



Reported expressly for the Scientific American, from the Patent Office Records.

LIST OF PATENT CLAIMS
Issued from the United States Patent Office.
FOR THE WEEK ENDING NOVEMBER 5, 1850.

To Alanson Cary, of Worcester, Mass., for improvement in machines for dressing irregular forms.

I claim the toothed wheel upon the shaft, arranged so that it is capable of being thrown in gear with either of the racks, in combination with the dog on the slide, and the notched projection on the table, by which the slide is locked to, or unlocked from, the table, for the purpose of enabling the wheel to give either a rectangular motion to the slide or a circular motion to the table, as may be required, in the manner and for the purposes substantially as herein set forth.

[This machine is one of the most beautiful and effective in operation that we ever saw; it is not for concentric turning, like Blanchard's, or other lathe machines. It is beautifully adapted for making ivory and other knife handles.]

To Wm. H. Davis, of Maysville, Ky., for improvement in Rotary Pumps.

I claim the two pistons acting alternately with each other as rotary partitions, in connection with the arms and apparatus by which they are worked, substantially as above set forth.

To F. P. Dimpfel, of Philadelphia, Pa., for improvement in Furnaces for Steam Boilers.

I claim the method, substantially as described, of making the box lining of furnaces with a partition or division plate or plates between the inner lining and outer shell, to direct the current or currents of air before entering the fire, substantially for the purpose and in the manner specified.

I also claim the manner of arranging the furnace door with its interior plate or lining, in combination with the tube or apertures for blowing or forcing in air, steam or other cooling medium between the door and said plate, all as herein specified, irrespective of form, and also of the manner of producing the forced current of the cooling medium.

To R. A. Fisher, of Sanburg, Pa., for improvement in Washing Machines.

I claim the arrangement of three vertical presses or washers, in combination with the fan arranged and operated in the manner and for the purposes set forth.

To Junius & Alfred Judson, of Rochester, N. Y., (assignors to Junius Judson,) for improved Valves for Governors.

To A. S. Macomber, of Bennington, Vt., for improvement in Straw Cutters.

I claim the application and use of rotary spiral cutters, which are self-feeding, in combination with a stationary knife, or cutting edge, in the manner and for the purpose, substantially as described.

[See engraving, page 396, Vol. 5, Sci. Am.]

To Wm. McCoy, of Fannellsburgh, Pa., for improvement in Lime Kilns.

I claim, first, the construction of an upper tier or tiers of arches, in the manner herein set forth.

Second, I claim the recesses or openings in combination with an upper tier or tiers of arches, for the purpose of creating a draft through the structure after the lower arches have become stopped up.

To Joseph Pine, of New York, N. Y., (assignor to Benj. Pine,) for improvement in the running gear of carriages.

I claim the axles of the wheels having racks on their inner ends meshing into central cog wheels, the front one of which meshes into a segmental rack on the inner end of the pole of the carriage; the whole being constructed, arranged and operating in the manner substantially as described.

[See engraving, page 236, Vol. 4, Sci. Am.]

To Wanton Rouse, of Taunton, Mass., for improvement in operating the copping rail of cop spinners.

I claim changing the direction in which the ring rail is moved and the speed at which it is operated, for the purpose of governing the winding of the thread on the cop, and forming a bind thread by means of the combination of the shaft, having a toothed wheel and a smaller wheel fast upon its axis, with the shaft having on it, also, a fast toothed wheel and a loose smaller wheel or pinion, operated by shifting belts and pulleys or other similar changing or reversing gear.

[This is a good invention.]

To C. W. Schindler, of New York, N. Y., for improvement in hardening fats and oils.

I claim the hardening of fatty or oily substances, without separating the stearine from the oleine to such a degree that they can withstand a heat of at least 135 degrees Fah. without melting; using for that purpose the ingredients of cera japonica and elemi, in the manner and proportions above described, which will produce the intended effect.

To H. S. Vrooman, of Springfield, Mass., for improvement in clamps for girding emery wheels.

I claim the combination of the screws and toggle joint, with the jaws, substantially as herein described and set forth, for the purpose of producing, first, tension of the girding substance, and then the compound motion of the jaws in closing together and setting down to the object on which the machine rests.

To E. J. Warner, of Waterbury, Conn., for improved mode of fastening hooks and eyes upon caps.

I claim the putting on of the hooks and eyes in such a manner, upon paper perforated as herein described, that the points of the hooks are upon one side of the sheet and the eyes upon the other side, thereby securing the eyes against dropping off from the hooks. I claim nothing in regard to the manner of perforating or folding the paper, nor for any other method of putting hooks and eyes upon perforated paper than the method herein described.

To S. R. Wilmot, of Lafayette, Ind., for improvement in Fly Brushes.

I claim so constructing and adapting the revolving fan or brush, that it may be placed like a lamp upon a table, or may be fixed to the walls or ceiling of a room, or that it may be suspended by a cord over a bed, sofa or cradle, by the means herein fully described.

To John Butcher, of Lowell, Mass., for improvement in apparatus for stretching and smoothing cloth.

I claim the combination of the revolving platform, or table, and the guide roller or apparatus, with the series of stretching rollers, the whole being constructed in the manner and for the purpose as herein specified.

To J. P. Hayes, of Boston, Mass., for improvement in Portable Furnaces.

I claim a summer furnace in which the draft is driven to the fire chamber from the interior of the furnace and the bottom of the same, and passes first up through a flue chamber, (formed between a partition and the periphery of the furnace,) and then down through the fuel, all as herein set forth and for the purpose specified.

To George Starkweather, of Hartford, Conn., for improvement in processes for curing meat.

I claim the method of curing meat by placing it with brine within a vessel and then subjecting it to the combined action of agitation and alternate increase and diminution of atmospheric pressure, substantially as herein set forth.

The Manufacture of brandy is now successfully carried on by John A. Scott, Esq., of Washington County, Miss. It is made from the Scuppernon grape, and is pronounced as good and pure an article as the best French brandy.

The Paris Academy of Sciences has lately given its sanction to a project for the establishment of a system of telegraphic communication throughout Paris.

The Cincinnati Price Current publishes a statement of the number of hogs assessed in 76 counties, which show a deficiency of 246,000 head, compared with last year.

The population of Savannah as determined by the census is about 16,000, being an increase of 2,000 within the last two years. This increase nearly is all of white persons.

Telegraph Patents—Morse's, Bain's, and House's Claims.

Since the decision of Judge Woodbury, in Boston, as published by us in No. 7, two weeks ago, we have seen a great number of paragraphs going the rounds, relative to the claims of Prof. Morse. Some have jumbled the case as if it were a trial of the Bain Telegraph. In relation to this, the Baltimore Sun says:—"There has yet been no such issue tried as Morse against Bain, or against any line working under the garb of Bain's patent, either at Boston or at any other place in the United States, to our knowledge. Nor has there yet been any Telegraph case tried which involves the points of infringement of Morse's patents that are alleged to be involved in the case of the Bain lines."

The foundation of Judge Woodbury's decision seems to have been that printing and writing are two different arts.

In his opinion, accompanying the decision, Judge Woodbury gives to Professor Morse, as the inventor, the exclusive right to use the signs for telegraphing, composed of dots, lines and spaces; the right to record at a distance by means of these with electricity, and the local circuit."

The Philadelphia Ledger commenting on the above, says, "Judge Woodbury's decision says, in plain English, as we understand it, that as House uses the letters of the alphabet for recording intelligence at a distance, he does not therefore violate Professor Morse's patent, who does the same thing by an alphabet composed of dots and lines. The right to thus record by means of electricity and the local circuit, is conceded to Prof. Morse. Admitting the correctness of this decision, there seems to be little ground for Bain to rest his pretensions, using, as he does, all the means which Judge Woodbury concedes to be covered by Professor Morse's patent. As to Morse and Bain, however, suit has been brought in the United States District Court for this district, which will probably be heard by Judge Kane in April next. The suit heard by Judge Woodbury, of Smith against House, will be taken to the Supreme Court in banc, where the whole issue will be reviewed; and if that tribunal should think with Judge Woodbury that the shape of the sign conveying intelligence of a fact, whether a dot and a dash or a letter of the alphabet, constitutes a substantial difference, it will probably be an end of that case. But is there in common sense any substantial difference? Is one a system of writing and the other of printing? Both write but in different tokens. Neither print, for neither multiply copies, which is the essential element of printing."

Without any other consideration but a desire to arrive at the truth, we would ask what is Morse's invention, what is Bain's, what is House's? The public has been so bothered, with one party claiming this, and another that, which belongs to neither, that there are but few who know any thing about any of their claims in essence. By the above comments of the Ledger any person would infer that the difference between Morse's telegraph and House's consisted in this, viz., the one recorded its messages in stenographic characters, the other in Roman letters. If this had been the sole difference, then Mr. House could not have received a patent in 1846; for a printing telegraph was in use before. The "Ledger" says that neither of the telegraphs print, for "neither multiply copies, which is the essential element of printing." We would respectfully correct the "Ledger;" Bain's telegraph does print, if multiplying copies is the essential element of printing, for it can multiply a thousand copies without touching a finger key—no other telegraph does this.

The following is Morse's telegraph claim, to be found in the Patent Office Report for 1846, claim No. 79 of Re-issues—"I claim the system of signs, consisting of dots and lines, substantially as herein set forth and illustrated, in combination with the telegraph for recording signals." This is very plain; if Bain uses a different combination of like characters, then it is surely no infringement, for neither of these gentlemen invented the dot and dash alphabet.

In 1837 Morse used a very clumsy alphabet,—it was a system of V W. If any person will look at Silliman's Journal, Oct., 1837; Franklin Journal, Sept., same year, and Alfred Vail's work, page 75, he will see this alphabet. At that time Steinheil used a dot and curious dash alphabet, but he used a whole alphabet of dots; it is illustrated on page 179 of A. Vail's work, and illustrated in M. L'Abbe Moigno's new French work. "Honor to whom honor is due."

Our idea of the essential element of Morse's telegraph is the Electro Magnet, to make marks of dots, dashes, and spaces, by mechanical action, the pen being lifted up, brought down, and held on to the paper at regular intervals, by breaking and closing the circuit. It is no doubt a beautiful telegraph—it has no superior. Bain's telegraph does not use a magnet nor make mechanical marks; the pen is not lifted from the paper at all, but the signs are recorded by the chemical action of the current, not its mechanical; the two systems, then, are entirely different, for the chemical telegraph pen is never lifted off the paper, the same as the electro magnet pen.

Royal E. House's claims are to be found in the Patent Office Report for 1846; he has seven claims, too long for us to publish, but there is no claim for the use of the Roman alphabet, and it is our opinion that Judge Woodbury was not quite minute and clear in respect to his remarks about the signs used in telegraphing, as mentioned in the paragraph above.

The Iron Trade of England before the Discovery of Coal.

In Henry the VIIth's reign the export of iron from England was very small. Biscay, then as now, the most flourishing part of Spain, was the great iron country of those days. Considerable quantities of Biscayan iron were imported into Liverpool. The quality of the Spanish iron was much superior to that of the English. Camden, speaking of the iron made in the great forest of Andradswald, in Sussex (then the greatest iron district in England) says that it was less tenacious than the Spanish iron, either from nature or want of skill in the manufacture. The forest of Dean was the second iron district in England in extent; and the manufacture was carried on in many parts of the kingdom, amongst others at Bury, and at Furness, in Lancashire. It ceased about Bury in the reign of Henry the Eighth, from want of wood for the furnaces. It was also suspended in the rich mineral district of Furness, in the reign of Queen Elizabeth, for the same reason. There the farm-tenants agreed to pay a bloomery rent to the lord of the soil, on condition that the furnaces should be blown out, and that the young trees, used in the iron manufacture, should be kept to feed their cattle in the winter months. So general was the alarm caused by the wasting of the woods in the manufacture of iron, that an act was passed in the first year of Queen Elizabeth's reign, declaring that no timber, a foot square at the root, should be cut anywhere within fourteen miles of the sea, or of the rivers Thames, Severn, Wye, Humber, Dee, Tyne, Tees, Trent, or any other river, to be used in making iron, except in Sussex and in the weald of Kent, where the forests were then considered inexhaustible. A further act was also passed in the same reign, in the year 1591, declaring that no iron works should be formed any where within twenty-two miles of London. The following are the places at which iron was produced during the reign of the Tudors:—The Weald, or Wild of Sussex and Kent: the forest of Dean, in Gloucestershire; Bury and Furness, in Lancashire; Bloomfield and Raubon, in North Wales; Walsall, in Staffordshire; and Lantrissant, in South Wales.

The annual amount of travel on the Mississippi river is about 500,000. The annual loss of human life for several years past has been over 200; by burning, blowing up, and drowning, to say nothing of sickness.

M. Poitevin lately made a balloon ascent from Paris, with some girls dressed like angels. When they got up to the cold clouds the ladies changed their dresses; all went off safe.