

MACHINE FOR MAKING DRAIN TILES.

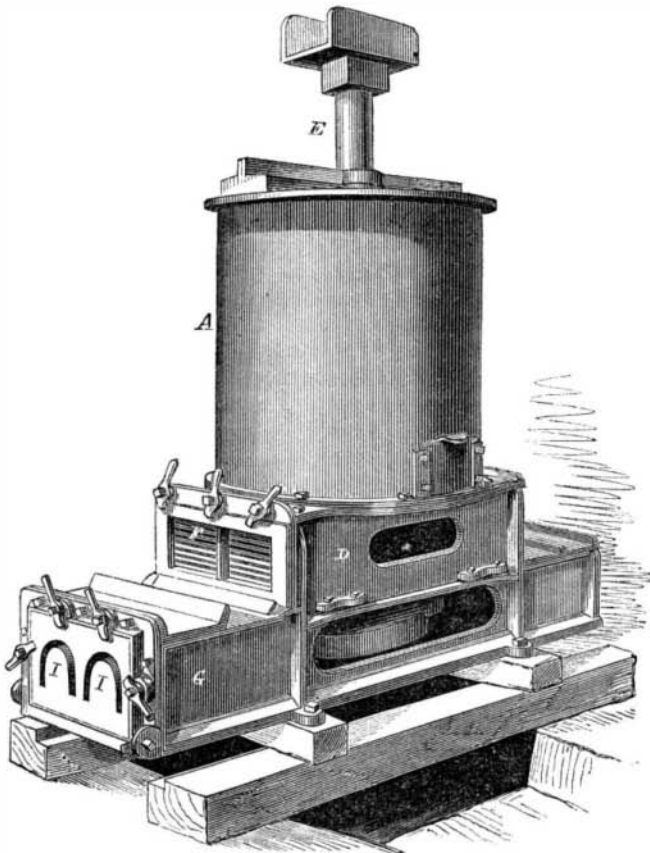
The great extension of underground draining is creating an enormous demand for drain tiles, and the demand, as usual, is calling forth improved modes of production. The annexed engraving illustrates a tile-making machine, of which we give the inventor's description and statement of advantages in his own words.

This machine performs the whole labor of grinding the clay and screening it to free it from gravel, and presses it into tile at the same operation; it being propelled by water, horse or steam power. The clay is supplied to the mill, A, and when ground by the power applied at the tip of the shaft, E, it passes to the box, D, and is pressed by a reciprocating plunger through the screen, F, is then dropped into the finishing box, G, and is pressed again through dies, I, on the carriages ready to be placed on drying boards. This machine makes all sizes and shapes from one and a half to twelve inches in diameter, and will make 1,200 2-inch tiles per hour. The machine is made of iron, and is very substantial and durable. All the working parts being visible and accessible, it is easy to change the dies; also to remove any foreign substance which may occur in the material.

This machine is the invention of Caleb Winegar and Samuel M. Smith, of Union Springs, Cayuga county, N. Y., and is now owned by C. Winegar and A. Latourette, of Seneca county, N. Y. All orders for information pertaining to the business, addressed to A. Latourette, Waterloo, Seneca county, N. Y., will meet with prompt attention.

IMPROVED BUCKLE FOR TRACES.

The accompanying cuts illustrate an improved buckle for traces designed for highly ornamented plated harness.



MACHINE FOR MAKING DRAIN TILES.

halves of the plate, C, and are thus firmly held in place when the two halves of the plate, C, are brought together and fastened to the hook by the pin, d. The length of the trace is adjusted by opening apart the pieces of the plate, C, as shown in Fig. 2, and placing the plate, e, at any part of the plate, C, and then bringing the halves of the plate, C, together and fastening them in the manner described. It will be seen that this mode of adjusting the length of the trace is superior to the old plan in this respect; by the old method of slipping the trace a greater or less length through the buckle, a long, loose, flapping end was permitted to extend beyond the buckle, giving an air of a want of snugness and finish to the whole harness, while, by this improved buckle, no such loose end is seen; but, on the contrary, the trace terminates with the harness, and, in place of the limber end flapping about the horse's shoulder, there is a long metallic plate, which may be either gilded or plated with silver, and thus made the most ornamental and elegant part of the harness.

The patent for this invention was granted May 23, 1859, to Adolph Roesler, of Warsaw, Ill., who may be addressed for further information in relation to it, or Bernard E. Myers, 335 Broadway, in this city.

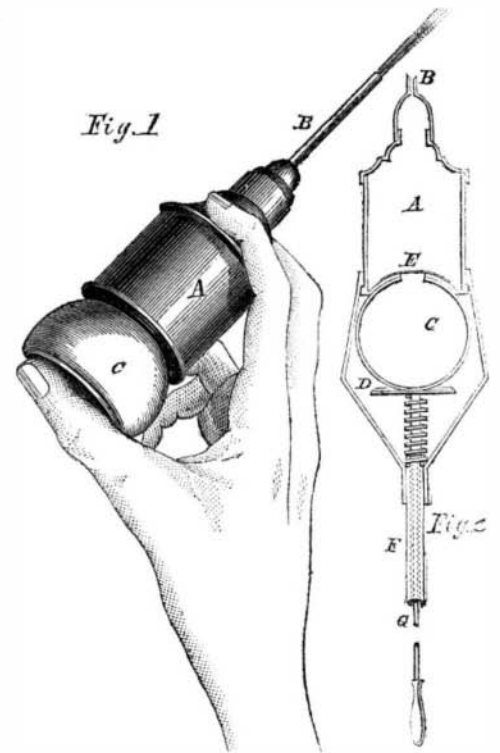
HOLLOW WALLS OF BUILDINGS.

It always affords us pleasure to witness useful ideas acting like wedges in splitting rocky prejudices, and opening up avenues for improvement and reform. This appears to have been the case produced upon our daily press, in reference to the above subject. The New York Times, of the 14th inst., contains a very useful article on this topic, in which hollow walls are advocated with zeal and a true sense of their utility. The non-conducting character of the air spaces in such walls is pointed out

IMPROVED INSECT POWDER-BLOWER.

Powder used for the destruction of various insects is found to be most efficacious when injected into the cracks or crevices to which the insects retreat. The annexed cuts represent a simple little instrument for doing this in the easiest and most expeditious manner.

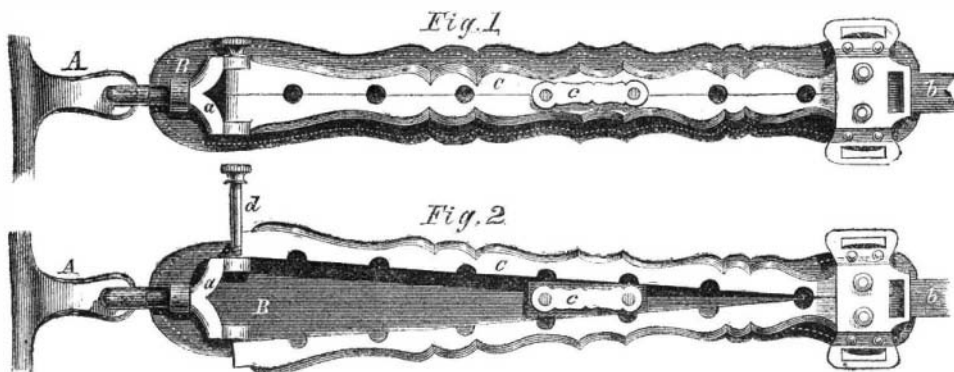
It consists simply of a cylindrical receptacle, A, for the powder, provided with a slender tube, B, at the top, and a round, air-tight india-rubber ball, C, at the bottom. The ball communicates with the receptacle at E, by a hole, which is covered with a fine gauze or cloth sieve to



prevent the powder from passing into the ball. A metallic plate, D, is attached to the bottom of the ball, and, by pressing this plate suddenly, the air is forced through the receptacle and tube, carrying along with it a small portion of the powder, which is thus driven into any crevice to which the tube, B, may be applied. The tube is enlarged at its lower end, and fits tightly over the top of the receptacle, so that it may be removed to supply the latter with powder. For applying the powder to high shelves, the branches of trees, or other places inconvenient of access, the apparatus is attached to the top of a long tube, F, which has a rod, G, passing through it; this rod having a handle for forcing it up, and a spiral spring to return it to its place.

The two patents by which this invention is protected were issued to Peter Reynard and Victor Variu; one on the 20th of September, and the other on the 8th of November, 1859. Inquiries for further information may be addressed to Reynard & Co., 130 Fulton-street, this city.

LEAD COLIC PRODUCED BY CLARET.—L. A. C. Jules, an apothecary, 25 years of age, was admitted to the hospital, Aug. 3, 1859, laboring under the effects of lead poisoning, which he attributed to drinking claret at his boarding-house. He also had some obstruction to the biliary secretion, evidenced by a jaundiced appearance of the skin and conjunctivæ. While outside he had been treated by Dr. Chicarini, of Bleeker-street, who treated him by chloroform, which has lately been tried with success at the New York Hospital by Dr. Griseem. This was continued for a short time only, as the patient was nearly convalescent under his former medical attendant. Rhubarb and blue pill, followed by seidlitz powder were administered for the affection of the liver, under which treatment he got gradually better. On the 6th, some symptoms of suppression of urine appearing, he was ordered the compound fluid extract of Buchu, as prepared by Risley of this city, by the aid of which the unpleasant symptoms soon disappeared, and he left the hospital on the 7th, in a state of convalescence. In this case the blue line at the edge of the gums was very apparent, leaving no doubt on the doctor's mind as to the nature of the case. The wine was tested by the patient himself, and found impregnated.—N. Y. Medical Press.



ROESLER'S IMPROVED BUCKLE FOR TRACES.

A, represents a portion of the harness, to which the hook, a, of the trace is hooked. The hook is firmly fastened to the broad leathershield, B, which has secured at its other end the two halves of the metallic plate, C; these halves of the plate being pivoted at their ends so as to open as shown in Fig. 2; and connecting at the opposite ends with the hook by means of the bolt, d. The trace, b, has the plate, c, secured at its end by means of two pins which fit into the semi-circular recesses in the two

as a good arrangement for keeping the interior of houses dry and warm. On page 371, Vol. II., of the SCIENTIFIC AMERICAN, there is an able communication on this subject, by a practical brick-layer, in which the method of constructing such walls is set forth with great clearness. In this respect, it is more valuable than the article in the Times, and it would be well for builders, and all those intending to erect brick houses to give it that attention which it really deserves.