

Powerful Turbines.

A correspondent of the American Odd-Fellow, which, by the way, is a very well conducted and popular magazine, thus describes the turbines used in the Mastodon Mill, in the village of Cohoes, New York.

"The entire number of looms in this mill is fourteen hundred and eighty-six; five hundred of which are located on the first floor." These looms and the other machinery of the mill are driven by three "immense turbine water wheels, made by the Ames Manufacturing Company, which operate the main shaft, and possess an aggregate driving capacity of over eleven hundred horse power.

A Balloon View of a London Fog.

A London paper says:—"On Wednesday afternoon, when London and the suburbs were enveloped in a dense fog, Mr. Coxwell made a balloon ascent from the Hornsey Gas Works. The ascent took place at 2:40, when the atmosphere was clear. Soon after three o'clock the fog extended exactly in the direction the balloon was traveling, and presented a strongly defined line of vapor stretching for miles in an easterly direction.

A PEANUT picker was among the new labor-saving machines exhibited at the Virginia State Fair. Hitherto the nuts have been picked off the vines by hand; four bushels a day being the fair average for a hand. A farmer who raised 1,000 bushels required ten hands for nearly two months to save his crop, at a cost of fifteen cents per bushel.

A RAZOR INDEED!—Mr. J. W. Churchill, of Willkesbarre, Pa., thinks people hone and strop razors too much. He has used one for two years without either honing or stropping it, and it still cuts his beard well, though latterly it begins to pull—a little.

CLOTHES WRINGERS.—These indispensable household articles are becoming more generally introduced than almost any other labor-saving machinery. It is but a few years since the first patent was taken out on a clothes wringer and now there are but few families that do not use them.

WATER WHEEL EXPERIMENTS.—We have the promise of a report of the recent trial of water wheels at Lowell, Mass., for publication in our next number.

Answers to Correspondents.

- L. B. F., of N. Y.—The power to direct safeguards in the use of steam boilers, and to provide for the inspection of stationary steam boilers is vested in the local boards of health by the Statutes of New York. These boards are, we believe, appointed by supervisors, unless the boards are organized under a special commission like the Metropolitan Board of Health, and have power to enforce their requirements.

- J. R., of Iowa.—The protoxide of chromium is a compound of 26 parts of the metal chromium and 8 of oxygen.
- C. C., of O.—The best food for fishes, in a fresh water aquarium is dried beef cut up very finely.
- G. B., of Me.—We have had no personal experience in the lumber trade, and cannot answer the point of your inquiry.

Business and Personal.

The Charge for Insertion under this head is One Dollar a Line. If the Notices exceed Four Lines, One Dollar and a Half per line will be charged.

To ascertain where there will be a demand for new machinery or manufacturers' supplies read Boston Commercial Bulletin's manufacturing news of the United States. Terms \$1.00 a year.

Wanted—Brick-making machine circulars. Box 6001, N. Y. In actual use—"Broughton's" Oil Cups and Lubricators have proved to be superior to any. Address, for circulars, H. Moore, 41 Center st., New York.

Peck's patent drop press. Milo Peck & Co., New Haven, Ct. Back Nos., Vols., and Sets of Scientific American for sale. Address Theo. Tusch, No. 37 Park Row, New York.

Mineral Collections—50 selected specimens, including gold and silver ores, \$15. Orders executed on receipt of the amount. L. & J. Feuchtwanger, Chemists, 55 Cedar st., New York.

The Babcock & Wilcox Steam Engine received the First Premium for the Most Perfect Automatic Expansion Valve Gear, at the late Exhibition of the American Institute. Babcock, Wilcox & Co., 44 Cortland st., New York.

For best quality Gray Iron Small Castings, plain and fancy Apply to the Whitneyville Foundry, near New Haven, Conn.

Keuffel & Esser, 71 Nassau st., N. Y., the best place to get 1st-class Drawing Materials, Swiss Instruments, and Rubber Triangles and Curves

Foot Lathes—E. P. Ryder's improved—220 Center st., N. Y. Those wanting latest improved Hub and Spoke Machinery, address Kettnering, Strong & Lauster, Defiance, Ohio.

For tinmans' tools, presses, etc., apply to Mays & Bliss, Brooklyn, N. Y.

Mill-stone dressing diamond machine, simple, effective, durable. Also, Glazier's diamonds. John Dickinson, 64 Nassau st., New York.

Send for a circular on the uses of Soluble Glass, or Silicates of Soda and Potash. Manufactured by L. & J. W. Feuchtwanger, Chemists and Drug Importers, 55 Cedar st., New York.

Glynn's Anti-Incrustator for Steam Boiler—The only reliable preventative. No foaming and does not attack metals of boiler. Liberal terms to Agents. C. D. Fredricks, 557 Broadway, New York.

Cold Rolled—Shafting, piston rods, pump rods, Collins patent double compression couplings, manufactured by Jones & Laughlins, Pittsburgh, Pa.

For solid wrought-iron beams, etc., see advertisement. Address Union Iron Mills, Pittsburgh, Pa., for lithograph, etc.

Machinists, boiler makers, tanners, and workers of sheet metals read advertisement of the Parker Power Presses.

Diamond carbon, formed into wedge or other shapes for pointing and edging tools or cutters for drilling and working stone, etc. Send stamp for circular. John Dickinson, 64 Nassau st., New York.

The paper that meets the eye of manufacturers throughout the United States—Boston Bulletin, \$4.00 a year. Advertisements 17c a line.

Winans' boiler powder, 11 Wall st., N. Y., removes Incrustations without injury or foaming; 12 years in use. Beware of Imitations.



ILLUSTRATIONS.

Table listing various illustrations such as A-report, R. Porter's, Air-siphon, Mariott's, Awning, Miller and McClellan's, Band saw, safety, Plass', Battery gun, Gatling's, Blasting charge, Werlich's, Blind style borer and mortiser, Blowpipe, useful, Boiler safety apparatus, Lynde's, Bone mill, the diamond, Boot-jack, Seymour's, Brace bit holder, Winkelhouse's, Brazing lamp, useful, Brick kiln, Wacker's, Bierg's, Brick machine, steam, Wiman's, Bridge at Copenhagen, Bridle bit, Kockwell's, Bucket, Fenimore's, Bugry top, St. Huger's, Building, fire and rat proof, Caissons for pier building, Calculating machine, Belfelt's, Can opener, Bleakley's, Canal of Isabella, in Spain, Candle holder, etc., Ault's, Car brake, Walker's, Car heater and ventilator, Himrods', Car truck, Morris & Franklin's, Car truck, Wilson's, Carbon tool points, Dickinson's, Casting apparatus for metals, etc., Church of Good Shepherds, Hartford, Conn., Coal scuttle, Ellithorp & Sloan's, Concrete buildings, constructing, Cork extractor, Morton's, Cork extractor, Wilson's, Corn sheller, Smith's, Cottage with, Gothic, Cross-head Lubricator, Congdon's

Table listing various illustrations such as Keyhole guard, Huffnagle's, Knife guard, Goodes', Knife sharpener, Howland's, Knitting machine, Hinkley's, Laboratory pump, the Bunsen, Lamp extinguisher, Lamp filler, Staple's, Leveling instrument, Sibley's, Life-saving apparatus, Locomotive for Pacific Railroad, Loom, positive motion, Lyall's, Low water detector, etc., Magic diamond, the, Microscope, Logan's, Mill bushes, Custer's, Millstone dressing guide, Dickinson's, Molding machine, McKinley & Mellor's, Nugget, Welcome Stranger, Nursing table, Larkin's, Peach tree insect, Pendulum, a simple, Pendulum rod, Mason's, Photograph printing apparatus, Richard's, Picket-pointing machine, Pile driver, Shaw's, Pipe tongs, Crain's, Plow, Mann's, Portrait of Hon. S. S. Fisher, Portrait of Hon. A. Roebuck, Press, cotton and hay, Chapman's, Protestant church, proposed Spanish, Pumping apparatus, ship, Roff's, Rail splice and chair, Adams', Railroad, portable, Peteler's, Railroad switch, Douglas's, Railway viaduct, Lausanne, Railway bridge, the Seine, Railway, Harrison's, Railway, permanent, Wilson's, Railway station, St. Pancras, Railway water supplier, Harrison's, Rear horse, the insect, Rock drill, Bank's, Rotary grate, Byard's, Royal Albert Hall of Arts, etc., Sad iron heater, Kennedy's, Saw hangings and saws, Andrews', Screw piles, sinking, Seeger, Tunstall's, Shafting hanger, Gallatin's, Shelving, W. & G. Koch's, Shingle machine, Chase & Morton's, Siding hook, Sharp's, Solar eclipse, the great, Spectacle and eye-glass frames, Spirit level and inclinometer, Davis', State Capitol of Illinois, Stone cutter, Benson's, Steam boiler, the Gardner, Steam engine, self-propelled, Stamp puller, Robertson's, Tanning apparatus, Kauffelt's, Tea-kettle breast, Dixon's, Telegraph sounding instrument, Davis', Telegraph station and lightship, Telegraph insulator, Simond's, Tent roof-garden chair, Time register, Courvoisier's, Tire tightener, Pearson's, Truck plow, McKelison's, Turbine water wheel, Newland's, Turbine water wheel, Boland's, Turkish hookah

Table listing various illustrations such as Air in illuminating gas, Air—its weight discovered, Air kept pure in sick room, Air, what is found in, Alarm bell for locomotives, Albertype, the, Alloys and low temperatures, America discovered by the Chinese, American Architects' Institute, American bunting, American carpets, American Civil Engineers' Society, American commerce, depression in, American Engineering in China, American Institute Exhibition 187, 202(2), 217, 233, 249, 265, 281, 298, American Institute Fair, incident at, American Institute, highest prize, American inventors—celebrated, American inventors in Europe, American locomotive boilers, American locomotive, the first, American machine twist, American machinery exhibited, American mowers and reapers, American Science Association, American silk, American silks exhibited, American wine production, American woolen goods exhibited, Ammonia in the arts, Ammonia powder, Ammoniacal gas-engines, Animal fiber separated from vegetable, Animals—do they think, Announcement for 1870, Answers to correspondents, Aerial voyage to New York, Aero-steam generators, Aerasis on Humboldt, Agricultural improvements, Agriculture steam, Air kept pure in sick room, Air, what is found in, Alarm bell for locomotives, Alloys and low temperatures, America discovered by the Chinese, American Architects' Institute, American bunting, American carpets, American Civil Engineers' Society, American commerce, depression in, American Engineering in China, American Institute Exhibition 187, 202(2), 217, 233, 249, 265, 281, 298, American Institute Fair, incident at, American Institute, highest prize, American inventors—celebrated, American inventors in Europe, American locomotive boilers, American locomotive, the first, American machine twist, American machinery exhibited, American mowers and reapers, American Science Association, American silk, American silks exhibited, American wine production, American woolen goods exhibited, Ammonia in the arts, Ammonia powder, Ammoniacal gas-engines, Animal fiber separated from vegetable, Animals—do they think, Announcement for 1870, Answers to correspondents, Aerial voyage to New York, Aero-steam generators, Aerasis on Humboldt, Agricultural improvements, Agriculture steam

