

# Scientific American.

THE ADVOCATE OF INDUSTRY, AND JOURNAL OF SCIENTIFIC, MECHANICAL AND OTHER IMPROVEMENTS.

VOL. XIII.

NEW YORK, AUGUST 21, 1858.

NO. 50.

## THE SCIENTIFIC AMERICAN,

PUBLISHED WEEKLY

At No. 128 Fulton street, (Sun Buildings), New York,  
BY MUNN & CO.

O. D. MUNN, S. H. WALES, A. E. BEACH.

Responsible Agents may also be found in all the principal cities and towns in the United States.

Sampson Low, Son & Co., the American Booksellers, 47 Ludgate Hill, London, Eng., are the British Agents to receive subscriptions for the SCIENTIFIC AMERICAN.

Single copies of the paper are on sale at the office of publication and at all the periodical stores in this city, Brooklyn and Jersey City.

TERMS—Two Dollars per annum.—One Dollar in advance, and the remainder in six months.

See Prospectus on last page. No Travelling Agents employed.

### Liability of Telegraphic Companies in England.

The Court of Queen's Bench, says the London *Times*, was lately occupied with a case of great importance to the commercial world. In the month of July, 1857, a report reached the head-quarters in London of the South Eastern Railway Company that the Lewes Bank had stopped payment. The cashier of the company adopted the report, and telegraphed to their servants at the various stations on the line that they were to take no more notes or checks on the Lewes Bank. The notice of the alleged stoppage was also posted up at some of the stations, alongside a correct announcement that the Hastings Bank had suspended payment. In consequence of the publication of the false report, there was a run upon the Lewes Bank, in order to meet which the securities had to be realized at an enormous loss. The jury gave a verdict for the plaintiff, with \$10,000 damages. It appeared from the statement of the counsel that if the message of the cashier had not been published at the stations, it might have been looked upon as a privileged communication between the cashier and the subordinate servants of the company.

### Remedy for Sunstroke.

Dr. Dickson, of London, who was formerly a medical officer in the British army, disappears entirely of bleeding in cases of sunstroke, but relies upon ammonia, quinine, and alcoholic stimulants, and the prompt application of cold water to the head. This is upon the principle that opening a vein diminishes the power of the heart, already deficient, while the stimulants being diffusive in their character, at once tend to give vitality to every portion of the system, and restore the circulation to the standard of health. Ammonia is preferable to alcoholic stimulants, as, while it is equally prompt and potent in its action, its application is not attended with the injurious and sometimes fatal re-actionary effects of spirits.

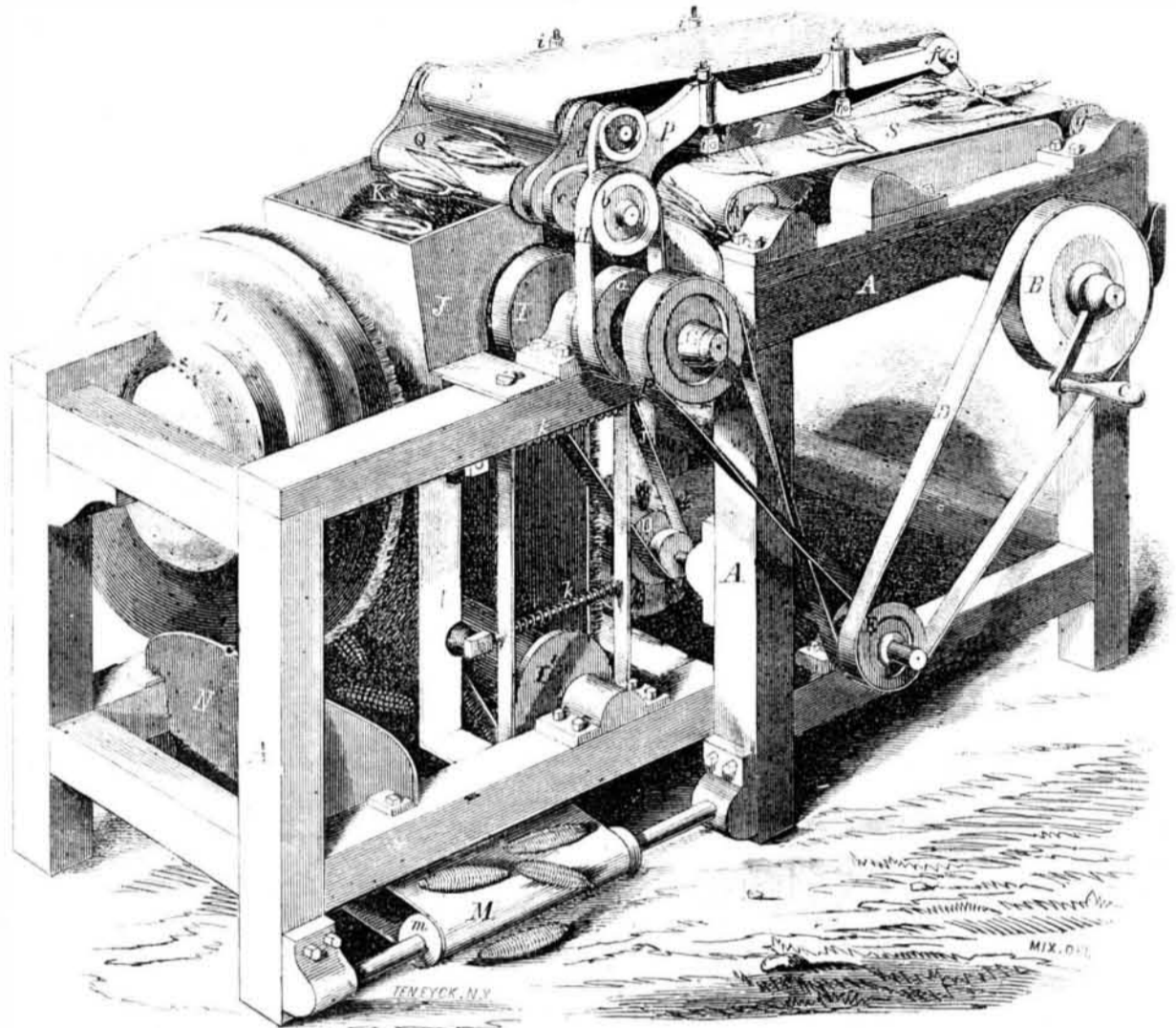
### Kentucky Mechanics' Institute.

The sixth exhibition of this institute will commence at Louisville, Ky., Sept. 14th, and the directors will be ready to receive goods for exhibition on the 7th. As all machinery, &c., is to be in actual operation, persons intending to exhibit are requested to inform Mr. D. Macpherson, Secretary of the Exhibition Committee, as to the amount of space and power they will require.

THE METALLIC OIL advertised in another column is an excellent article for lubricating machinery. It is durable and economical, and having stood the severest tests for some years past, we can cordially recommend it.

We have to thank Commander Thos. Page, of the U. S. steamer *Waterwitch*, for maps of his survey of the river Parana in that ship.

## SMITH'S PATENT CORN HUSKER.



The subject of our illustration is designed to husk corn perfectly without in any way injuring the corn, and the corn being fed to it with any length of stalk will be delivered from the machine perfectly free from husk and stalk. The working parts are mounted in a frame, A, and the power is given to a wheel, B, by the handle, C. D is a belt giving motion to E, from which the belt, F, rotates the wheel, G. On the shaft of G is a drum, I, round which passes the endless husking band, K, being provided with wire teeth, something like a carding belt. This band, K, also passes over small rollers in the frame, I, which can give to pressure and again assume their original position by their bearings being on the ends of spring rods, k; K also passes round another drum, I'. In front of K is a wheel, L, provided with wire teeth, and it is in passing between these two that the husk is torn off. From the drum, I, passes a band wheel, j, rotating a brush, O, which serves to clean the wire teeth upon K; there is also a cleaning brush to L. From a small wheel, a, on the shaft of G, a band wheel, H, passes, rotating a small pulley, b, at the extremity of a frame, P, which extends over the feeding device, and on the axis of b is a drum, around which passes the endless feeding band, Q. From a wheel, c, on the same axis, a band, d, rotates the wheel, e, which gives motion to the upper endless feeding band, R, that also passes around another drum, f; and under rollers whose bearings are so arranged as to keep the band, R, tight and yet give to pressure, by bars and springs, i. Underneath P two saws rotate, one on each side, and between

them Q and R pass. S is another endless band, there being one each side, passing over rollers, k and g.

The operation of this machine is as follows: The corn with stalk attached is placed on the endless bands, Q and S, and they are carried between R and Q until they come in contact with the saws, T, which cut off the butts and stalks; and the motion of the bands over and under the corn while it is momentarily stayed by the saws serves to slightly loosen the husk. The corn is carried on and falls into the hopper, J, which guides it between the endless husking board, K, and the husking wheel, L, from which it drops perfectly husked on to the delivering band, M, on the roller, m. This is operated by a pulley and band on the side of the machine not seen in our engraving, rotated from the axis of E, that passes directly across the machine. N is a guard plate, to ensure the fall of the ears on to M.

This ingenious device is the invention of W. H. Smith, No. 139 Thames st., Newport, R. I., and is the subject of two patents, one dated October 28, 1856, and the other October 6, 1857. The inventor will be happy to give any further information upon being addressed as above.

### The Original Morgan Horse.

The Springfield (Mass.) *Republican*, speaking of the origin of this noble breed of horses, asserts that Massachusetts has done many good things, among which is giving to Vermont the credit, and the world the benefit, of the celebrated Morgan horse. It appears that near the close of the last century a singing

master by the name of Justin Morgan lived in Chicopee street, West Springfield. The place where this man lived has been pointed out to the writer in the *Republican* by one who knew him and remembers his celebrated horse. In the spring of 1793 he raised the colt which has given celebrity to his name; and although a promising one, and fully appreciated by its owner, who was noted for his passion for good horses, it is believed that this horse could have been bought for fifty dollars.

Fortune frowned upon Mr. Morgan; and, seized with the spirit of adventure, about the year 1798 he migrated with his family and horse to the wilds of Randolph, Vt. Here he lived a few years, and died poor. Like the projectors of many valuable inventions, neither he nor his family realized profit from the skill and labor displayed in preserving the stock of this horse, who was the foundation of a breed which has given both wealth and character to New England. In this case is forcibly illustrated the influence of an ordinary action. Justin Morgan might or might not have been conscious of the results, when sixty-five years ago he raised that famous colt. The act was simple in itself, but the consequences are momentous. An impetus was then given to a branch of industry whose power is not yet fully felt. Wherever the horse is known there shall the name of Justin Morgan be repeated. The Morgan horse is destined to give as much celebrity to New England as the barb of the desert to Arabia. As a farm and family horse the "Morgan" is unequalled. Docility, hardihood, endurance, compactness, and sure footedness are his invariable properties.