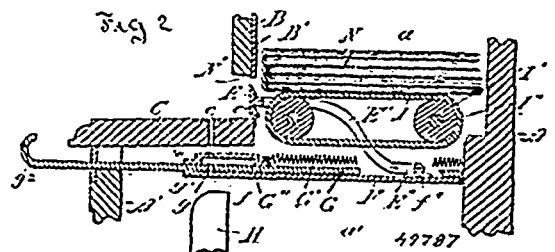
No. 49,786. Electric Meter. (Electromètre.)



Georg August Julius Telge, Oldenburg, Germany, 27th August, 1895; 6 years.

Claim. 1st. An electricity meter in which a pendulum l is suspended from a rocking beam c and the latter connected so as to be actuated by a solenoid s through which the current to be measured flows whereby the pendulum is raised or lowered by the motion thus electrically imparted to said rocking beam c, and a second and similar pendulum suspended from the other arm of said rocking beam whereby the duration of oscillation of the pendulum is altered in such a manner that the times indicated by the two clock movements serve by the difference between them to give a measure of the current that has flowed through the solenoid constructed and arranged substantially as hereinbefore described. 2nd. An electricity meter, the employment of the arm l of the rocking beam c to transmit their motion (which is dependent on the current through the solenoid s) to adjusting levers u of the balance springs of two clocks and thereby cause an increase or a decrease in the tension of said springs whereby an acceleration or a retardation of the movement of the clocks is produced, such that the resulting difference between the time indications of the two clocks gives a measure of the current consumption constructed and arranged substantially as hereinbefore described. 3rd. The employment of only one clock movement electrically actuated as hereinbefore described, in which case the current consumption is measured by ascertaining the difference between the time indicated by the clock movement influenced by the motion of the rocking beam and the time indicated by a standard time-piece or clock constructed and arranged substantially as hereinbefore described.

No. 49,787. Automatic Vending Machine. (Appareil de vente automatique.)

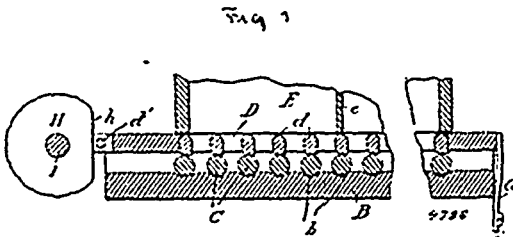


George Harper Bowie and John C. Roger, both of Ottawa, Ontario, Canada, 27th August, 1895; 6 years.

Claim.—1st. In an automatic vending machine for newspapers and similar articles, the combination with a suitable casing having

a transverse delivery slot, of an endless apron with adhesive surface having its upper face opposite said slot and adapted to travel in a direction towards said slot, a pair of rollers suitably journaled upon which said apron is mounted, a sleeve journaled upon the axle of one of said rollers adjacent to one of the ends, a pinion upon said sleeve, a spring detent at the end of the roller gearing into said ratchet wheel, a wheel journaled upon a stud secured to the sides and gearing into said pinion and a into rack below, a rack secured upon a movable piece below said apron and gearing into said wheel, and a bottom held slidingly below said apron and carrying said rack, substantially as set forth. 2nd. In an automatic vending machine for newspapers and similar articles, the combination with a suitable casing having a transverse delivery slot for said articles, of a lip or flap hinged at the bottom of said slot so as to close the same when raised, shoulders at the interior of the casing against which said lip abuts when raised and prevent it being pushed inwardly, a sliding bottom below said delivery slot, a link pivoted to the rear of said bottom, a pitman pivoted to said link and to the inner face of said lip, and a support for the forward end of said pitman near its connection with said lip, substantially as set forth. 3rd. In an automatic vending machine for newspapers and similar articles, the combination with a suitable casing having a lower forward projecting part covered by a top, a delivery slot above the rear edge of said top and the adjustable bottom or gage of a door, a bottom, having its front edge extending partly under said top of the projecting part and adapted to be moved forward, a slide made movable in said bottom and projecting through the front of said projecting part and adapted to be automatically retracted, registering transverse slots in said top slide and sliding bottom, a rib under said slots adapted to support a coin in the slots of said bottom and slide and allow it to drop when said parts have been moved forward, an endless apron having an adhesive surface and having its upper surface opposite the delivery slot, rollers upon which said apron is mounted and means of causing said apron to travel forward when the sliding bottom moves forward and to remain stationary when said bottom slides back, substantially as set forth. 4th. In an automatic vending machine for newspapers and similar articles, the combination with a suitable casing having a transverse delivery slot above the top of the lower projecting part of the casing, of a flap or lip pivoted to said top and closing said slot, a sliding bottom below said top, a pair of rollers journaled above said bottom, an endless apron having its upper part opposite said delivery slot, a link pivoted to the rear of said bottom, a curved pitman pivoted to said flap or lip and to said link and supported upon the axle of the front roller, and means of moving said bottom forward by means of an automatically retracted slide movable in said bottom and having a slot registering with slots in said top and bottom and adapted to be connected by a coin inserted in said slot, substantially as set forth.

No. 49,788. Match Racking Machine.
(*Râtelier de trempage pour allumettes.*)

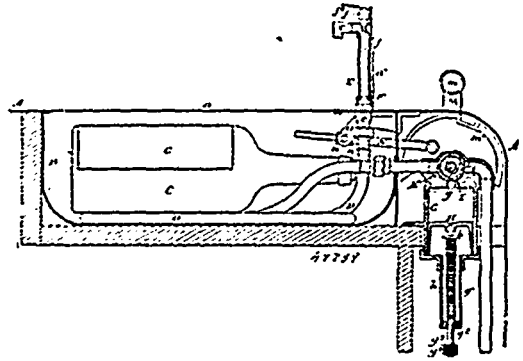


Edmund George Shepherd, Edwin Septimus Leatham and Charles Berhrshire Chitty, all of Ottawa, Ontario, assignees of John Daniel Manton, Hull, Quebec, all of Canada, 27th August, 1895; 6 years.

Claim.—1st. In a match racking machine, the combination of a stationary plate, an upwardly projecting rim or flange secured to each longitudinal edge of said plate provided with a series of notches at the level of the upper surface of said plate, rollers journaled in said rims between and clearing said notches and extending across said plate, a frame secured slidingly in said rims by runners adapted to move in wider grooves in said rims so as to allow vertical play and provided with slats parallel to said rollers and adapted to rest on the top of the same and in a little lower position in the spaces between them, a spring pressing said frame longitudinally in one direction, a vibrating cam disc with flat space against which said frame is pressed by said spring and carried upon a shaft receiving suitable motion and a hopper held above said frame, substantially as set forth. 2nd. In a match splint racking machine, the combination of a stationary plate B provided with a series of shallow segmental grooves extending transversely across the same, an upwardly projecting rim or flange at each longitudinal edge of said plate provided with a series of notches each adapted to pass a match splint between each groove in the plate and level with the upper surface thereof, a small roller journaled in said rims between each pair of said notches and clearing the same and for which the grooves in the plate form a suitable race, and a series of slats parallel to said rollers and forming a grid above them and held slidingly and with vertical

plate on and between said rollers, substantially as set forth. 3rd. In a match racking machine, the combination of a stationary plate B, rims B', at the longitudinal edges, a series of notches b', in said rims at the level of the surface of said plate, and a series of rollers C journaled in said rims between and clearing said notches, substantially as set forth. 4th. In a match racking machine, the combination of a stationary hopper, a transversely grated bottom held slidingly under the same in guides allowing vertical play, a spring pushing said grid longitudinally in one direction and a vibrating cam disc with flat space against which the other end of said grid is pushed by the spring, substantially as set forth.

No. 49,789. Liquid Dispensing Apparatus.
(*Appareil pour la distribution des liquides.*)

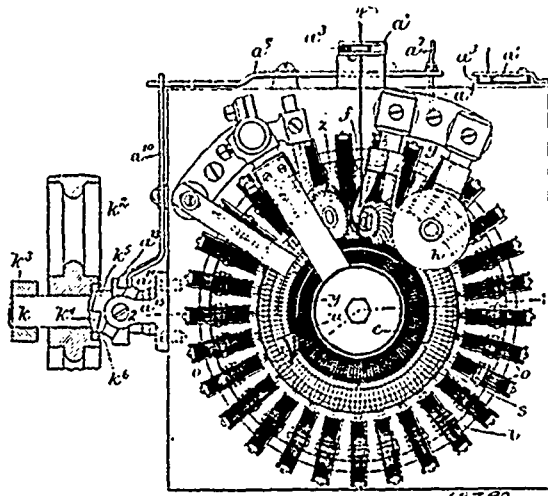


William Miles Fowler, Stamford, Connecticut, U.S.A., 27th August, 1895; 6 years.

Claim.—1st. In combination, a self-helping mechanism comprising a discharge conduit and a valve for opening and closing it, a measuring receptacle connected with a liquid supply and with the self-helping mechanism and a valve located at the juncture of conduits leading to the supply, to the measuring receptacle and to the discharge conduit for alternately opening and closing communication between the measuring receptacle and the supply and between the measuring receptacle and self-helping mechanism, substantially as set forth. 2nd. In combination, a series of self-helping mechanisms each comprising a discharge conduit and a valve for opening and closing it, a measuring receptacle for each self-helping mechanism, connected with a liquid supply and with the self-helping mechanism, valves for opening and closing communication between each measuring receptacle and a supply and self-helping mechanism corresponding to the measuring receptacle, valve operating levers and a common rotary shaft about which the valve operating levers are mounted, substantially as set forth. 3rd. In combination, a self-helping mechanism comprising a discharge conduit and a valve for opening and closing it, a measuring receptacle provided with a spring-actuated plunger and connected with a liquid supply and with the self-helping mechanism, and a valve for opening and closing communication between the measuring receptacle and the supply and self-helping mechanism, substantially as set forth. 4th. In combination, a swinging self-helping mechanism comprising a discharge conduit and a valve for opening and closing it, a measuring receptacle connected with a liquid supply and with the self-helping mechanism, a valve for opening and closing communication between the measuring receptacle and the supply and self-helping mechanism, a valve operating lever and a connection between the valve operating lever and the swinging self-helping mechanism for throwing the self-helping mechanism into operative position during the operation of the valve, substantially as set forth. 5th. In combination, a suitable cooling chamber provided with a transparent top, one or more sample liquid packages located within the cooling chamber beneath the transparent cover, a self-helping mechanism corresponding to each package and mounted along the top of the chamber to swing upwardly into operative position and downwardly out of sight, a measuring receptacle for each self-helping mechanism connected with a suitable supply and with the self-helping mechanism, a valve for controlling the admission of the liquid to and its discharge from the receptacle, valve operating mechanism, and a connection between the valve operating mechanism and the swinging self-helping mechanism for swinging the self-helping mechanism simultaneously with the operation of the valve, substantially as set forth. 6th. The combination, with the discharge mechanism and the measuring receptacle connected with a supply and with the discharge mechanism, of a housing for enclosing the measuring receptacle, an elongated slit through the wall of the housing, a valve operating lever extending through the slit in the housing and provided with a segment within the housing, the rim of the segment being extended upon opposite sides, of the operating lever to close the slit through the housing as the lever is moved in opposite directions along the slit, substantially as set forth. 7th. The combination, with the discharge mechanism, of a measuring receptacle connected with a supply and a discharge mechanism, means for controlling the admission of liquid to and its discharge

from the measuring receptacle, a spring-actuated plunger within the measuring receptacle, and means for adjusting the plunger to increase or decrease the extent of its stroke within the chamber, substantially as set forth.

No. 49,790. Knitting Loom. (Métier à tricoter.)

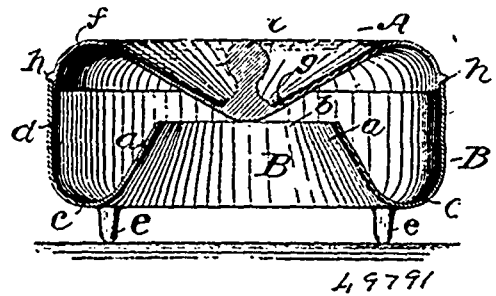


John Bradley, North Chelmsford, Massachusetts, U.S.A., 27th August, 1895; 6 years.

Claim.—1st. A knitting loom, comprising in its construction a knitting mechanism to form a regular knitted web, warp-guides for guiding the warp-threads between the needles, and a warp-raiser and west-guide arranged to raise the warp-threads above the needles and to guide a west thread beneath the warp-threads and between the warp-threads and the loops of the knitted thread, substantially as and for the purpose set forth. 2nd. A knitting loom, comprising in its construction a knitting mechanism to form a regular knitted web, warp-guides for guiding warp-threads between the needles, and a warp-raiser and west-guide extending between the warp-threads and the needles, and arranged to raise the warp-threads, and lay its west threads behind the warp-threads and back of the regular knitted loops, substantially as and for the purpose set forth. 3rd. A knitting loom, comprising in its construction a rotary head and its needles, and co-operating spring-beard needle knitting mechanism to form a regularly knitted web, a warp-carrier and independent means for moving it in unison with the head, and a combined west-guide and warp-raiser arranged between the head and carrier having a part to raise the warp-thread above the needles, and a slot to guide a west-thread beneath the warp threads and between the warp threads and the loops of the knitted thread, substantially as and for the purpose set forth. 4th. A spring-beard needle knitting loom, comprising in its construction a head and its needles, and means for rotating the head, and co-operating knitting mechanism to form a regular knitted web, a warp-carrier independent of said head and means for moving it, and a combined warp-raiser and west-guide having a part to raise the warp-threads above the needles and a slot to guide a west-thread beneath the warp-threads and between the warp-threads and the loops of the knitted threads, substantially as and for the purpose set forth. 5th. In a spring-beard knitting loom, the combination of a needle cylinder, a warp-carrier surrounding said cylinder and in the same horizontal plane therewith, and independent means for rotating said cylinder and carrier, said carrier being provided with an upwardly extending flange provided with thread-tension devices and notches to guide the warp-thread, substantially as and for the purpose set forth. 6th. The combination with the rotary head, of the warp-carrier revoluble around the head, independent means for moving the head and carrier in unison, and a stationary west-guide and warp-raiser extending upward between the head and carrier, and having a part projecting above the needles, substantially as and for the purpose set forth. 7th. In a knitting loom, in combination, a rotary head and its needles and complementary stitch-forming mechanism, an independently revoluble warp-carrier, a west-guide and warp-raiser, and a warp-depressor, substantially as and for the purpose set forth. 8th. In a knitting loom, in combination, a rotary head, a revoluble warp-carrier, independent means for moving the head and carrier, and complementary stitch-forming mechanism, and a stationary warp-depressor extending up between the head and carrier near the stitch-wheel to guide the warp-threads below and clear of the stitch-wheel, substantially as and for the purpose set forth. 9th. A knitting loom comprising in its construction a rotary head and its needles, co-operating spring beard knitting mechanism for forming a regular knitted web, mechanism for combining a west-thread with the regular knitted thread, a knock-off mechanism with which said west-thread

and knitted thread are connected, and connections between said knock-off mechanism and the driving wheel whereby upon the failure or breakage of a west-thread or the regular knitted thread, the machine will be stopped, substantially as and for the purpose set forth. 10th. In a knitting loom, in combination, a rotary head, a revoluble warp-carrier, independent means for moving the head and carrier and complementary stitch-forming mechanism, warp-spools mounted upon said warp-carrier, and spring-pressed levers having one arm arranged to engage said spools in order to maintain a uniform tension upon the warp-threads, substantially as and for the purpose specified.

No. 49,791. Fly Trap. (Attrape-mouche.)

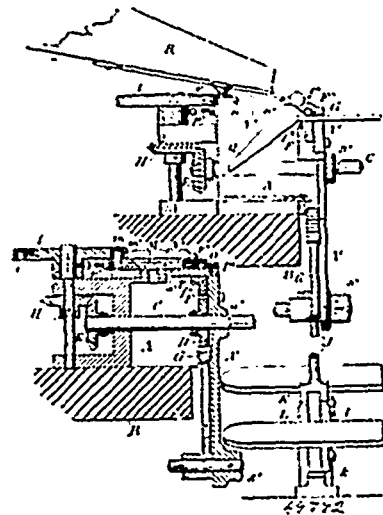


William Thomas, Schenectady, New York, State of New York, U.S.A., 27th August, 1895; 6 years.

Claim.—1st. In fly-traps, the combination of a dish-shaped bottom-part B, having a conical central opening, with a concavo-convex, or funnel-shaped cover A, which acts as a deflector and forces the flies into the liquid below, while the absence of an opening in the funnel-portion of the cover, and the presence of the projecting portion at the base of its handle, serve to prevent their escape, substantially as heretofore described. 2nd. A fly-trap consisting of a single vessel, having a dish-shaped bottom with a conical central opening and a concavo-convex, or funnel-shaped top, which, at that point where the tube of the funnel would join, projects over the centre opening of the bottom, substantially as and for the purpose specified.

No. 49,792. Machine for Making Cigarettes.

(Machine à faire des cigarettes.)

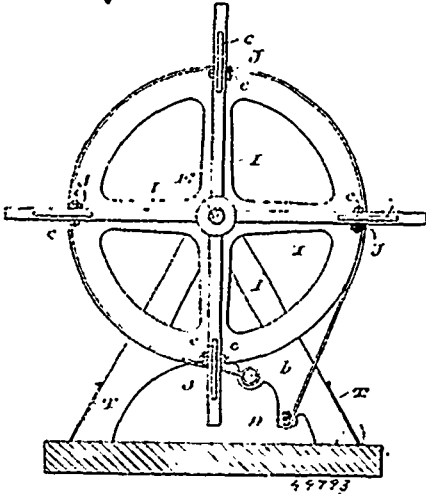


Christophe Ollagnier, Geneva, Switzerland, 27th August, 1895; 6 years.

Claim.—1st. In machines for making cigarettes the combination of a compressor bearing one part of the cigarette-mould and arranged so as to be liable to slide to and fro a fix part of said cigarette mould, a cam having a spiral groove into which engages a pinion projection of the said compressor, said groove being formed so as to first throw the compressor close to the fix part of the mould, then to slightly retract the same without opening the said mould and finally to open the said mould and to hold it open during part of the rotation of the same, substantially as shown and described. 2nd. In machines for making cigarettes, the combination with a cam acting upon the compressor and with a rack bearing the piston rod intended to draw the tobacco into the paper tube, of a toothed segment acted upon by a rocking treadle and of suitable gears to transmit the rocking movements of the rocking segment both to the said cam and to the said

rack, substantially as shown and described. 3rd. In machines for making cigarettes, the combination with the compressor M, bearing and adjustable piece P¹, forming part of the cigarette-mould and with a knife blade O, of variable thickness, of an overlapping part of the said compressor M, to which the said pieces O and P¹ are adjustably secured, substantially as shown and described. 4th. In machines for making cigarettes, the combination with a frame A, having a front-plate A¹, of a hopper R, substantially as shown and described.

No. 49,793. Gill Net Lifting Machine.
(Machine pour lever les filets.)

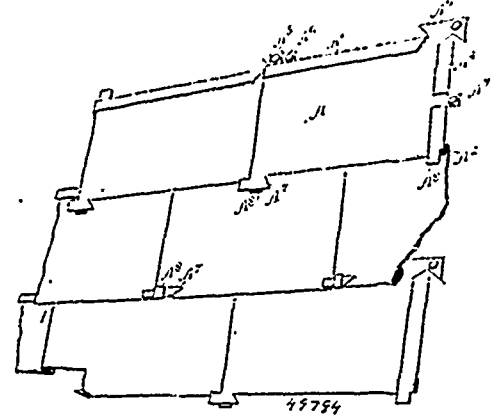


Peter Gagnon and William Frank Ahearn, both of Two Rivers, Wisconsin, U.S.A., 27th August, 1895; 6 years.

Claim.—1st. A gill-net lifting-machine, comprising a series of automatically opening and closing clamps radiating from a rotative shaft. 2nd. A gill-net lifting-machine, comprising a series of automatically opening and closing clamps radiating from a rotative shaft, and a lever mechanism operative at will to prevent closing of a clamp. 3rd. A gill-net lifting-machine, comprising a series of automatically opening and closing clamps radiating from a rotative shaft, and a brake mechanism controlling the travel of the clamps. 4th. A gill-net lifting-machine, comprising a series of automatically opening and closing clamps radiating from a rotative shaft, and rubber facing on a jaw of each clamp. 5th. A gill-net lifting-machine, comprising a base, a pair of parallel standards thereon, a cam extended inward from one of the standards, a power-shaft having its bearings in the standards, radial clamps carried by the shaft, springs interposed between the clamp-jaws, and devices carried by loose clamp-jaws to work on the cam. 6th. A gill-net lifting-machine, comprising a base, a pair of parallel standards thereon, a cam extended inward from one of the standards, a power-shaft having its bearings in the standards, radial clamps carried by the shaft, springs interposed between the clamp-jaws, devices carried by loose clamp-jaws to work on the cam, a lever mechanism for throwing any of said devices out of line with said cam, and other suitable means for effecting the automatic return of the displaced device or devices. 7th. A gill-net lifting-machine, comprising a base, a pair of parallel standards thereon, a cam extended inward from one of the standards, a power-shaft having its bearings in the standards, radial clamps carried by the shaft, springs interposed between the clamp-jaws, devices carried by loose clamp-jaws to work on the cam, and a brake for regulating or stopping the rotation of the shaft. 8th. A gill-net lifting-machine, comprising a series of rotative radial-clamps, a facing of rubber on at least one jaw of each clamp, and suitable means of automatically closing and opening said clamps. 9th. A gill-net lifting-machine, comprising a series of rotative radial clamps, suitable means for automatically closing and opening the clamps, and a guard extending from a jaw of each clamp to lap the opposing jaw. 10th. A gill-net lifting-machine, comprising a series of rotative radial clamps, suitable means for automatically closing and opening the clamps, and a guard adjustable longitudinally of a jaw of each clamp and lapping on the opposing jaw. 11th. A gill-net lifting-machine, comprising a series of rotative radial clamps, suitable means for automatically closing and opening the clamps, and a guard extended from a jaw of each clamp to lap the opposing jaw and limit outward movement of the latter jaw. 12th. A gill-net lifting-machine, comprising a base, a pair of parallel standards one of which is provided with an inwardly extended cam, a power-shaft having its bearings in the standards, radial clamps carried by the shaft, springs interposed between the clamp-jaws, devices carried by loose clamp-jaws to work on the cam, a lever-mechanism for throwing any of said

devices out of line with said cam, another cam arranged to return any and all of the displaced devices to normal position, and a brake for regulating or stopping the rotation of said shaft.

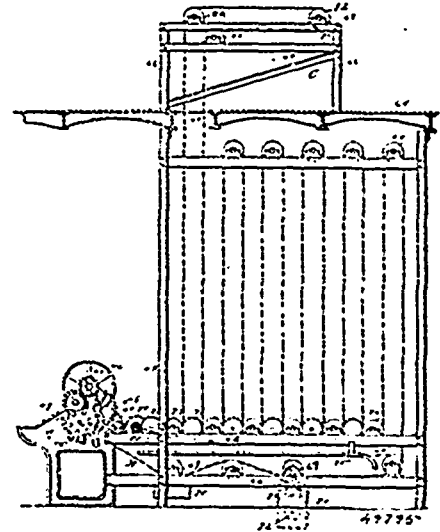
No. 49,794. Metallic Shingle. (Bardoue métalliques.)



Frederick Crawford, Toronto, Ontario, Canada. 27th August 1895; 6 years.

Claim.—1st. A metallic shingle comprising an upper fold extending the major portion of the length of the shingle and folded above the body A, a lower fold extending the major portion of the length of the shingle from the opposite end and folded beneath the body A, a side fold extending the width of the folded shingle and turned underneath, and an opposite side fold extending the width of the folded shingle and turned above, and the upper nailing corner ends, all arranged as and for the purpose specified. 2nd. A metallic shingle comprising an upper fold extending the major portion of the length of the shingle and folded above the body A, a lower fold extending the major portion of the length of the shingle from the opposite end and folded beneath the body A, a side fold extending the width of the folded shingle and turned underneath and an opposite side fold extending the width of the folded shingle and turned above, and the upper nailing corner ends at the top of the shingle and the folding corner ends at the bottom of the shingle, as and for the purpose specified. 3rd. A metallic shingle comprising an upper fold extending the major portion of the length of the shingle and folded above the body A, a lower fold extending the major portion of the length of the shingle from the opposite end and folded beneath the body A, a side fold extending the length of the folded shingle and turned underneath and an opposite side fold extending the width of the folded shingle and turned above, and the upper nailing corner ends and an intermediate lip formed out of the side fold turned above the body, as and for the purpose specified.

No. 49,795. Machine for Making Matches.
(Appareil pour faire des allumettes.)



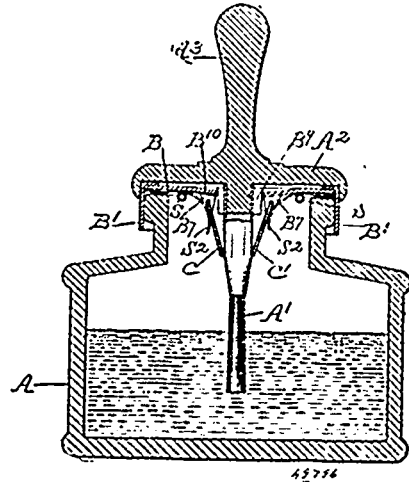
Henry Arthur La Chicotte, Walter Betts La Chicotte, both of Brooklyn, New York, U.S.A., 27th August, 1895; 6 years.

Claim.—1st. In a match making machine, the combination with

shaping rolls adapted to rotate in close relation and provided with cutting ribs and circumferential grooves arranged substantially as shown and described, whereby two independent rolls of match splints are formed from the veneer passed between the said rolls, of a gripping mechanism consisting of jaws adapted to grasp the ends of the two rolls of match splints simultaneously, as and for the purpose set forth. 2nd. In a match making or like machine, a gripping mechanism, the same consisting of an endless belt comprising opposing links, jaws pivotally connected with the said opposing links, the inner face of the jaws being provided with a series of teeth arranged transversely thereon, the teeth upon one jaw alternating with the teeth upon the opposing jaw and adapted to enter the spaces between the teeth of the said opposing jaw, one of the jaws being adapted to be opened and closed, as and for the purpose specified. 3rd. In a match making machine, a gripping mechanism consisting of a belt or carrier comprising opposing links, jaws angular in cross-section pivotally connected with the said opposing links and extending from one to the other, said jaws being provided with inner faces having teeth or ribs arranged transversely thereon, forming spaces or pockets between the teeth to receive the splints, the teeth upon one jaw alternating with the teeth upon the opposing jaw and adapted to enter the spaces of the said opposing jaw, one of the jaws being spring-controlled, and means, substantially as shown and described, for opening the jaws and permitting them to close, as and for the purpose set forth. 4th. In a match making machine, a gripping mechanism, the same consisting of an endless belt or carrier comprising opposing links, jaws angular in cross section pivotally connected with the opposing links and extending from one to the other, one of said jaws being fixed and the other spring-controlled, said jaws being further provided with cushioned inner faces provided with a series of teeth arranged transversely thereon, the spaces between the teeth forming pockets adapted to receive match splints, the teeth upon one jaw alternating with the teeth upon the opposing jaw and adapted to enter the pockets of the said opposing jaw and hold the splints in position therein, the said spring-controlled jaw having an arm or extension formed thereon by means of which it is opened and a trip lever for engaging said arm and opening the jaws, substantially as shown and described. 5th. In a match making machine, the combination with shaping rolls having their peripheral surfaces alternately provided with grooves and cutting ribs, of a stationary cutter bar having openings adapted to receive the splints from the shaping rolls, a knife held to reciprocate across the openings in the cutter bar, and a gripping mechanism consisting of opposing jaws adapted to clamp between them the splints delivered from the cutter bar, the inner faces of the said jaws having a series of teeth arranged thereon, the teeth of one jaw alternating with the teeth upon the opposing jaw and adapted to enter the spaces between the teeth of the said opposing jaw, as and for the purpose specified. 6th. In a match making machine, the combination with feed rolls, shaping rolls having their peripheral surfaces circumferentially grooved and provided with cutting ribs, the alternating grooves being of different depths, a cutting bar located opposite the delivery portion of the shaping rolls and provided with openings to receive the splints delivered from the rolls, a knife adapted to move across the openings in the cutting bar, and a time connection between the driving mechanism, the knife and the feed and shaping rolls, of a conveyor consisting of an endless belt carrying gripping devices, said gripping devices consisting of jaws adapted to clamp between them the splints delivered from the cutting bar, the said jaws having their inner faces provided with teeth arranged transversely thereon, the teeth upon one jaw being adapted to enter the spaces between the teeth of the opposing jaw, and trip mechanism adapted for engagement with the jaws and having timed engagement therewith, as and for the purpose specified. 7th. In a match making machine, the combination with feed rolls, shaping rolls located adjacent to the feed rolls, said shaping rolls being provided with peripheral grooves and ribs alternately arranged, each roll being provided with one or more series of said grooves and the grooves of one series differing in depth from the grooves of the other series, a guide located between the shaping and the feed rolls, a cutting bar having openings adapted to receive splints from the shaping rolls, a knife adapted to cross the openings in the cutting bar, a driving mechanism and a time connection between the driving mechanism, the feed and shaping rolls and the knife, of a gripping mechanism consisting of an endless belt provided with a series of jaws having their inner faces provided with teeth arranged transversely thereon forming spaces or pockets between the teeth adapted to receive splints, the teeth upon one jaw being adapted to enter the spaces between the teeth of the opposing jaw, a trip mechanism having engagements at predetermined intervals with the jaws, and means substantially as shown and described for dipping the splints and drying them, as and for the purpose set forth. 8th. In a match-making machine, the combination with a conveyer consisting of an endless belt, said belt being provided with a series of jaws having their inner faces provided with teeth arranged transversely thereon and forming spaces or pockets between the said teeth to receive splints, the teeth of the opposing jaws alternating with each other and adapted to enter the spaces of the opposing jaw, and hold the splints therein, and a tripping device adapted for engagement with the jaws to open and release the same, of receptacles containing inflammable or ignitable material over which the conveyer passes, and series of pulleys arranged in different planes and adapted as supports for the conveyer, as and for the purpose specified. 9th.

In a match making machine, the combination with a conveyer consisting of an endless belt, said belt being provided with a series of opposing jaws having their inner faces provided with teeth arranged transversely thereon and having spaces or pockets between the teeth adapted to receive the match splints, the teeth of the opposing jaws alternating with each other and adapted to enter the spaces and hold the splints therein, a trip arm connected with one of the jaws of each pair by means of which the jaws are opened, and a tripping device adapted for engagement with the jaws to open and release the same, of receptacles containing inflammable or ignitable material over which the conveyer passes, series of pulleys arranged in different planes and adapted as supports for the conveyer, and a shield located over the receptacles containing the inflammable or ignitable material and below the supporting pulleys of the conveyer, as and for the purpose set forth.

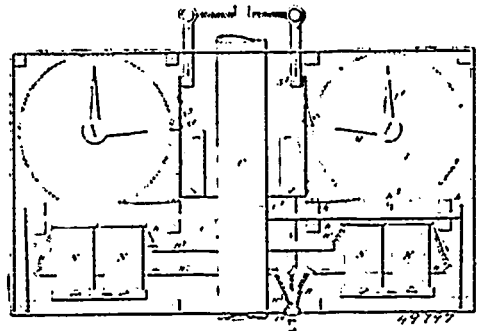
No. 40,796. Brush Wiper. (Appareil à essuyer les brosses.)



Frederic L. Clarke, Glens Falls, New York, U.S.A., 27th August, 1895; 6 years.

Claim.—1st. In a brush wiper, the combination with a supporting frame, and means for sustaining the frame upon the mouth of a fluid receptacle, of a pair of movable spring-actuated wiper plates, and a stop for limiting the movement of the plates, substantially as described. 2nd. In a brush-wiper, the combination with a supporting frame, and means for sustaining the frame upon the mouth of a fluid receptacle, of a pair of movable spring-actuated wiper-plates, and an overhanging guard-plate above each wiper-plate, for protecting its actuating spring, substantially as described. 3rd. In a brush-wiper, the combination with a pair of oscillatory, downwardly-converging spring-actuated wiper-plates, of a plate supporting frame formed from an integral plate of sheet-metal with depending hangers containing bearings for the wiper-plates, and a stop for limiting the oscillating movement of the plates toward each other, substantially as described.

No. 40,797. Apparatus for Recording the Number of Passengers in Railway and other Vehicles. (Appareil à enregistrer le nombre des passagers dans les chars et autres voitures.)



Adrian Gajardo, Valparaiso, Chili, 27th August, 1895; 6 years.

Claim.—1st. The combination of a gate B carried by a shaft C, auxiliary gates D D', mounted on the said shaft, rings F F', to which the auxiliary gates are attached and a spring G connecting said rings together and operating to turn them in opposite directions, substantially as described. 2nd. The combination of a gate

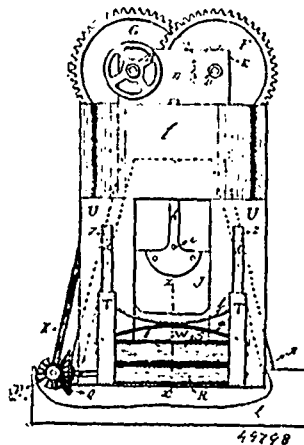
B carried by collars E mounted on a shaft C, auxiliary gates D D¹, secured to rings F F¹, that are mounted on the shaft C within the collars E, stops F² F³ on the rings F F¹, and a spring G operating to turn said rings in opposite directions, substantially as described. 3rd. The combination of the shaft C, the slotted collars E, the gate B, the rings F F¹, the auxiliary gates D D¹, the stops F² F³, the notches D² D³, in the auxiliary gates, and the spring G, substantially as described. 4th. The combination of a gate, an electrically controlled registering device, and a stepping plate formed by two insulated comb-shaped metal terminals forming a break in the electric circuit and so arranged that the teeth of one comb project into the spaces between the teeth of the other, substantially as described. 5th. The combination of a gate, a registering device, a reciprocating pawl engaging with the registering mechanism and operated by the gate when the latter is opened, an electro magnet the armature of which carries the afore-said pawl, and an electric circuit including a battery, whereby when the circuit is closed and the electro magnet is energized the pawl is disengaged from the registering mechanism, substantially as described. 6th. In a register, the combination of a pair of registering wheels one of which is moved each time the actuating pawl is operated and registers from 1 to 100, and the other of which is moved to register hundreds and is controlled by a spring latch Q¹ and spring pawl Q², and a projection such as Q on the first wheel that raises and then lowers the spring latch once during each revolution of the first wheel, substantially as described. 7th. A registering device comprising two toothed registering disc or wheels one having one tooth more than the other, a pawl engaging with and simultaneously actuating said wheels a fixed pointer for registering from 1 to 100 and a second pointer carried by a boss on the lower disc or wheel for registering hundreds, substantially as described and for the purpose specified. 8th. The combination of a gate, a registering device controlled by a pawl which is actuated each time the gate is opened, and a distant registering device controlled by the first named registering device, substantially as described. 9th. The combination of a gate, a registering device controlled by a pawl which is actuated each time the gate is opened, a distant registering device comprising a pendulum Q, a sliding bar P, and a spring pawl O² engaging with and actuating the registering wheels, and means for swinging the pendulum Q each time the first registering device is actuated, substantially as described. 10th. The combination of a gate, a registering device controlled by a pawl which is actuated each time the gate is opened, a distant registering device comprising a pendulum Q carrying the armatures of an electro magnet R, a sliding bar P, a spring pawl O² engaging with the registering wheels, and an electric circuit including the afore-said electro magnet R, a battery, and a spring contact piece S controlled by the wheels of the first named registering device so as to complete the said circuit when the said first named device is operated, substantially as described. 11th. The combination of a gate, and two electrically controlled registering devices actuated by the gate and so arranged that one is operated when the gate is turned in one direction and the other when the gate is turned in the opposite direction, substantially as described. 12th. The combination of a gate, two electrically controlled registering devices actuated by the gate and so arranged that one is operated when the gate is turned in one direction and the other when the gate is turned in the opposite direction, and two distant electrically operated registering devices controlled respectively by the first named registering devices, substantially as described. 13th. The combination, with the gate shafts C, C, of the cranks C³, C³, the connecting rod H, slotted at H¹, and the fixed pin J passing through said slot, substantially as described. 14th. A turnstile formed by two rotatable heads each consisting of three arms equally spaced, substantially as described. 15th. The combination of two rotatable heads each consisting of three arms equally spaced, a shaft carrying each head, a cam on said shaft arranged to cause the heads to rise and fall slightly as they rotate and to bring them to a state of rest with one arm across the passage, and a cam or other gear connecting the shafts to make them turn in unison, substantially as described. 16th. The combination of a turnstile having a head made of three arms, a registering device, an operating lever, a triangular formation of the shaft of the turnstile for engaging and actuating the operating lever, and a slot formed in the bar controlled by the operating lever so arranged that the registering device will be operated only when the turnstile turns in one direction, substantially as described. 17th. The combination of two turnstiles each having a three-armed head, a registering device applied to each head, operating levers therefor, triangular formations on the shafts of the turnstiles for engaging and actuating the operating levers, slots in the bars controlled by the operating levers so arranged that the register can be operated by a movement of the lever in one direction only, one register counting the people passing through the turnstile in one direction and the other the people passing through, in the other direction, and an electrical device for disconnecting the registers from the turnstiles when an employer or other authorized person is passing through the turnstile, substantially as described.

No. 49,708. Machine for Cutting Tobacco.
(Machine pour hacher le tabac)

Alphonse Ouellette, Montréal, Québec, Canada, 27 août 1895: 6 ans.

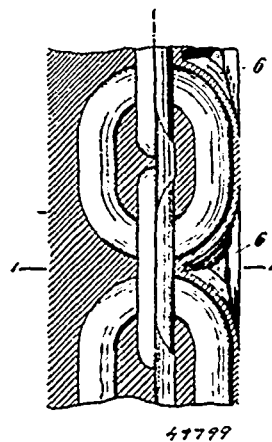
Resume. 1°. La combinaison du couteau J, avec la manivelle L, de son arbre H, du pignon G, de la roue F, du pignon E, et de l'arbre

motour C, muni de la tige G, et de la poulie B, le tout tel que décrit et pour les fins mentionnées. 2°. La combinaison du couteau J, avec



les rouleaux R et S tels que disposés et munis de leurs enveloppes, des roues d'angle Q et P, O et L, M et N et de l'arbre motour C, portant la poulie B, le tout tel que décrit et pour les fins indiquées.

No. 49,709. Manufacture of Chains.
(Fabrication de chaînes.)



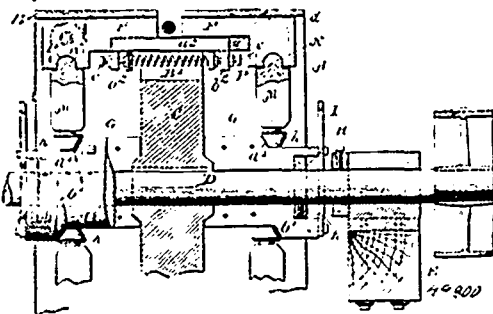
Otto Klatte, Neuvied, on the Rhine, Germany, 28th August, 1895; 12 years.

Claim.—1st. In a chain rolling mill the combination of four rolls arranged at right angles to each other, said rolls being provided with depressions on their circumferential surfaces having the exterior form of a chain and with compensating grooves, recesses or cavities which follow the outlines of the said chain forming depressions for receiving the surplus and displaced material, substantially as described. 2nd. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a tyre-like ring arranged on a core disc and consisting of a number of segments, and means for attaching said segments to the core disc, substantially as described. 3rd. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a dovetail groove round the rim of its core disc, a series of segments to form a tyre-like ring round said disc and having dovetails to fit said groove, suitable means for the insertion of said dovetails into said groove and means to secure the segments therein, substantially as described. 4th. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a core disc 7 with the peripheral dovetail groove 10, the segments 11 having dovetails a lateral opening to said groove and a closing piece 12 to fit said opening, cotters 13 to wedge and secure the said segments in position, substantially as described. 5th. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a core disc 7 with peripheral dovetail groove 10, the segments 11 having dovetails, a lateral opening to said groove and a closing piece 12 to fit said opening, cotters 13 to wedge and secure the said segments in position, said segments which contact with the cotters being made to taper laterally, substantially as described. 6th. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a centre piece movable on the roll axle between two outer discs or wheels, and an eccentric resting in

a hole in the centre piece, and being provided with pivots which rest in holes in the outer discs, substantially as described. 7th. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a centre piece movable on the roll axle between two outer discs or wheels, and an eccentric resting in a hole in the centre piece in a radially adjustable block and being provided with two pivots which rest in holes in the outer discs, substantially as described. 8th. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll having a centre piece movable on the roll axle between two outer discs or wheels, and an eccentric resting in a hole in the centre piece and with its two pivots in holes in the outer discs and carrying on one of the pivots an index lever, which is provided with holes or a slit and moves over a plate fastened to one of the outer discs and is fixed to the said plate by means of a bolt or screw, substantially as described. 9th. In a chain rolling mill, the combination of four rolls arranged at right angles to each other, each roll being movable on the roll axle between two outer discs or rings and having an eccentric resting in a hole in the roll and being provided with one pivot which passes through the eye of a sleeve fixed on the roll axle, substantially as described. 10th. For the purpose of shortening the links of weldless chains manufactured with the improved four rolling mill as claimed above, the combination of two or more pairs of pressure checks or jaws having depressions as specified, one pair of said jaws being adapted to jump one or more links in the transverse direction and the next pair in a longitudinal direction, substantially as described. 11th. For the purpose of shortening the links of weldless chains manufactured with the improved four rolling mill as claimed above, the combination of two pairs of checks or jaws, the four jaws of which being movable in one plane in two directions perpendicularly to each other so that the two jaws of each pair when approached simultaneously in one direction seize the link in the transverse direction and then both the pairs of jaws are approached in the other direction, thus jumping the link in the longitudinal direction, substantially as described. 12th. For the purpose of connecting weldless chains manufactured with the improved four rolling mill as claimed above, a link formed of wire or wire rope wound within a metallic casing, being split around its exterior sides and then closed by folding down the edges of the said split, substantially as described.

No. 49,800. Driving Wheel for Elevators, etc.

(Roue conductrice pour elevateurs, etc.)

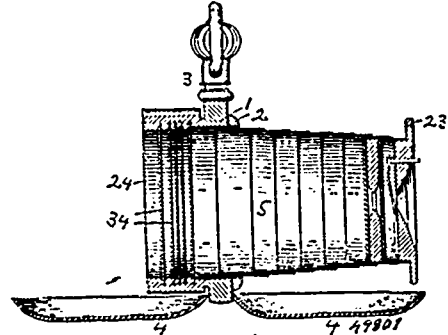


George Shoume Fouts, San Jose, California, U.S.A., 28th August, 1895; 6 years.

Claim.—1st. The combination of the pulley, clamping sections, cam surfaces, and means by which to lock the cam surfaces from turning, substantially as set forth. 2nd. The combination of the pulley, clamping sections, pivoted levers, and cams substantially as set forth. 3rd. The combination of the pulley, clamping sections, and movable cams by which the clamping sections may be released at different points, substantially as set forth. 4th. The combination with the pulley web, and the clamping sections, of the operating cams, the framing and the collars, substantially as set forth. 5th. The combination of the inner interlapping guide portions of the clamping sections and the interposed primes, substantially as set forth. 6th. The combination of the pulley, clamping sections movable toward each other and opposite cam surfaces operating the clamping sections, substantially as set forth. 7th. The combination of the frame, the pulley, the clamping sections, the cams, and devices by which the cams are fixed with respect to the frame, substantially as set forth. 8th. The combination of the revolving pulley, clamping sections, springs operating such sections in one direction and cams operating them in the opposite direction, substantially as set forth. 9th. The combination of the revolving pulley, the clamping sections movable in a direction parallel to the axis of the pulley, and operating means, substantially as set forth. 10th. The combination of the pulley and the clamping sections arranged in pairs and having clamping surfaces and inner overlapping guide portions, substantially as set forth. 11th. The combination of the shaft, the web portion keyed to such shaft and a rim portion, the rope or band clamping sections supported by said rim and movable into and out of clamping position and the cam portions or abutments arranged on opposite sides of the pulley web and engaging and operating the clamp sec-

tions, substantially as and for the purpose set forth. 12th. The improvement in drive wheels herein described, consisting of the shaft, the framing, the shaft journaled therein, the pulley having web portions keyed on the shaft and a rim portion provided with ways, the clamping sections movable in said ways having interlapping guide portions at their inner meeting ends, springs by which said sections may be pressed inward, the cam blocks on opposite sides of the pulley web and means whereby said blocks are normally held from turning with the pulley, all substantially as and for the purposes set forth.

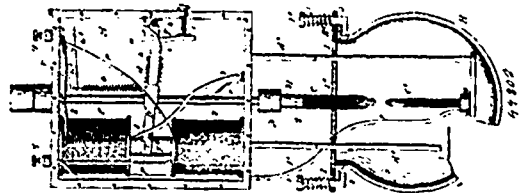
No. 49,801. Pocket Camera. (Camera.)



John Conrad Hegelein, New York, State of New York, U.S.A., 28th August, 1895; 6 years.

Claim. 1st. In a pocket camera, the combination of the frame 2, having covers 4, a casing 5 made up of independent tapering rings, the largest ring projecting beyond the frame 2 and adapted to fit an aperture in a plate holder, and a front plate, shutter and lens carried by the smallest ring of said casing, substantially as set forth. 2nd. A plate holder consisting of frame 24, opaque diaphragm 26, film holder 25, having flanges 27, and C-shaped clamp 30 arranged and adapted to operate, substantially as set forth. 3rd. In a plate holder, the combination of the frame 24, the opaque diaphragm 26, the film holder 25, having flanges 27, the clamp 30 embracing said flanges, and the clamp holder 31, all arranged and adapted to operate, substantially as set forth. 4th. In a plate holder, the combination of the frame 24, the film holder consisting of plates 26, 25, and clamps 30, 31 adapted to enter said frame from one end, and the slides 32, 32 adapted to enter said frame from the other end, substantially as set forth. 5th. The combination of the casing 5 made up of independent tapering rings, and the front plate 9 having flange 23 covering up the rings when the camera is closed and arranged and adapted to operate, substantially as set forth. 6th. The combination of the front plate 9, the fan-shaped shutter plate 11 pivoted to said front plate and having integral therewith an arm 16, provided with notches 20, 21, a spring adapted to engage said notches, and a pin 22 seated in said front plate and adapted to operate said spring, substantially as set forth. 7th. The combination of the front plate 9, the fan-shaped shutter 11 pivoted thereto and having notched arm 16, and the plate spring 19 fixed to the front plate and bearing against said arm 16, and adapted to engage in the notches therein, substantially as and for the purpose set forth. 8th. The combination of the front plate 9, the fan shaped shutter 11 pivoted thereto, and having aperture 14, spring 13, and arm 16, having notches to engage said spring, and the acute plate spring 19 fixed to said front plate and bearing against said arm, substantially as and for the purposes set forth.

No. 49,802. Arc Lamp. (Lampe à arc.)



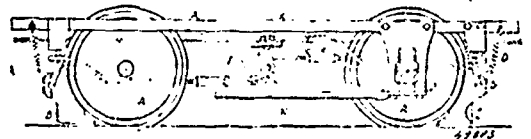
Moses Solomon Okun, New York, State of New York, U.S.A., 28th August, 1895; 6 years.

Claim.—1st. In an arc lamp, the combination, with a carbon carrying rod, of a lever, an abutment thereon adapted to engage with said rod, a sliding rod or bar for pressing said carbon carrying rod against said abutment, thereby grasping the rod, and means for actuating the lever for the purpose of feeding the carbon, substantially as described. 2nd. In an arc lamp, the combination, with a carbon carrying rod, of a lever, an abutment thereon adapted to engage with said rod, a sliding rod or bar for pressing said carbon carrying rod against said abutment, thereby grasping the rod, and a magnet or solenoid adapted to operate said lever for the purpose of feeding

the carbon, substantially as described. 3rd. In an arc lamp, the combination, with a carbon carrying rod, of a lever, an abutment thereon adapted to engage with said rod, and a sliding rod or bar for pressing said carbon carrying rod against said abutment, thereby forming, with the abutment, a clutch which grasps and holds said carbon carrying rod, and means for actuating said clutch for permitting the carbon to feed, substantially as described. 4th. In an arc lamp, the combination, with a carbon carrying rod, of a lever, an abutment thereon adapted to engage with said rod, a sliding rod bearing against said carbon carrying rod and so actuated by a spring as to press said carbon carrying rod against said abutment, an abutment for counteracting the pressure of said spring to permit the feeding of the carbon as said lever moves in a corresponding direction, and means for actuating said lever for the purpose of feeding the carbon, substantially as described. 5th. In an arc lamp, the combination, with a carbon carrying rod, of a lever having an abutment to engage with said rod, a sliding rod carried by said lever and likewise having an abutment adapted, in conjunction with the first-named abutment, to grasp said carbon carrying rod, a spring acting on said sliding rod, and an adjustable abutment coacting with said sliding rod to release the carbon carrying rod at a suitable point in the travel of said lever and so to permit feeding of the carbon, and means for actuating said lever for the purpose of feeding the carbon, substantially as described. 6th. In an arc lamp, the combination, with a carbon carrying rod B, a lever D extending substantially at right angles thereto, and an abutment b on said lever to engage with said rod B, of a sliding rod carried by said lever and likewise having an abutment f adapted in conjunction with said abutment b to grasp said rod B, an adjustable spring acting on said sliding rod as the lever moves, and means for actuating said lever to permit of feeding of the carbon, substantially as described. 7th. In an arc lamp, the combination of a rod B, a longitudinally adjustable lever, a clutch to connect said rod and lever, a laterally adjustable pivotal connection for said lever and means for actuating said lever for the purpose of feeding the carbon, substantially as described. 8th. In an arc lamp, the combination of a rod B, a longitudinally adjustable lever having a pivot a, a clutch to connect the lever and said rod, a bracket F for said lever, a slot in which said pivot works, and means for actuating said lever for the purpose of feeding the carbon, substantially as described. 9th. The combination of a carbon carrying rod, a longitudinally adjustable lever, a clutch to support the rod carried by said lever, a bracket or pivotal support for said lever, means for adjusting said bracket or support and means for actuating said lever for the purpose of feeding the carbon, substantially as described. 10th. The combination of a rod B, a lever, a clutch carried by said lever, an adjustable abutment i, to operate said clutch with a screw or the like j, to adjust said abutment, substantially as described. 11th. The combination of a carbon carrying rod B, a lever a sliding rod carried by said lever to support the rod B, and a counter-balance to equalize the weight of said lever, substantially as described. 12th. In an arc lamp, a globe having a cover or disc movably connected therewith to permit escape of gases and to prevent the admission of air, said cover having an opening for the passage of a carbon, said opening being substantially the same size as the thickness of the carbon so that the carbon will fit snugly in said opening to prevent the escape of gases, substantially as described. 13th. In an arc lamp, a globe having a cover or disc movably connected therewith, combined with a spring to hold the cover and globe together and permit a separation of said parts to allow escape of gases, substantially as described. 14th. In an arc lamp, a globe having a flange at its open end, combined with a cover or disc over said open end, to engage said flange and a spring acting to hold said rod against the flange and cover on the globe, substantially as described. 15th. In an arc lamp, a globe having a flange at its open end combined with a cover or disc over said open end, a rod having a projection to engage said flange and a spring acting on said rod and cover to hold the latter to the globe, substantially as described. 16th. In an arc lamp, a globe having a flange at its open end, combined with a cover or disc over said open end, a rod having a projection to engage said flange, and a nut on said rod, and with a spring surrounding said rod and bearing at one end against said cover or disc, and at its other end against the nut on the rod, substantially as described. 17th. In an arc lamp, the combination of a casing to contain mechanism, a rod depending therefrom and a cover or disc carried thereby, a globe to rest its open end against said disc and a spring for holding said globe against said cover or disc, substantially as described. 18th. In an arc lamp, the combination, with a globe inclosing the arc and having an opening in its top for the passage of a carbon, and a movable cover or valve mounted upon the carbon, covering said aperture and preventing the passage of air therethrough, and adapted to permit of lateral motion of the carbon, substantially as described. 19th. In an arc lamp, the combination with a globe inclosing the carbons, of a cover closing the open end of said globe and having an opening therein of a size sufficient to permit of lateral movement of the carbon, and means mounted upon the cover for permitting lateral movement of the carbon without admitting air to the interior of the globe, substantially as described. 20th. In an arc lamp, the combination, with a globe inclosing the carbons, of a cover or disc closing the open end of said globe and having an opening therein for the passage of a carbon, of a larger size than said carbon, and a movable cover or valve, perforated to permit the passage of the carbon therethrough and fitting closely to the carbon,

and adapted to close said opening in the said cover or disc, whereby lateral motion of the carbon is permitted, but the admission of air to the interior of the globe is prevented, substantially as described. 21st. In an arc lamp, a globe having a cover and an opening in said cover to permit the entrance of a carbon, combined with a carbon holder to pass through said opening, said holder being approximately of the same external diameter as the carbon, said carbon fitting snugly in said opening, substantially as described. 22nd. In an arc lamp, a globe having a cover or disc to close its open end, said cover having an aperture to permit the passage of a carbon, combined with a disc or the like X to cover said opening, and a carbon carrying rod B carrying said disc, substantially as described. 23rd. In an arc lamp, a globe and a cover or disc resting against its open end, said cover having an aperture to permit the passage of a carbon, combined with a rod B, a carbon holder carried thereby and of a greater transverse diameter than said rod, and with a disc X carried by said rod and resting upon the carbon holder, and adapted to close the opening in the cover when the carbon holder passes therethrough, substantially as described. 24th. In an arc lamp, a tightly closed globe having an aperture to permit the entrance of a carbon combined with a carbon carrying rod, and a disc carried by said rod to cover said opening when the carbon passes within the globe, substantially as described.

No. 40,803. Car Brake. (Frein de chars.)



Archibald Wayne Dingman, and Thomas Henry Allen, both of Toronto, Ontario, Canada, 28th August, 1895; 6 years.

Claim.—1st. In a car-brake, the combination of brake-shoes carried outside the wheels of the truck, and formed to engage the wheel and rail, a crank-shaft extending horizontally and carrying and connecting a pair of shoes, arms on the crank-shaft, and means connected to the arms to operate the crank-shaft, as set forth. 2nd. In a car-brake, the combination of brake-shoes formed to engage the wheel and rail, a crank-shaft extending horizontally and carrying and connecting a pair of shoes slotted hangers depending from the truck frame and supporting the ends of the crank-shaft, and suitable means to operate the crank-shaft, as set forth. 3rd. In a car-brake, the combination of brake-shoes carried outside the wheels of the truck, and formed to engage the wheel and rail, a crank-shaft extending horizontally and carrying and connecting a pair of shoes, arms on the crank-shaft, an oscillatory bar pivoted in hangers on the truck frame, arms on said bar, connecting rods between the arms on the crank-shaft and the arms on the oscillatory bar, and suitable means to operate the said bar, substantially as described, and shown. 4th. In a car-brake, the combination of the brake-shoes, carried outside the wheels of the truck, formed in one piece and adapted to engage the wheel and rail, a crank-shaft extending horizontally and carrying a pair of shoes, slotted hanger for the crank-shaft and means to operate the crank-shaft, substantially as described and shown. 5th. In a car-brake, the combination of the brake-shoes, arranged outside of the wheels of the truck, each shoe being formed in substantially one piece and adapted to engage the periphery of a wheel and the rail, a shaft having cranks extending through each pair of shoes, hangers for the ends of the shafts, discs, with arms on said shafts, an oscillatory bar extending parallel with and midway between the crank-shafts, arms on said bar connected to the arms on the crank-shafts, a lever turning on a vertical axis above the oscillatory bar and engaging with an arm on the latter, and connections extending from the ends of the said lever to the operating means at each end of the bar, as set forth. 6th. In a car-brake, the combination of the brake-shoes, carried outside of the wheels of the truck, each shoe being formed to engage the periphery of a wheel and a rail, crank-shafts extending horizontally, each carrying and connecting a pair of shoes, arms on the crank-shafts, an oscillatory bar pivoted in hangers secured to the truck frame, arms on said bar, connecting rods between the arms on the crank-shafts and the arms on the oscillatory bar, said connecting rods being provided with turn buckles, a lever turning on a vertical axis and adapted to engage an arm of the said bar, and suitable means to operate the lever, substantially as described and shown.

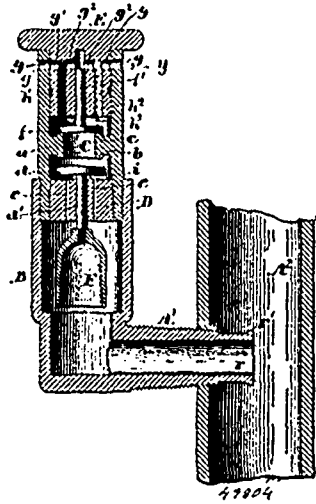
No. 40,804. Valve for Steam Radiators.

(Soupape de radiateurs.)

Sylvanus Sawyer, Fitchburg, Massachusetts, U.S.A., 28th August, 1895; 6 years.

Claim.—1st. In an air and vacuum valve for steam radiators and other purposes the combination of a casing or body provided with a discharge passage near the upper end and with two opposing valve seats surrounding a common passage, a perforated plug located below said seats and passage, an air valve located between said plug and lower seat, and provided with a stem extending through said plug and adapted to be moved upward to close the passage through

its seat, and a vacuum valve located above, and adapted to engage with the upper of said seats. 2nd. The combination of a casing or



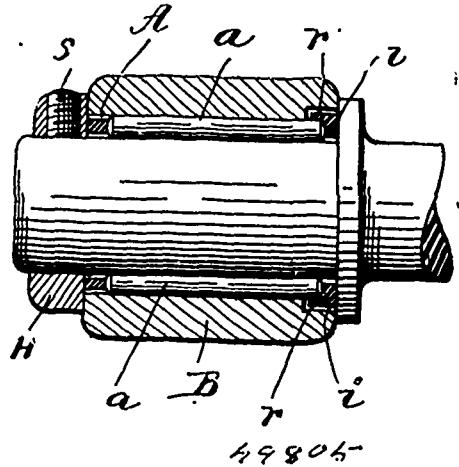
body provided with a discharge passage near its upper end and with two opposing valve seats surrounding a common passage, a perforated partition or plug located below said seats and passage, an air valve located between said plug and the lower seat and provided with a stem extending through said plug and adapted to be moved upward to close the passage through said seat, a float carried by said stem, a second valve located above and adapted to close upon the upper seat. 3rd. The combination in a radiator valve of a casing or body provided with means for connecting it to the radiator and with a discharge passage near its upper end and with two opposing valve seats surrounding a common passage through the same, a valve constructed and arranged to close upon the lower of said seats, a perforated plug having contracted passages for throttling the escaping steam, a valve located above and adapted to close upon the upper of said seats, and a cap to said casing having passages to connect with said discharge passages in the casing and adapted to serve as a cock to close or open said discharge passage. 4th. The combination in a radiator valve of a casing or body having an inwardly projecting annular rib provided with a valve seat upon its under side, a perforated plug or partition located below said seat, a flat disc like valve located between said plug and valve seat and provided with a stem fitted to and guided by a bearing in said plug, and means for arresting the downward movement of said valve at point a short distance above the upper surface of said plug. 5th. The combination in a radiator valve of a casing or body having an inwardly projecting annular rib provided with a valve seat upon its under side, a perforated plug or partition located below said seat, a flat disc like valve located between said plug and seat and provided with a stem fitted to and guided by a bearing in said plug, and a removable disc mounted on said stem below said valve, substantially as and for the purposes described. 6th. In a radiator valve, the combination of a casing provided with means for securing it to the radiator, with discharge passages near its upper end and with a perforated partition having a valve seat, a plug cap to close the upper end of said casing and provided with the annular channel *h*, and the lateral passage *g'*, *g'*, a vacuum valve fitted to said seat and guided in a bearing in said plug cap, and a spring enclosed in said annular channel and resting upon said valve. 7th. The combination with a radiator pipe, of an air and vacuum valve provided with a threaded shank screwed into said radiator pipe, and extending nearly to the centre of said pipe, and having an annular groove or reduction formed on said inwardly projecting portion *w*; an annular lip or enlargement at its inner end. 8th. In a radiator valve the combination of a casing provided with discharge passages near its upper end and with a perforated partition having a valve seat, a vacuum valve to rest upon said seat, a plug cap to close the upper end of said casing and provided with a central gateway for the stem of said valve, and passages connecting the upper end of said gateway and the chamber below said plug cap with the discharge passages from said casing.

No. 49,805. Roller Bearing. (Coussinet anti-frottant.)

Frank Mossberg, Attleborough, Massachusetts, U.S.A., 28th August, 1895; 6 years.

Claim. 1st. A roller bearing cage consisting of a tube or sleeve of parallel bars the adjacent sides of which are made oppositely concave and are connected at one end by a solid portion integral with said bars, and at the other end by the perforated flange, of a diameter greater than the diameter through the barred portion, forming an

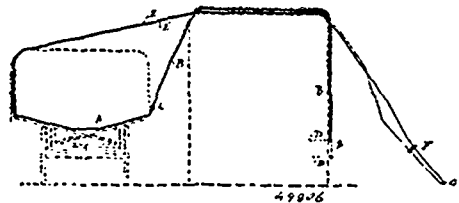
integral part thereof, the anti-friction rolls, held between the concave surfaces of the bars, and the ring adapted to secure said rolls



in place, substantially as described. 2nd. In a roller bearing, a cage to hold the rolls, consisting of a series of parallel bars solidly connected together at one end, and forming receptacles between them to receive the rolls, and closed at their other ends by a cap having projections, entering into the spaces between the ends of the bars, with said cap and rolls, and means for holding said cap to the bars, all said parts combined substantially as described. 3rd. In a roller bearing, a cage to hold the rolls, consisting of a series of parallel bars connected together at both ends by caps having projections entering into the spaces between the ends of the bars, with said caps and rolls, and means for holding said caps to the bars, all said parts combined substantially as described. 4th. A roller bearing cage connected solidly together at both ends and having a groove in the end of the cage bars to receive a ring to retain the rolls in combination with a ring to occupy said groove and a set of rolls to run between said cage bars, substantially as described. 5th. A roller bearing cage consisting of a series of bars solidly connected together at both ends with means, substantially as described, for retaining the rolls between the bars when not applied to a journal. 6th. A roller bearing cage consisting of a series of bars connected together at both ends in a substantially solid manner with means for retaining the rolls between the bars when not applied to a journal.

No. 49,806. Hay-Rack Unloader and Stack Builder.

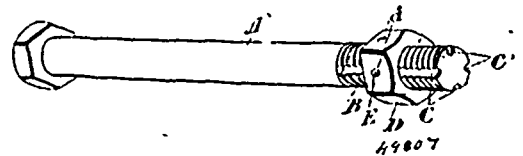
(Appareil à décharger le foin et mettre en meule.)



John Butcher, Winnipeg, Manitoba, Canada, 28th August, 1895; 6 years.

Claim.—The combination of the ropes, hooks, rings and pins above described and shown in the drawings, substantially as and for the purposes hereinabove set forth.

No. 49,807. Nut Lock. (Arrête-écrou.)

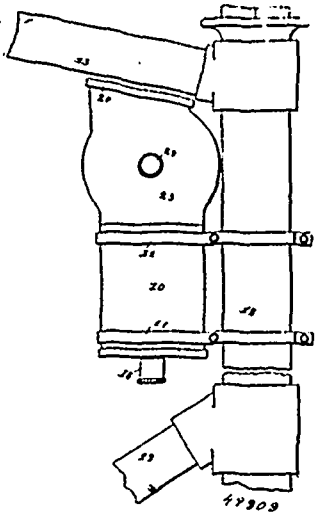


John William Hayward and Seward Young, both of Toronto, Ontario, Canada, 28th August, 1895; 6 years.

Claim.—In a nut lock, the combination with the bolt provided with a threaded end and longitudinal grooves extending through the threaded end of the bolt, of a nut provided with a hole, and a plunger wire designed to be brought into one of the longitudinal grooves in the bolt, as and for the purpose specified.

No. 49,808. Air Pump for Bicycles.

(*Pompe pneumatique pour bicycles.*)



Aquila Bolton Marshall, and Edwin E. Dickinson, both of New York, State of New York, and Charles B. Baynton, Newark, New Jersey, all in the U.S.A., 28th August, 1895; 6 years.

Claim.—1st. The combination, with the bicycle, of the air pump strapped to the bicycle frame, a nipple at the discharge end of the pump, a cap to cover the nipple, a detachable crank for working the pump, and a cap to cover the crank axle, substantially as described. 2nd. The combination, with a bicycle, of a pump secured thereto, and comprising a cylinder having a reduced upper end an inlet valve and discharge nipple in its bottom, crank discs mounted in the reduced upper end of the cylinder, a piston in the cylinder and connected with the crank discs, and a crank detachably secured to the axle of the crank discs, substantially as described. 3rd. The herein described air pump, comprising a cylinder reduced and flattened at one end and provided at the other with an inlet valve and discharge nipple, a cap for the nipple, a piston in the cylinder, crank discs journaled in the flattened portion of the cylinder and operatively connected with the piston, a detachable crank for the axle of the crank discs, and a cap to cover the crank axle, substantially as described. 4th. An improved air pump for bicycles, comprising a cylinder having a flattened upper end, and provided in its bottom with an inlet valve and a discharge nipple, the flattened portion of the cylinder being provided with bearings one of which is externally screw-threaded to receive a cap, crank discs, each provided with an axle fitting in said bearings, the axle of the screw-threaded bearing projecting therethrough, a piston in the cylinder, a pitman connecting the piston with the crank discs, and a crank adapted to fit upon the projecting axle of the crank discs, substantially as herein shown and described.

No. 49,809. Bit for Horses. (*Mors de bride.*)

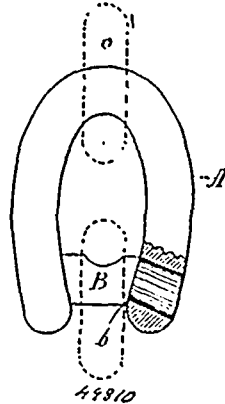


William E. Simonds, Canton, assignee of Henry Small, Hartford, both of Connecticut, U.S.A., 28th August, 1895; 6 years.

Claim. 1st. The combination of the ordinary driving reins *a*, the bail *b* encompassing the upper lip of the horse, and a support for the bail locating it below the nostrils, all substantially as described and for the purposes set forth. 2nd. The combination of the ordinary driving reins *a*, the bail *b*, provided with the pressure boss *c*, and a support for the bail locating it below the nostrils, all substantially as described and for the purposes set forth. 3rd. The combination

of the ordinary driving reins *a*, the ordinary bit *c*, the bail *b* encompassing the upper lip of the horse, and a support for the bail locating it below the nostrils, all substantially as described and for the purposes set forth. 4th. The combination of the ordinary driving reins *a*, the bail *b* encompassing the upper lip, and the strap *d* supporting the bail below the nostrils, all substantially as described and for the purposes set forth.

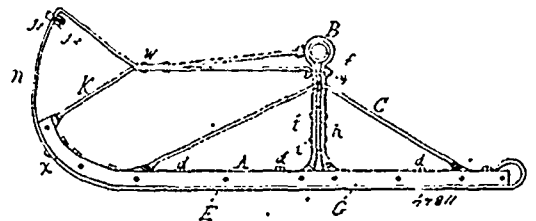
No. 49,810. Chain-Coupling. (*Attelage de chaines.*)



Cyrus F. Noble, Baldwin, Maine, U.S.A., 20th August, 1895; 6 years.

Claim. 1st. The herein described chain-coupling, consisting of a link, bent or folded on itself to form two incomplete eyes, combined with a bolt adapted to be inserted endwise into said eyes, said bolt being provided with a shoulder or projection inside of each eye for retaining it in place. 2nd. The herein described chain-coupling, consisting of a link, bent or folded on itself to form two incomplete eyes, the ends of said link containing the eyes being drawn in to bring the said eyes out of line, combined with a bolt adapted to be inserted endwise into said eyes, the ends of said bolt being inclined to fit the said eyes and said bolt being provided with shoulders or projections inside of each eye for retaining it in place.

No. 49,811. Sleigh. (*Traineau.*)

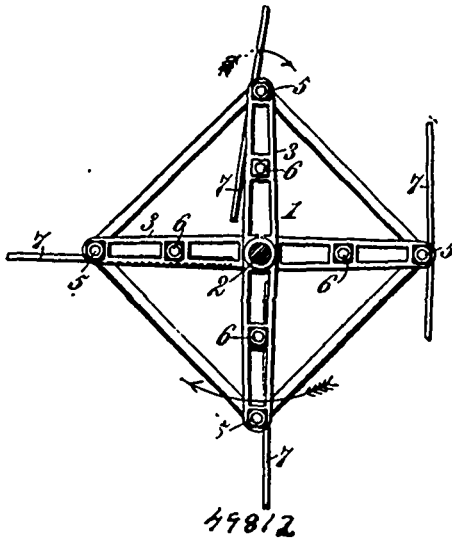


Dean S. Hall, Cabot, Vermont, U.S.A., 20th August, 1895; 6 years.

Claim. 1st. In a sleigh or sled a post *B* composed of a single piece of flat steel or other metal doubled together forming an adjustable loop or eye at upper end to receive the end of beam *f* or a section thereof and so constructed that it shall be adjustable and capable of being drawn tight upon said beam by means of a bolt or bolts or grip and yoke or other similar device, substantially as described. 2nd. In a sleigh, the combination runner *A*, composed of two longitudinal parallel sides *G G*, curved edge-wise to form the rise at forward end and intervening space, with the post *B* and beam *f* or section thereof of metal tube, substantially as and for the purpose hereinbefore set forth. 3rd. In sleigh in combination with runner *A* and post *B* the brace *C* of flat material provided at or near each end with a quarter twist and secured between the two sides of runner *G G* at each end one in front and the other in rear of post *B*, the middle portion being fastened to post *B*, directly below the beam *f* by link or staple or other equivalent device. 4th. In a sleigh a beam *f* of metal tubing in which is inserted a flat steel bar or support *g* of suitable length and placed vertical to the strain. 5th. In a sleigh in combination with the post *B* and brace *K* the grip and yoke *Y*, substantially for the purpose specified. 6th. In a sleigh with runners formed of two longitudinal parallel sides the combination of braces *N* and *K* rigidly riveted at *W* and diverging vertically in front and laterally in rear of said connection, substantially as described. 7th. In a sleigh with post *B* formed of flat steel or other metal the combination of notches and staple or link *S* and brace *c*, substantially as described. 8th. In a sleigh or sled the yielding clasp *p*, with space between the lugs through which the bolt passes, sufficiently large to allow the clasp to be drawn tight upon the beam *f* and holding by friction on said beam, substantially as and for the

purpose herein described. 9th. In a sled or sleigh a combination of cross-bars J¹ and J², one or both being composed of two transverse parallel sides of steel or other metal, or a combination of wood and metal and removed from each other by a space sufficient to receive the swinging arms O O which are placed therein all arranged as and for the purpose hereinbefore described.

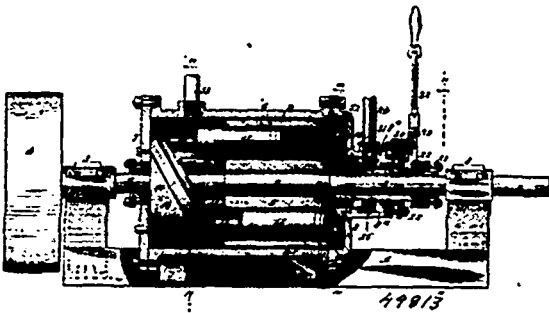
No. 49,812. Current-Wheel. (Roue à courant.)



William Park, Fredonia, New York, U.S.A., 29th August, 1895; 6 years.

Claim.—1st. A current-wheel consisting of a skeleton frame, and flat wings pivotally mounted upon radial members of said frame, substantially as described. 2nd. A current-wheel consisting of a skeleton frame composed of radial members rigidly mounted on a central shaft, and flat wings pivotally mounted on said radial members, the point of pivotal attachment being upon one side of the central line of each wing, substantially as described. 3rd. A current-wheel consisting of a shaft, radial portions composed of parallel bars connected at their ends and at points between their ends, braces arranged in parallelism with the shaft and connecting said radial portions, and flat wings mounted pivotally on the other braces, the point of attachment being upon one side of the centre of each wing, substantially as described.

No. 49,813. Steam Engine. (Machine à vapeur.)



Richard Garstang, Alton, Illinois, U.S.A., 29th August, 1895; 6 years.

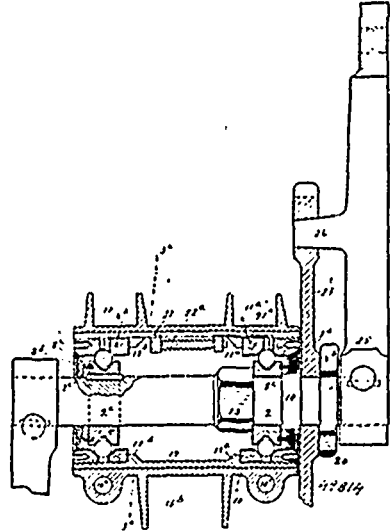
Claim.—In an engine, the combination of a shaft, a cylinder mounted on the shaft and provided with a plurality of pistons, an inclined, grooved, stationary block, an anti-friction ring, and one or more series of rolls placed between the block and the ring, substantially as and for the purpose set forth.

No. 49,814. Bicycle Bearing. (Coussinet de bicyclette.)

Horace E. Dodge and John F. Dodge, both of Detroit, Michigan, U.S.A., 29th August, 1895; 6 years.

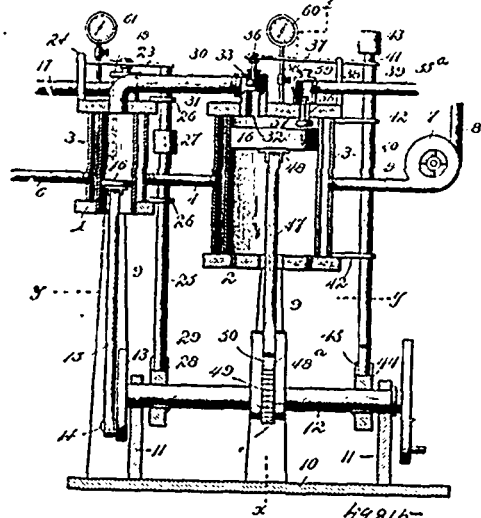
Claim.—1st. In a bearing for wheel hubs, the combination of a shell provided with a bearing groove at each end, an axle provided with a bearing groove at each end, an axle provided with counter bearings, one of which is rigid and the other of which is adjustable along the axle, substantially as specified. 2nd. In an axle bearing for wheels, an outer split case provided with means whereby it may

be attached to the vehicle frame, and with means whereby it may be contracted on an inner shell, an inner split shell, ball bearing



cones adapted to be inserted in the inner shell, and an axle provided with cone bearings, substantially as described. 3rd. In an axle bearing for wheels, an outer split shell, provided with means whereby it may be contracted, an inner split shell threaded at its ends, threaded cone bearings adapted to engage with the inner shell and knurled on their inner faces, a spring pressed holder adapted to engage the knurled faces, substantially as described. 4th. In an axle bearing for wheels, a combination with a case and outer or hollow cone bearings, an inner or right cone bearing, a soft gasket and means for holding the same spaced from the cone, whereby an oil duct is formed around the axle between the gasket and the bearings, substantially as described. 5th. In an axle bearing, in combination with a case and hollow cone bearings, disposed at the ends of said case, an axle and cone bearing thereon, one of said cone bearings being free to move longitudinally along the axle, whereby the cones are self adjusting to bring the cones and hollow cones into opposing engagement with interposing balls, substantially as specified. 6th. In combination with ball bearing axle and shell, provided with opposing annular cavities, the walls being adapted to interlock, and a gasket adapted to be pressed by the walls of one cavity against the bottom of the other, substantially as described. 7th. In combination with a crank axle and crank arm, a detachable sprocket secured to the crank arm, substantially as described. 8th. In combination with the crank shaft, the holding nut 24, and the crank arm 25, provided with a projection 26, adapted to engage the sprocket-wheel and drive the same, substantially as described.

No. 49,815. Steam Engine. (Machine à vapeur.)

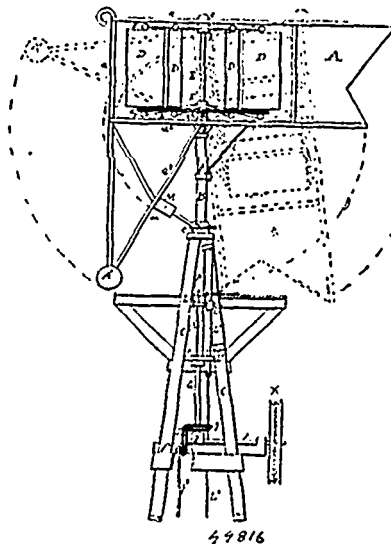


William R. Dow, Alameda, California, U.S.A., 29th August, 1895; 6 years.

Claim. 1st. In a steam engine, the combination of separate upright live and exhaust steam cylinders having lower open ends

the exhaust steam cylinder having a relatively larger capacity than the other cylinder, the vacuum elevated solid piston heads arranged to work in both cylinders, a live steam pipe connected with the live steam cylinder, an exhaust steam pipe connecting both cylinders, to carry the exhaust steam from the live to the exhaust steam cylinder and automatically operated valve devices for the live steam and exhaust pipes to provide for simultaneously cutting off the supply of live steam and opening up communication between both of the cylinders, substantially as set forth. 2nd. In a steam engine, the upright live and exhaust steam cylinders having lower open ends, the exhaust steam cylinder having a relatively larger capacity than the other cylinder, the solid piston heads arranged to work in both cylinders, the piston head in the larger cylinder being weighted to provide for carrying the same to the limit of its downstroke, a live steam pipe connected with the smaller live steam cylinder, an exhaust pipe connecting the two cylinders, a condenser and air pump pipe connected with the upper end of the exhaust steam cylinder, automatically operated valve devices for the live steam and exhaust pipes to provide for cutting off the supply of live steam and opening communication with both cylinders at one and the same time, and an automatically operated valve for said condenser and air pump pipe, substantially as set forth. 3rd. In a steam engine, the combination of the upright live and exhaust steam cylinders having lower open ends, the exhaust steam cylinder having a larger capacity than the other cylinder, the pistons arranged to work within the cylinders, the horizontal drive shaft supported to rotate below the cylinders and having a crank-wheel at one end, the pitman connected to said piston heads, the pitman of the live steam cylinder being connected with said crank-wheel, a pawl and ratchet connection between the other pitman and the shaft, a cam disc mounted on said shaft and provided with a trip shoulder, the live steam pipe connected with the upper end of the live steam cylinder and having a valve casing, a winged cut off valve arranged to work within the valve casing and having a stem working through and above the casing, a valve adjusting lever connected with the upper end of the stem of said valve, a normally downwardly depressed tappet rod supported for vertical movement at one side of the live steam cylinder under said valve adjusting lever, and having its lower end riding on the periphery of said cam disc, an exhaust steam pipe connecting the upper ends of the two cylinders and provided with an automatic valve, and a valved condenser and air pump pipe connected with the upper end of the large exhaust steam cylinder, substantially as set forth. 4th. In a steam engine, the combination of the upright live and exhaust steam cylinders of different capacities and having lower open ends, the piston heads arranged to work within the cylinders, the horizontal drive shaft supported to rotate below the cylinders and having a cam disc provided with a trip shoulder, the pitman connected to said piston heads and with the drive shaft, a valved live steam pipe connected with the live steam cylinder, an exhaust steam pipe connecting the two cylinders and having a valve casing at the point of connection with the exhaust steam cylinder, a valve plug arranged to work within said casing and having a stem working thereabove, a suitably supported valve lever connected at one end to said valve stem, a normally downwardly depressed tappet rod supported for vertical movement on one side of the exhaust steam cylinder, and connected with said valve lever and having its lower end riding on the periphery of said cam disc, and a valved condenser and air pump pipe connected with the upper end of said exhaust steam cylinder, substantially as set forth. 5th. In a steam engine, the combination of the upright live and exhaust steam cylinders of different capacities and having lower open ends, the vacuum elevated piston heads arranged to work within the cylinders, the piston head for the exhaust steam cylinder being adapted to remain stationary at one point in the operation, a horizontal drive-shaft, the pitman connected to said piston-head, a ratchet disc mounted at an intermediate point on said shaft, swinging pawl arms mounted loosely on the shaft and connected at their swinging ends to the lower end of the pitman for the piston-head of the exhaust steam cylinder, a spring pawl attached to said pawl arms and engaging said ratchet-wheel, a crank connection between the other pitman and the shaft, and the valved live steam and exhaust connections for said cylinders, substantially as set forth. 6th. In a steam engine, the combination of the upright live and exhaust steam cylinders having lower open ends the pistons working within the cylinders, a valved live steam pipe connected with the upper end of the live steam cylinder, a valved exhaust steam pipe connecting the upper ends of both cylinders, a condenser and air pump pipe connected to the upper end of the exhaust steam cylinder, and a vacuum valve arranged to work in the valve opening at the connection of the condenser and air pump pipe with the exhaust steam cylinder and provided at its upper side with a winged stem working through and above the valve opening, said valve being supported in one position against its seat by the piston with the exhaust steam cylinder, substantially as set forth. 7th. In a steam engine, the combination of the upright cylinder having a lower open end, a valved exhaust steam pipe connected with the upper end of said cylinder to feed exhaust steam thereto, the condenser and air pump pipe, also connected with the upper end of said cylinder, and a vacuum valve arranged to work in the valve opening at the connection of the condenser and air pump pipe with the cylinder, said valve being supported in one position against its seat when the piston is at rest within the upper end of the cylinder, substantially as set forth.

No. 49,816. Windmill. (*Moulin à vent.*)



Henry Sutton Hopper, Detroit, Michigan, U.S.A., 29th August 1895; 6 years.

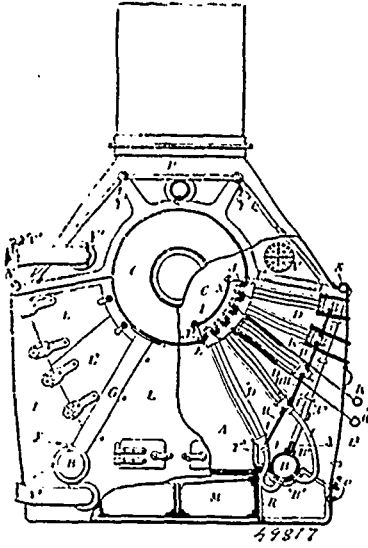
Claim.—1st. In a wind motor the combination of a vane connected by horizontal pivots to a hollow vertical mast adapted to turn with the vane, and a wind-wheel rotating a vertical shaft journaled upon the vane, substantially as described. 2nd. In a wind motor the combination of a vane connected by horizontal pivots to a hollow vertical mast adapted to turn with said vane, a wind-wheel rotating a shaft journaled upon the vane, a vertical power-shaft rotating within the hollow mast, and a universal coupling connecting the wind-wheel shaft with the power-shaft, substantially as described. 3rd. In a wind motor the combination of a vane connected by horizontal pivots to a hollow vertical mast adapted to turn with the vane, a wind-wheel rotating shaft journaled upon said vane, a counterbalance weight adapted to hold the wind-wheel shaft vertical in ordinary winds, and a universal coupling communicating motion to a vertical power-shaft rotating within the hollow mast, substantially as described. 4th. In a wind motor the combination of a vane pivotally connected with a hollow vertical mast adapted to be turned thereby, a wind wheel rotating a shaft journaled upon said vane, a weight suspended from the windward end of the vane, a chain or cable attached to the leeward end of the vane and extending through the hollow mast, and a slot in the lower portion thereof to a sliding collar, a shifter-fork engaging a groove in the sliding collar, and means for drawing it and the sliding downward to incline the wind-wheel and shaft from the vertical, substantially as and for the purpose described. 5th. In a wind motor the combination of a vane pivotally connected to a hollow vertical mast adapted to be turned thereby, a wind-wheel rotating a shaft journaled upon the vane, a ring or link rigidly attached to one end thereof, a vertical power-shaft rotating within the hollow mast, a ring or link rigidly attached to the upper end thereof, and a loose ring engaging the rigid rings upon the said shafts, substantially as and for the purpose described. 6th. In a wind motor the combination of a vane connected by horizontal pivots to a vertical mast adapted to be turned thereby, a wind-wheel rotating a vertical shaft journaled upon the vane, a weight attached to a bracket suspended from the windward end of the vane, a dash-pot attached to said bracket, and a plunger attached to the vertical mast adapted to fit into the dash-pot and form a cushioned stop against which the vane is held in ordinary winds, substantially as described. 7th. In a wind motor the combination of a vane connected by horizontal pivots to a vertical mast adapted to be turned thereby, a counterbalance weight attached to the windward end of the vane, a shaft journaled upon said vane, having wheels attached thereto, and sails located between said wheels and pivotally attached to the periphery thereof, substantially as described.

No. 49,817. Water Boiler. (*Chaudière à eau.*)

Ernest Petersen, Blackfriars Road, England, 29th August, 1895; years.

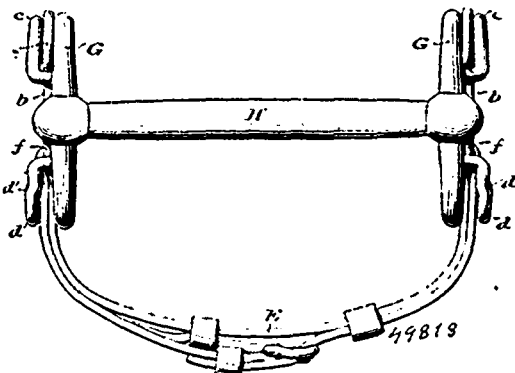
Claim.—1st. In water tube-boilers wherein two lower water chambers, situated one on each side of the furnace grate are connected to an upper water and steam chamber above the grate by a number of tubes of small diameter, the use of water tubes composed of a group of tubes connected at each end to a closed cup or chamber, the one such chamber being connected by a neck with coned end surface directly to the upper water and steam chamber of the boiler while the other cup or chamber is connected by a neck or connecting tube

to a lower water chamber of the boiler so that the water circulates from the latter through the cups and tube group to the upper water



and steam chamber while the flames and furnace gases pass in contact with the tube groups there being two or more rows of such tube groups one behind the other on each side of the furnace arranged, substantially as described. 2nd. In water tube boilers having tube groups such as are mentioned in the first claim, attaching the one cup of the group to the upper steam and water chamber by passing the threaded neck of the cup through a hole in the chamber and securing it by means of an internal screw nut and washer, the conical surface of the cup serving to form, with or without packing, the water tight joint outside the chamber, substantially as described. 3rd. A compound water tube for water tube boilers consisting of a group of tubes connected at each end to cups or boxes of conical or ogival shape having at their large flat end a series of holes for the reception of the ends of the tubes and at the small end a tubular neck serving to connect it to other parts of the boiler, substantially as described. 4th. A box or cup for a compound water tube such as is referred to in the preceding claim consisting of a conical or tapering receptacle E having a flat, circular or rectangular face at the larger end, with a series of holes adapted to receive the ends of the water tubes D and a threaded tubular extension at the smaller end, adapted to be secured to the water and steam chambers of the boiler, substantially as described.

No. 49,818. Bit for Horses. (Mors de bride.)

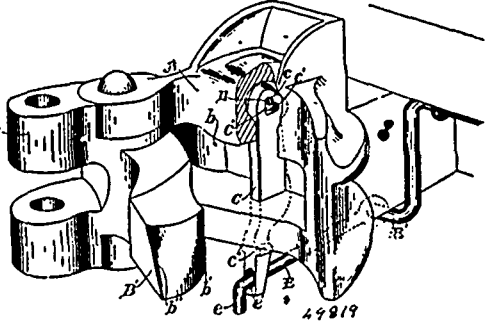


Joseph Clamer, Trenton, New Jersey, U.S.A., 29th August, 1895; 6 years.

Claim.—1st. In a bit, the combination of a mouth-piece, two rings attached respectively to the ends of the mouth-piece, and a lever connected with each of said rings, and adapted to swing relatively to the mouth piece, said levers having means at their free ends for attaching the overdraw thereto, and means on their middle portions for attaching thereto the ends of a chin strap, substantially as shown and described. 2nd. In a bit, the combination of a mouth-piece, two rings attached respectively to the ends of said mouth-piece, a lever connected with each of said rings to swing relatively to the mouth piece, each of said levers having means at its free end for attaching thereto the overdraw, and means on its middle portion for attaching the chin strap thereto, and a guide on

each ring for the lever connected with said ring, and a guide on said ring for the chin strap, substantially as shown and described. 3rd. In a bit, the combination of a mouth-piece, two rings attached respectively to the ends of said mouth-piece, a fulcrum bar attached to each of said rings a lever fulcrumed on each of said fulcrum bars to swing relatively to the mouth-piece, each of said levers having means at its free end for attaching thereto the overdraw, and means on its middle portion for attaching thereto a chin strap, and a guide on each ring for the lever connected with said ring, and a guide for the chin strap, substantially as shown and described. 4th. The combination of the mouth-piece of a bit, two rings attached respectively to the ends of said mouth-piece, a lever connected with each of said rings to swing relatively to said mouth-piece, said levers having at their free ends means for attaching the overdraw thereto and means on their middle portions for attaching the chin strap thereto, a chin strap connected at its ends with said levers, an overdraw connected with the free ends of said levers and the lines attached to said rings, substantially as shown and described.

No. 49,819. Car-Coupler. (Attelage de chars.)



Charles W. Hinton, Los Angeles, California, U.S.A., 29th August, 1895; 6 years.

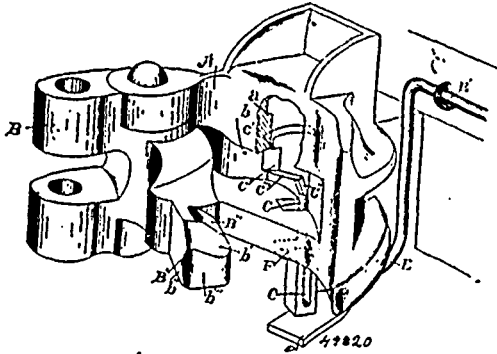
Claim. 1st. A car-coupling comprising a swinging knuckle provided with an arm, a swinging locking bar adapted to lock the arm against movement and to be swung out of the path of the arm, and suitable means arranged to engage and hold the bar in position to allow the arm to pass and means arranged to be operated by the arm to release the bar, and allow it to swing into its normal position after the arm has passed out of the path of the bar. 2nd. A car-coupling provided with a swinging knuckle having an arm rigidly fixed thereto, a locking bar pivoted to swing into and out of the path of the arm, and arranged to be reciprocated to raise it in the draw-head, a locking device arranged to lock the bar in its elevated position, and suitable means arranged to be operated by the arm to release the bar from the locking device. 3rd. A car-coupling provided with a swinging knuckle having an arm rigidly fixed thereto, a swinging locking bar pivoted by its upper end in the draw-head and arranged to swing into and out of the path of the arm, and having its pivot hole elongated and provided with two pivot seats, one above the other, the bar being arranged to engage a shoulder on the draw-head when the bar is swung to the rear out of the path of the arm and raised in the draw-head to seat the lower pivot seat upon the pivot, and to be released therefrom when the bar is lowered to seat the upper pivot seat upon the pivot, and suitable means for operating the bar. 4th. A car-coupling having a swinging knuckle provided with an arm projecting therefrom and adapted to be chambered in the draw-head, a swinging locking bar pivoted in the draw-head, and arranged to normally extend across the path of the arm, and to swing to allow the arm to pass the bar, a suitable catch arranged to engage the bar when the bar is swung to allow the arm to pass, suitable means arranged to be operated by the arm to release the bar from the catch so the bar will swing into the path of the arm after the arm has passed thereby, the rear face of the arm being bevelled and arranged to engage the bar to swing it out of the path of the arm when the arm is forced to the rear, and means for swinging the bar to allow the arm on its forward movement to pass the bar. 5th. In a car-coupling having a swinging knuckle provided with an arm projecting therefrom and adapted to be chambered in the draw-head, the combination therewith of a locking bar provided with an elongated pivot hole having two pivot seats, one arranged above the other, and provided with a lug arranged to engage with a shoulder on the draw-head to allow the arm to pass the bar when the bar rests with the pivot in one of the pivot seats, and to be released from such shoulder to allow the bar to spring into the path of the arm when the bar is shifted to cause the bar to rest with the pivot in the other pivot seat, the pivot arranged to pivot the bar in the draw-head, and suitable means for operating the bar.

No. 49,820. Car-Coupler. (Attelage de chars.)

Charles W. Hinton, Los Angeles, California, U.S.A., 29th August, 1895; 6 years.

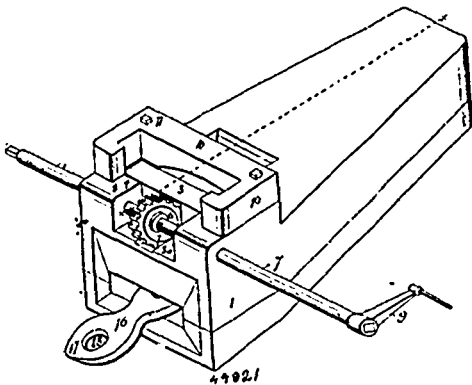
Claim.—1st. In a car-coupling, the reciprocating locking bar arranged to engage the arm of the draw-bar, to incline forward and

provided on its front face with the catch arranged to engage the draw-head to support the bar in its elevated position, and also pro-



vided with the stop arranged to limit the upward movement of the bar while the coupling is being effected. 2nd. In a car-coupler, the reciprocating locking bar provided with the shoulder and with the bevelled face arranged below such shoulder, and also provided on its front face with the catch arranged to support the bar in its elevated position, such bar being arranged to engage an inclined face in the chamber to force the bar forward to throw the catch into engagement. 3rd. A car-coupler, provided with a swinging knuckle having an arm rigidly fixed thereto and adapted to be chambered in the draw-head, a locking bar arranged to reciprocate vertically in the draw-head and provided with a locking shoulder adapted by the reciprocation of the bar to be thrown into and out of the path of the arm, and provided with a suitable catch arranged to engage the draw-head to hold the locking shoulder of the bar out of the path of the arm, such bar being arranged to be engaged by the arm to release the catch from the shoulder.

No. 49,821. Car-Coupler. (Attelage de chars.)



Horace Lester Dunlap, North Topeka, Kansas, U.S.A., 29th August, 1895; 6 years.

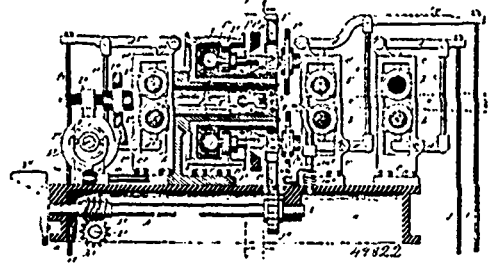
Claim.—1st. In a lathe for irregular shapes, the combination with a tool, of means for revolving said tool in an orbit parallel to the desired cross-contour of the article and varying the shape of said orbit as the tool operates at different points along the length of said article, substantially as set forth. 2nd. In a lathe for irregular shapes, the combination with a tool and means for rotating said tool upon its axis, of means for revolving said tool in an orbit parallel to the desired cross-contour of the article to be produced and for varying the orbit of motion of the rotating tool in accordance with the desired contour of the article as the tool operates at different points along the length of said article, substantially as set

No. 49,822. Lathe. (Tour.)

Henry William Norton Cole, Brooklyn, New York, U.S.A., 29th August, 1895; 6 years.

Claim.—1st. In a lathe for irregular shapes, the combination with a tool, of means for revolving said tool in an orbit parallel to the desired cross-contour of the article and varying the shape of said orbit as the tool operates at different points along the length of said article, substantially as set forth. 2nd. In a lathe for irregular shapes, the combination with a tool and means for rotating said tool upon its axis, of means for revolving said tool in an orbit parallel to the desired cross-contour of the article to be produced and for varying the orbit of motion of the rotating tool in accordance with the desired contour of the article as the tool operates at different points along the length of said article, substantially as set

forth. 3rd. In a lathe for irregular shapes, the combination with a tool, of means for revolving said tool about the article, and a peri-



pherally varying guide controlling the orbit of movement of said tool, said guide being of different shape at different portions of its length, and means for causing relative longitudinal movements of said guide, substantially as set forth. 4th. In a lathe for irregular shapes, the combination with a tool and means for rotating the same upon its axis, of means for revolving said tool about the article, and a peripherally varying guide controlling the orbit of movement of said tool, said guide being of different shape and different dimensions at different portions of its length, and means for causing relative longitudinal movements of said guide, substantially as set forth. 5th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tools carried thereby and mechanism for feeding the blank or article through said tool head, of means for rotating said tools upon their axes as they are caused to revolve about the article, and a guide controlling the movement of said tools in accordance with the desired irregular contour of the article, substantially as set forth. 6th. In a lathe or irregular shapes, the combination with a rotating tool head and one or more tool shafts fitted to rotate therein and one or more tools carried thereby, the bearings of said shafts being so constructed as to permit the tools to approach to and recede from the axis of revolution, and mechanism for feeding the blank or article through said tool head, and gears upon said tool shafts and a driving gear with which said gears of the tool shafts are held in engagement in their revolution about the article, and means for rotating said driving gear independently of the rotation of the tool head, and a guide controlling the movement of said tools and means for operating said guide so that it will actuate the tools in accordance with the desired irregular contour of the article, substantially as set forth. 7th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tool shafts carried thereby, and tools upon said shafts and means for rotating said tool shafts, and mechanism for feeding the blank or article through said tool head, of a guide having its contour varied in accordance with the contour desired in the article, and one or more contact devices connected to said tools, and means for moving said guide so as to bring said contact devices into contact with different portions of said guide according to the desired contour of the article, substantially as set forth. 8th. In a lathe for irregular shapes, the combination of a rotating tool head, one or more tool shafts held at one end in a bearing having a fixed position on said tool head and at the other end by a bearing fitted to slide in said tool head and one or more tools carried by said tool shafts, said bearings permitting said tools to move toward and from the axis of revolution, means for rotating said tool shafts and tools upon their axes, and a guide controlling the movement of the tools and tool shafts to and from the axis of revolution in accordance with the desired irregular contour of the articles, substantially as set forth. 9th. In a lathe for irregular shapes, the combination of a rotating tool head, one or more tool shafts held in bearings thereon, and one or more tools carried thereon said tool shaft bearings being so constructed as to permit the tools to move toward and from the axis of revolution, means for rotating said tool shafts independently of the rotation of the tool head, and a guide controlling the movement of said tools and tool shafts to and from the axis of revolution, and having its contour varied in accordance with the contour desired in the article, and means for moving said guide so as to bring different portions of its surface into operation upon said tools in accordance with the desired irregular contour of the article, and means for feeding the article under the action of said tools, substantially as set forth. 10th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tools carried thereby, and a non rotary head stock carrying said tool head and having a tubular opening therethrough, of spring guides held in said head stock and adapted to centre and guide the article as it passes through the bore of the head stock, and a suitable feeding mechanism adapted to co-operate with said spring guides in feeding the article under the action of said tools, substantially as set forth. 11th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tools carried thereby, and a non-rotary head stock carrying said tool head and having a tubular opening therethrough, of spring guides held in said head stock and adapted to centre and guide the article as it passes through the bore of the said head stock, and the sets of feed rollers b , b' and b'' , both of said sets of feed rollers b and b' being adapted to guide the article under the action of the tools until the article is guided at one end

by said spring guides, and the set of feed rollers b^1 continuing to guide said article until the article enters the feed rollers b^2 , whereby the article is at all times guided at two points along its length when under the action of the tools, substantially as set forth. 12th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tools carried thereby, and a guide controlling the movement to and from the axis of revolution of said tools, and actuating mechanism for said guide, of feeding mechanism for the blank or article, and means operated by said blank or article for starting and stopping said guide actuating mechanism, substantially as set forth. 13th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tools carried thereby, and a movable guide controlling the movement to and from the axis of revolution of said tools, and actuating mechanism for said guide, of means for feeding a blank or article under the operation of said tools, and a yielding finger interposed in the path of said blank or article, and a mechanism actuated by said finger for stopping and starting the guide actuating mechanism, substantially as set forth. 14th. In a lathe for irregular shapes, the combination with a rotating tool head and one or more tools carried thereby, and a movable guide controlling the movement of said tools to and from the axis of revolution in accordance with the desired irregular shape of the article, of means for feeding a blank or other article under the operation of said tools, and a yielding finger interposed in the path of said blank or article, an oscillating shaft connected to or engaging with said finger and a clutch mechanism connected to or engaging with said shaft and a clutch mechanism operating said guide for the tools, between which driving shaft and guide operating mechanism the said clutch is interposed, substantially as set forth. 15th. In combination, a rotating tool head and one or more tools carried thereby, a movable guide controlling the movement of said tools to and from the axis of revolution in accordance with the desired shape of the article, means for feeding the blank or article under the operation of said tools, the yielding finger m^2 interposed in the path of said blank

or article, the shaft m and arm m^2 engaging with said finger m^2 , the yoke m^1 on said shaft m , a driving shaft, a cam mounted so as to rotate independently of said driving shaft, a clutch adapted to connect said shaft and cam and engaged by said yoke m^1 , and a contact device bearing against said cam and connected to said guide, substantially as set forth. 16th. In combination, a head stock having a tubular bore, a driving pulley fitted to rotate thereon, and having an internal gearing surface formed thereon, a tool head fitted to rotate around said head stock and one or more tool shafts and tools carried thereby, said tool shafts being provided with pinions meshing into said internal gearing surface of the driving pulley, the bearings for said tool shafts being constructed so as to permit said tools to rotate upon their axes and to move toward and from the axis of revolution, and said tool head having a face plate provided with a gearing surface, a gear meshing into said gearing surface of the face plate and means for actuating said gear, and means for controlling the movement toward and from the axis of revolution of said tools, substantially as set forth. 17th. In combination, the head stock h having a tubular bore, the driving pulley i fitted to rotate thereon and having an internal gearing surface, the tool head j having a face plate j^1 and fitted to rotate upon the sleeve of said driving pulley i , one or more tool shafts j^2 fitted to rotate on their axes in said tool head and held at or near one end by a bearing having a fixed position but permitting angular movement of the shaft and at or near the other end by a bearing fitted to slide in a slot in the face plate j^1 of said tool head, pinions j^2 on said tool shafts meshing with said internal gearing surface of the pulley i , a gear meshing into a gearing surface formed upon the face plate j^1 and means for actuating said gear, a movable guide surrounding said tool shafts and a contact point for each of said tool shafts working against the face of said guide, and means for actuating said guide, and a feeding mechanism for the blank or article, the actuating mechanism of which is connected to said guide actuating and gear actuating mechanism, substantially as set forth.

CERTIFICATES OF THE PAYMENT OF FEES FOR FURTHER TERMS HAVE BEEN ATTACHED TO THE FOLLOWING PATENTS.

- | | |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------|
| 4028. HERMASE LAROSE and XAVIER PRIVÉ, 2nd five years of No. 34,830, from 7th August, 1895. Hay Press, August 3rd, 1895. | 4042. HANS P. CLAUSSEN, 2nd five years of No. 34,885, from 22nd August, 1895. Friction Clutch, August 16th, 1895. |
| 4029. WALTER EDWARD JACKSON and LEWIS A. PLATT, 2nd five years of No. 34,993, from 9th September, 1895. Button, August 6th, 1895. | 4043. JASONS LIMITED, (assignee), 2nd five years of No. 35,448, from 19th November, 1895. Castor for Pulverulent Materials, August 16th, 1895. |
| 4030. ROBERT WASHINGTON MOFFETT, 2nd five years of No. 34,849, from 12th August, 1895. Journal bearings, August 6th, 1895. | 4044. FRANK LESLIE BARTLETT, 2nd five years of No. 35,050, from 19th September, 1895. Process of and Apparatus for Smelting Ores, August 16th, 1895. |
| 4031. NICHOLAS ERNEST REESOR, 3rd five years of No. 22,230, from 8th August, 1895. Gate Opening Device, August 7th, 1895. | 4045. JAMES COOPER and FREDERICK FAIRMAN, 2nd five years of No. 35,482, from 22nd November, 1895. Machine for making Stove Pipes, August 16th, 1895. |
| 4032. THE CONSOLIDATED CAR HEATING COMPANY, (assignee), 2nd five years of No. 34,963, from 2nd September, 1895. Railway Car Heating, August 9th, 1895. | 4046. JAMES COOPER, 2nd five years of No. 35,552, from 3rd December, 1895. Rubber Overshoe, August, 16th, 1895. |
| 4033. ALBERT E. WHITE, 2nd five years of No. 34,940, from 1st September, 1895. Joint for Eave Troughs. August 9th, 1895. | 4047. THOMAS McAVITY and SONS (assignee), 3rd five years of No. 22,612, from 8th October, 1895. Check-Valve, August 20th, 1895. |
| 4034. JOHN O'NEIL, 2nd five years of No. 34,845, from 9th August, 1895. Self-acting Gate, August 9th, 1895. | 4048. PATRICK HENRY GRIFFIN, 2nd five years of No. 35,008, from 12th September, 1895. Device for Testing Car Wheels, August 24th, 1895. |
| 4035. ARTHUR M. CHAMBERS and THOMAS SMITH, 3rd five years of No. 22,259, from 20th August, 1895. Coke Oven, August 12th, 1895. | 4049. PATRICK HENRY GRIFFIN, 2nd five years of No. 35,052, from 19th September, 1895. Conduit for Electric Railways, August 24th, 1895. |
| 4036. PATRICK HENRY GRIFFIN, 2nd five years of No. 35,009, from 12th September, 1895. Car Wheel, August 13th, 1895. | 4050. JOHN O'FLAHERTY, 3rd five years of No. 22,367, from 2nd September, 1895. Medicinal Compound, August 26th, 1895. |
| 4037. MRS. EVA JENNIE HALL, 2nd five years of No. 34,889, from 22nd August, 1895. Needle, August 13th, 1895. | 4051. ARTHUR JAMES WELLS, 2nd five years of No. 34,924, from 23rd August, 1895. Index for Books, August 26th, 1895. |
| 4038. DILMAN B. SHANTZ, 2nd five years of No. 34,862, from 13th August, 1895. Automatic Button Turning Lathe, August 13th, 1895. | 4052. ISAAC F. THOMPSON and WALES LEWIS PALMER, 2nd five years of No. 34,932, from 1st September, 1895. Cut-Off Engine, August 27th, 1895. |
| 4039. DILMAN B. SHANTZ, 2nd five years of No. 34,863, from 13th August, 1895. Button Turning Lathe, August 13th, 1895. | 4053. JERRY S. BOLLMAN, 2nd five years of No. 34,928, from 1st September, 1895. Art or Method of Indexing. August 27th, 1895. |
| 4040. ROBERT McLAUGHLIN, 3rd five years of No. 22,304, from 26th August, 1895. Running Gear for Vehicles, August 16th, 1895. | 4054. THOMAS ALFRED CODE, 2nd five years of No. 35,027, from 17th September, 1895. Knitted Fabrics, August 29th, 1895. |
| 4041. THE PATENT ELBOW COMPANY, (assignee), 3rd five years of No. 22,339, from 1st September, 1895. Machine for Making Stove Pipe Elbows, August 16th, 1895. | 4055. WILLIAM BULLOCH, 2nd five years of No. 35,057, from 20th September, 1895. Rivetting Machine, August 29th, 1895. |

TRADE - MARKS

Registered during the month of August, 1895, at the Department of Agriculture—
Copyright and Trade-Mark Branch.

5393. } THE GAS LIGHT and COKE COMPANY, London, England. General
5394. } Trade Marks, 1st August, 1895.
5395. }
5396. HENRY B. TEED and ARTHUR W. EAKINS, Yarmouth, Nova Scotia, trading as H. B. TEED. Prepared Fish, 1st August, 1895.
5397. BART COTNAM, London, Ont. Bird Seed, 2nd August, 1895.
5398. JOHN FREDERICK RAMSAY, Toronto, Ont. Tea, 2nd August, 1895.
5399. APPLETON, MACHIN and SMILES, London, England. General Trade Mark, 6th August, 1895.
5400. CHEMISCHE FABRIK RHENANIA, Aix-la-Chapelle Kingdom of Prussia, Empire of Germany. Pharmaceutical products and especially for Tetrajodphenolphthalein, 6th August, 1895.
5401. MOSES RISK & SONS, LIMITED, Glasgow, Scotland. Scotch Whisky, 7th August, 1895.
5402. THE EBY, BLAIN COMPANY. LIMITED, Toronto, Ont. Canned Goods, 14th August, 1895.
5403. THE ELGIN NATIONAL WATCH COMPANY, Chicago, Illinois, U.S.A. Watches and Watch movements, 14th August, 1895.
5404. WILLIAM EDGE & SONS, LIMITED, of Brownlowfold Bolton, Lancaster, England. Laundry Blue and other laundry preparations and dyes, 14th August, 1895.
5405. JEMIMA J. WHELPLEY, Greenwich, New Brunswick. Skates, 19th August, 1895.
5406. M. S. BRADT, ANDREW G. BAIN and FRANK ROBERT CLOSE, Hamilton, Ont., trading as M. S. BRADT & CO. Tea, 20th August, 1895.
5407. HARRIET M. VAN ALLEN, Toronto, Ont. Soap, 21st August, 1895.
2408. ENOCH JAMES STUART and ROBERT HERBERT, Montreal, Que., trading as STUART & HERBERT. Bread, 23rd August, 1895.
5409. WM. G. MOEHRING and GEORGE D. F. LEITH, New York, N. Y. U.S.A., trading as WM. G. MOEHRING & CO. Whisky, 24th August, 1895.
5410. ENOCH JAMES STUART and ROBERT HERBERT, Montreal, Que., trading as STUART & HERBERT. Bread and Cakes, 28th August, 1895.
5411. WM. CURRIE & COMPANY, Edinburgh, Scotland. Waterproofs and articles of like description, 31st August, 1895.

COPYRIGHTS

Entered during the month of August, 1895, at the Department of Agriculture—
Copyright and Trade-Mark Branch.

8041. **THEORY AND FACTS.** A Complete Review of the Development of Canada under Protection. Téléphore St. Pierre, Montreal, Que., 2nd August, 1895.
8042. **LE DIRECTORY DE QUÉBEC, 1895-96.** T. L. Boulanger et Ed. Marcotte, Québec, Qué., 2 août 1895.
8043. **POCKET INTEREST TABLE.** By E. L. Stewart Patter-son, Granby, Que., 5th August, 1895.
8044. **LITERATURE, 1896.** Selections from Wordsworth, Coleridge, Campbell and Longfellow. Edited with Introduction, Literary Estimate and Notes. By Wm. Packenham, B.A., and John Marshall, M.A. The Copp, Clark Co. Limited, Toronto, Ont., 8th August, 1895.
8045. **A CORKER.** Bicycle Song. By John F. Davis, Toronto, Ont., 8th August, 1895.
8046. **TABLEAU GATÉCHISME.** Pour l'instruction prompte et facile des Sauvages, des enfants et des personnes ne sachant pas lire, composé par le Rév. Père A. Lacombe, O.M.I., Missionnaire dans l'Amérique du Nord. C. O. Beauchemin et Fils, Montréal, Qué., 9 août 1895.
8047. **REVUE CANADIENNE, AOÛT 1895.** C. O. Beauchemin et Fils, Montréal, Qué., 9 août 1895.
8048. **THE BAND PLAYED ON.** Words by John F. Palmer. Music by Charles B. Ward. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8049. **BELL OF LIFE.** Words by Philip Wingate. Music by H. W. Petrie. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8050. **THE CUP DEFENDER TWO-STEP.** By Charles Harvey. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8051. **CISSY'S WINK.** By Charles Harvey. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8052. **DANCING THE TWO-STEP WITH LULU.** Words and Melody by Thomas Powers. Arranged by H. W. Petrie. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8053. **DORA DALE.** Waltz Song. Words by W. Murdock Lind. Music by Edward Ivison. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8054. **HUSH THEE NOW TO SLEEP, MY BABY.** Lullaby. Words and Melody by Edgar Deering. Piano Accompaniment by H. W. Petrie. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8055. **I WILL LOVE YOU AND YOU WILL LOVE ME.** Words by William H. Gardner. Music by H. W. Petrie. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8056. **IF YOU'LL MARRY ME.** Words by Dave Seymour. Music by Ed. W. Rowland. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8057. **THE LENOX MARCH.** Two-Step. By Rud. O. Goldsmith. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8058. **LITTLE KITTY LITTLE.** Words by Wm. H. Sloan. Music by Chas. Graham. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8059. **THE LOVE THAT I LOST WHEN A BOY.** Words and Music by Raymond Moore. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8060. **TWO LOVING BROTHERS.** Words and Melody by Wm. Johnson. Arranged by H. W. Petrie. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8061. **MAMIE CASSIDY.** Words and Music by Joe Flynn. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8062. **NAPOLEON MARCH.** Words by I. W. Music by Maurice Levi. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8063. **ONLY A BOWERY BOY.** Words by Chas. B. Ward. Music by Gussie L. Davis. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8064. **POSSUMALA DANCE; or MY H-O-N-E-Y.** Words and Music by Irving Jones. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.

8065. PICTURE EIGHTY-FOUR. Words by Chas. B. Ward. Music by Gussio L. Davis. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8066. SWEETHEARTS AGAIN. Words and Music by Chas. Graham. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8067. SWEETHEARTS AGAIN. Words by Thomas Naismith. Music by George Rosey. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8068. THE SUNSHINE OF PARADISE ALLEY. Song and Chorus. Words by Walter H. Ford. Music by John W. Bratton. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8069. WILL YOU LOVE ME, SWEETHEART, WHEN I'M OLD. Words by A. J. Lamb. Music by H. W. Petrie. Whaley, Royce & Co., Toronto, Ont., 10th August, 1895.
8070. PRAIRIE POT-POURRI. Mary Markwell, Regina, N.W.T., 13th August, 1895.
8071. HOWELL'S PROBATE PRACTICE ADMINISTRATION AND GUARDIANSHIP. Second edition. The Carswell Co., L'd., Toronto, Ont., 13th August, 1895.
8072. BONNYFIELD MARCH. By Nathaniel Spady, Waterloo, Ont., 14th August, 1895.
8073. LE CHIEN DU CAPITAINE. By Louis Enault, and "La Fée." (The Comedy). By Octave Feuillet. Edited with Notes and Vocabulary by F. H. Sykes, A.M., Ph.D., and E. J. McIntyre, B.A. The Copp, Clark Co. L'd., Toronto, Ont., 16th August, 1895.
8074. CÆSAR'S BELLUM BRITANNICUM. With Notes, Vocabulary and Exercises, by John Henderson, M.A., and E. W. Hagarty, B.A. The Copp, Clark Co., L'd., Toronto, Ont., 16th August, 1895.
8075. HIGH SCHOOL PHYSICAL SCIENCE. Part I. By F. W. Merchant, M.A., and C. Fessenden, M.A. The Copp, Clark Co., L'd., Toronto, Ont., 16th August, 1895.
8076. THE HONEYMOON WALTZ. For Piano, by Henry Klein. Whaley, Royce & Co., Toronto, Ont., 17th August, 1895.
8077. CHARLIE. (Song.) Words and Music by Mrs. W. H. Metcalf, Burford, Ont. 19th August, 1895.
8078. THE FARMER'S MANUAL AND COMPLETE ACCOUNTANT. By Prof. J. L. Nichols, A.M. John Adam Hertel, Toronto, Ont., 19th August, 1895.
8079. WHEEL OUTINGS IN CANADA AND C. W. A. HOTEL GUIDE. Edited by P. E. Doolittle, M.D., Toronto, Ont., 19th August, 1895.
8080. HENRIETTA! HAVE YOU MET HER? Words by Walter H. Ford. Music by J. W. Bratton. Whaley, Royce & Co., Toronto, Ont., 22nd August, 1895.
8081. THE YACHT CLUB MARCH. (March and Two-Step.) By Richard H. Barker. Whaley, Royce & Co., Toronto, Ont., 22nd August, 1895.
8082. KOLA-PEPSIN CHEWING GUM. Circular. John McKay, Toronto, Ont., 22nd August, 1895.
8083. OTTAWA CITY DIRECTORY, INCLUDING HULL, P.Q., 1895-96. The Night Directory Company of Toronto, Limited, Toronto, Ont., 22nd August, 1895.
8084. THE RED, RED WINE. A Temperance Story. By Rev. J. Jackson Wray. William Briggs (Book-Steward of the Methodist Book and Publishing House), Toronto, Ont., 23rd August, 1895.
8085. HIGH SCHOOL BOOK-KEEPING BLANKS. For Primary Examination and Commercial Diploma Course. Part I. With Notes. Prepared by J. A. Wismer, M.A. The Copp, Clark Co., L'd., Toronto, Ont., 23rd August, 1895.
8086. MY OWN SWEETHEART. Ballad. Words by Henry Blackey. Music by Chas. R. Palmer. Whaley, Royce & Co., Toronto, Ont., 24th August, 1895.
8087. INSURANCE PLAN OF THE CITY OF HALIFAX, NOVA SCOTIA. Chas. Ed. Goad, Montreal, Que., 27th August, 1895.
8088. CHEMICAL NOTE BOOK, FOR CLASS USE WITH HIGH SCHOOL CHEMISTRY. The Copp, Clark Co., L'd., Toronto, Ont., 28th August, 1895.
8089. MENOTA WALTZES. For Piano. By E. P. Snider. The Anglo-Canadian Music Publishers' Association, Limited, London, England, 28th August, 1895.

8090. **POUR LA PATRIE.** Roman du XXe Siècle. Par J. P. Tardivel, Québec, Que., 28 août, 1895.
8091. **PROGRESSIVE FRENCH READER.** First Part. Edited by H. H. Curtis and L. R. Gregor. W. Drysdale & Co., Montreal, Que., 30th August, 1895.
8092. **OLD MAN SAVARIN AND OTHER STORIES.** By Edward William Thomson. Wm. Briggs (Book-Steward of the Methodist Book and Publishing House), Toronto, Ont., 30th August, 1895.
8093. **THE QUEEN CITY MARCH.** By Wittich-Muir-Yule. The R. S. Williams & Sons Co., Ltd., Toronto, Ont., 30th August, 1895.
8094. **BELL TELEPHONE COMPANY OF CANADA, Limited, LONDON EXCHANGE, SUBSCRIBERS' DIRECTORY, ONTARIO DEPARTMENT, AUGUST, 1895.** The Bell Telephone Company of Canada, Limited, Montreal, Que., 31st August, 1895.
8095. **GRADUATED EXERCISES AND GRAMMATICAL ANALYSIS FOR PARSING.** By J. A. Freeman, B.A. The Copp, Clark Co., Limited, Toronto, Ont., 31st August, 1895.
8096. **CÆSAR'S BELLUM BRITANNICUM.** With Introduction, Notes, Maps, Etc. By J. C. Robertson, B.A. The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8097. **HIGH SCHOOL BOTANICAL NOTE BOOK.** By H. B. Spotton, M.A., F.L.S. The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8098. **GAGE'S BUSY WORK BOOK.** The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8099. **GAGE'S EXERCISE BOOK -VERTICAL WRITING.** The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8100. **GAGE'S ARITHMETIC EXERCISE BOOKS, 1, 2, 3.** The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8101. **GAGE'S BOOK-KEEPING BLANK G 8.** Arranged by R. H. Eldon. The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8102. **LE CHIEN DU CAPITAINE.** By Louis Enault, and La Fée, by Octave Feuillet. Edited with a Biographical and Critical Notice of the Authors, Notes, Vocabulary, Etc. By John Squair, B.A., and John Home Cameron, B.A. The W. J. Gage Company, Limited, Toronto, Ont., 31st August, 1895.
8103. **SELECT POEMS OF COLERIDGE, WORDSWORTH, CAMPBELL, and LONGFELLOW.** Edited with Introductions and Annotations by F. H. Sykes, A.M., Ph. D. The W. J. Gage Company, Limited, Toronto, Ontario, 31st August, 1895.