



110,600.—LIFE BOAT.—James M. Starr, Fond Du Lac, Wis.
110,601.—MALT RESERVOIR.—Charles Stoll, Brooklyn, N. Y.
110,602.—SAFETY ATTACHMENT FOR RAILWAY TRUCKS.—Arnold Strauss, New York city.

4,216.—SHOVEL PLOW AND POTATO-DIGGER COMBINED.—James Millen Dick (assignor to himself and William H. Albro), Buffalo, N. Y.—Patent No. 143,922, dated August 2, 1870.
4,217.—DIVISION B.—HARVESTER.—Rufus Dutton, Yonkers, N. Y.—Patent No. 81,878, dated February 12, 1861; reissue No. 4125, dated September 20, 1870.

4,544 and 4,545.—OIL-CLOTH PATTERN.—John T. Webster, New York city, assignor to Thomas Potter, Son & Co., Philadelphia, Pa. Two Patents.
4,546.—CASE OF A PARLOR ORGAN.—George Woods, Cambridge, Mass.

REISSUES.
4,215.—HOISTING BLOCK.—Joseph A. Burr, Brooklyn, assignor to Burr & Co., New York city.—Patent No. 108,446, dated October 18, 1870.

DESIGNS.
4,535.—FRUIT-GATHERER.—James S. Barry and Alfred M. Barry, Albion, Mich.
4,536 and 4,537.—BACK OF A PLAYING CARD.—Solomon L. Cohen (assignor to Lawrence & Cohen), New York city. Two Patents.
4,538 and 4,539.—OIL-CLOTH PATTERN.—Henry Kagy (assignor to Thomas Potter, Son & Co.), Philadelphia, Pa. Two Patents.

TRADE-MARKS.
112.—WHISKEY.—H. Block & Co. Cincinnati, Ohio.
113.—BURNING FLUID.—George M. Danforth, New York city.
114.—HONOLULU ORANGE BITTERS.—Robert Des Auges, New York city.
115 and 116.—FERTILIZER.—Dugdale & Girvin, Baltimore, Md. Two patents.
117.—LEAD PENCILS.—Eberhard Faber, New York city.
118.—FURNISHING GOODS.—Fisk, Clark & Flagg, New York city.
119.—LIQUORS.—Charles H. Ross & Co., Baltimore, Md.
120.—MEDICAL COMPOUND.—Samuel S. Seely, Bath, N. Y.
121.—BURNING FLUID.—Philip Weisenberger, Pittsburgh, Pa.

Advertisements.

The value of the SCIENTIFIC AMERICAN as an advertising medium cannot be over-estimated. Its circulation is ten times greater than that of any similar journal now published. It goes to all the States and Territories, and is read in all the principal libraries and reading-rooms of the world.

RATES OF ADVERTISING.
Back Page - - - - 1'00 a line,
Inside Page - - - - 75 cents a line,
for each insertion.

Scientific American
For 1871.
TWENTY-SIXTH YEAR.

This splendid weekly, greatly enlarged and improved, is one of the most useful and interesting journals ever published. Every number is beautifully printed on fine paper, and elegantly illustrated with original engravings, representing
New Inventions; Novelties in Mechanics, Manufactures, Chemistry, Photography, Architecture, Agriculture, Engineering, Science and Art.

SCIENTIFIC AMERICAN
OF GREAT VALUE AND INTEREST.
Its practical suggestions will save hundreds of dollars to every Household, Workshop, and Factory in the land, besides affording a Continuous Source of Valuable Instruction.

PATENTS.
The best way to obtain an answer to the question—Can I obtain a Patent? is to write to Munn & Co., 37 Park Row, N. Y., who have had over Twenty-five Years Experience in the business.

IMPROVEMENTS IN
Kilns for Burning Earthen Ware.
ROYAL SAXON LETTER PATENT
awarded to BENNO SCHNEIDER, Master-mason, Berlin, Potsdammer street, No. 128.

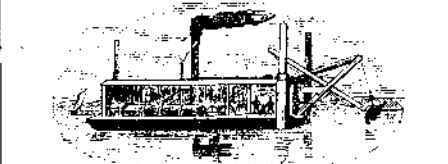
INTERNATIONAL FINANCIAL AGENCIES.
(Successors to C. H. FRENCH & Co.)
NEW YORK AND LONDON.
PATENTS, Coal and Iron Properties, Foundries, etc., sold on Commission. Capital procured for manufacturing purposes.

MAYERS' PATENT GIG SAW, manufactured and sold by FIRST & PRYBIL, 452 10th ave., New York city, will do any kind of scroll sawing. Send for price list, and more particulars.

To Furniture Manufacturers.

THE KNAPP DOVETAILING MACHINE CO. have just completed their Automatic Dovetailer, which is sold to BEAL & HOOPER, of Boston. It will complete from 200 to 300 drawers per day.

BENT, GOODNOW & CO., Boston, Mass., Publishers of "PATENT STAR," sell Patent Rights and goods of all kinds. Orders solicited. AGENTS WANTED.

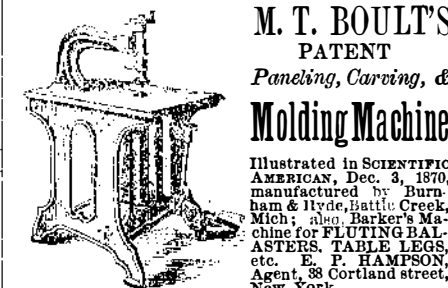


TO CONTRACTORS.—Superior Steam Dredges, Steam Hoisting Derricks, Upland Excavators, Stationary and Marine Engines, and all kinds of Machinery, made to order, by the FOUNDRY MANUFACTURING CO., Lockport, N. Y.

AMERICAN JOURNAL OF Science and Arts.
A THIRD SERIES IN MONTHLY numbers, making two volumes a year of about 600 pages each, commencing January, 1871. Subscription price \$3.00 a year, or 50 cents a number.

LAMB KNITTING MACHINE

THE ONLY FAMILY KNITTER MADE that fills the bill. Send for circulars and samples to LAMB KNITTING MACHINE MANUFACTURING CO., Chicopee Falls, Mass.



M. T. BOULT'S PATENT
Paneling, Carving, & Molding Machine
Illustrated in SCIENTIFIC AMERICAN, Dec. 3, 1870, manufactured by Burnham & Hyde, Battle Creek, Mich.

CEMENT. THE COPLAY CEMENT CO. will contract for future delivery. A stock always in store to fill orders. JOSIAH J. ALLEN, 4 South Del. ave., Philadelphia, Pa.

BURDON IRON WORKS.—Manufacturers of Pumping Engines for Water Works, High & Low Pressure Engines, Portable Engines and Boilers, of all kinds, Sugar Mills, Screw, Lever, Drop, & Horizontal Presses, Machinery in general. HUBBARD & WHITAKER, 132 Front st., Brooklyn.

THE WORTH OF \$20 FOR \$7.50.—The Christian Union, \$3; Either of Harper's, \$4; Chronological Journal, \$3; Marshall's Washington, \$5; and 'The Doctor,' a Chromo, \$5. The worth of \$20 for only \$7.50. Send to E. WELLS, Publisher, 39 Broadway, N. Y. N. B.—THE SCIENTIFIC with the Pheonological Journal, \$5; or with all the above, \$10.

Union Emery Wheels.
Solid and with Stone Center. UNION STONE CO., Boston, Mass. Branch Office, 98 Liberty st., N. Y. General Agents for the Am. Twist Drill Co.'s Superior Grinder and other Emery Wheel Machinery and Tools. Send for Circular.

FOR SALE.—A Machine for Fluting Cotton Machinery Rolls, in good order, and but little used. Also, two Wheatstone's Telegraphing Instruments, suitable for private telegraphs, in good order. Apply to PROVIDENCE TOOL CO. ARMORY, Providence, R. I.

Patents on Designs.
Citizens and aliens can now secure design patents for three and a half, seven, and fourteen years. The law on this subject is very liberal. Foreigners, designers, and manufacturers, who send goods to this country, may secure patents here upon their new patterns, and thus prevent other makers from selling similar goods in this market.

MUNN & CO., No. 37 Park Row, New York.

SHAW'S COTTON SEED HULLERS.

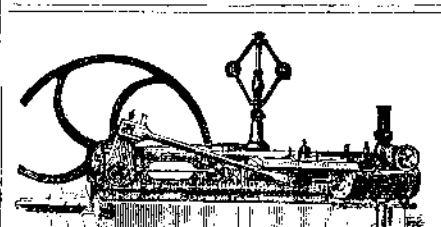
RECEIVED FIRST PREMIUM AT AMERICAN INSTITUTE FAIR 1870. PRICE of Plantation size REDUCED to \$150. DIAMOND BONE, OIL CAKE, AND GRIST MILLS. A complete PORTABLE 2-HORSE ENGINE AND BOILER for \$250.

Caloric Engines. 1-2, 1, 2, AND 4 HORSE POWER. Prices \$350, \$550, \$750, \$950. ROPER'S NEW IMPROVED Upright Engine



FOR HEATING FACTORIES. MANUFACTURED BY PARKER BROS. WEST MERIDEN, CONN.

FOR SALE.—An excellent AUTOMATIC STEAM FORGING HAMMER, takes steam at both ends of cylinder; weight of hammer head six hundred pounds, with swages complete, all in fine order.



Rider Governor Cut-off Engines, Horizontal, Vertical, and Inclined.

Embracing, without complication, all the perfections attained in the most complex Engines, the smallest sizes having all the excellence of the larger ones, a feature not possible in any other construction of high class expansion Engines.

DELAWARE IRON WORKS, Foot West 18th st., New York.



RUSS PATENT MONITOR MOLDING MACHINE, MADE BY R. BALL & CO., Worcester, Mass.

WOOD-WORKING MACHINERY GENERALLY. Specialties, Woodwork Planers and Richardson's Patent Improved Tenon Machines, Nos. 24 and 26 Central, corner Union st., Worcester, Mass. Ware-rooms 42 Cortlandt st., New York.

A. S. & J. Gear & Co., BOSTON.—Your Variety Molding Machine exceeds your recommendations. I consider it one of the greatest labor-saving Machines, for building passenger coaches in existence.

Machinery for Sale. ONE DOUBLE-CYLINDER HOE PRINTING PRESS, size of bed 34 by 50 inches; one eight-horse Steam Engine and Boiler, the latter nearly new; one Donkey Engine, etc., all in good order.

Can be seen at 39 Centre street, Basement.

PARKER Punching Presses



THE Eccentric Ring in the Parker Press, referred to above, is keyed to the shaft and revolves with it, while mine is not fastened to the shaft, and does not revolve with it.

OTIS' SAFETY HOISTING Machinery. OTIS, BROS. & CO. No. 309 BROADWAY, NEW YORK.

\$75 TO \$250 PER MONTH, every-where, male and female, to introduce the GENUINE IMPROVED COMMON SENSE FAMILY SEWING MACHINE. This Machine will stitch, hem, fell, tuck, quilt, cord, braid, and embroider in a most superior manner.

HOWARD THORNDIKE & Co. BELFAST. IMPROVED ADJUSTABLE MITRE MACHINES

PATENT BANDSAW MACHINES of the most improved kinds, of various sizes, to saw bevel as well as square, without inclining the table, by FIRST & PRYBIL, 452-456 Tenth ave., New York. Price, \$250, \$275, \$350, and \$400.

Newspaper Advertising.

A Book of 125 closely printed pages, lately issued, contains a list of the best American Advertising Mediums giving the names, circulations, full particulars concerning the leading Daily and Weekly Political and Family Newspapers, together with all those having large circulations, published in the interest of Religion, Agriculture, Literature, etc., etc.

GEO. P. ROWELL & Co., Publishers, No. 40 Park Row, New York. The Pittsburgh (Pa.) Leader, in its issue of May 29, 1870, says: "The firm of G. P. Rowell & Co., which issues this interesting and valuable book, is the largest and best Advertising Agency in the United States."

Food for Thought.

THE "BEECHERS OF TO-DAY." Who and what they are; with Portraits of Henry Ward Beecher, Catherine E., Mrs. Stowe, Edward, and Thomas K. Beecher, given in January Number PHEENOLOGICAL JOURNAL, New Vol., \$3 a year; 30 cts. a number. News-men have it. The same number also contains: CHEMISTRY: its History, Progress, and Importance. By Prof. Charles A. Joy, of Columbia College. H. B. CLAFIN, the Merchant: His Portrait, Biography, and Character; with an account of his life and success. DREAM LAND: Some very interesting experience in Psychology. Do the living communicate with the departed? A question for scientific investigation. THE IMAGINATION: Its uses in scientific thought and study. PHYSICAL EDUCATION, with Illustrations. Cause and Cure of Dyspepsia; Siberian Vorticity; Effects of Grief; Influence of the Brain; The Source of Crime; Reformatory Measures, etc. FLORIDA, as a Winter Home: Climate, Fruits, etc. THE MORMONS, Ethnologically considered: Who and what they are; Polygamy; The Mormon Faith; The Elders, WHAT CAN WOMAN DO? Pursuits to which she is best adapted; Hugh Hunt as an Essayist. MENTAL: May I Marry my Cousin? Weakening of the Brain; Use and Value of the Hair.