

Scientific American.

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

Vol. 3.

New York, October 23, 1847.

No. 5.

THE SCIENTIFIC AMERICAN :

PUBLISHED WEEKLY

At 128 Fulton Street, New York (Sun Building,) and
13 Court Street, Boston, Mass.

By Munn & Company.

The Principal Office being at New York.

TERMS—\$3 a year—\$1 in advance, and
the remainder in 6 months.

See Advertisement on last page.

Poetry.

THE HUSBAND TO HIS WIFE.

Long years have past since first we met ;
And though we're somewhat altered now,
Time hath not taught us to regret
Our early love,—our plighted vow !

Our hearts remain the same, dear wife !
Our troth hath stood the test of years !
And midst the varying scenes of life,
Our trusting love unchanged appears !

Like some bright star that, when the night
Hath veiled the glowing orb of day,
Still sheds its mild and steady light
Around the lonely traveller's way.

Our lot hath not been free from care,
(Whose ever was ?) and grief and pain ;
But He, who hears and answers prayer,
Nerved us our burthen to sustain.

If friends were changed—or fortune fled,
Our hearts ne'er felt a wish to roam ;
For Love's pure, undimmed ray was shed
Around its holiest temple—Home ?

And still its cheering beam is cast
On every moment of my life,
Though more than forty years have past,
Since first I blessed thee as my wife !

Hail, wedded Love ! When man was driven
From Eden's bowers of happiness,
It was by God in mercy given,
The wanderer's drooping soul to bless.

Agès have rolled away, and still,
(Whatever heartless worldlings say,)
Undimmed by storms, unchanged ill,
All brightly burns its holy ray !

And oh ! as we have felt its power,
Dear Wife ! throughout the hallowed past,
So may its beam, till life's last hour,
Around our trusting hearts be cast.

HE STOOD AT THE ALTAR.

He stood at the altar,
(Because he'd no chair,)
With Brass rings on his fingers,
And lard on his hair.

He stood at the altar,
With a watch in his fob,
A young whisker and
As straight as a cob.

He stood at the altar,
In humanity's guise—
A pin graced his dickey,
And goggles his eyes.

He stood at the altar,
As shrewd ones have said,
Without cents in his pockets,
Or sense in his head.

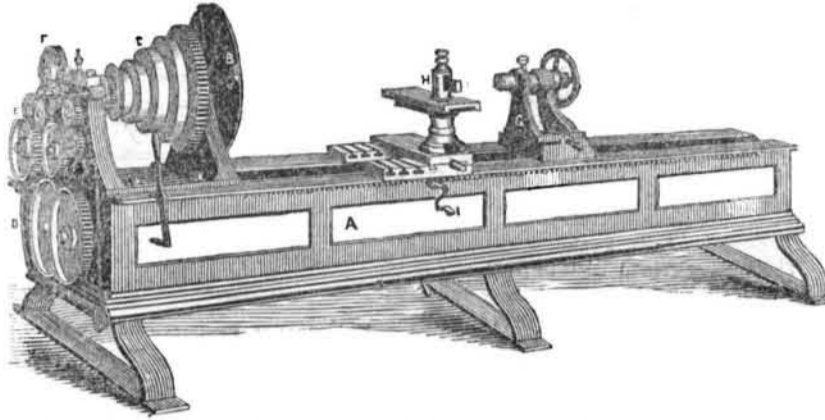
The way they do it.

'Wal, wife,' said a countryman, yesterday,
'I dont see, for my part, how they send let-
ters on them ere wires without tearing 'em all
tew bits.'

'Law me, they don't send the paper, they
just send the writin' in a fluid state.'

'Oh, that's the way, hey ?'

HARTSON'S PATENT LATHE.



Those who saw this valuable machine at the Great Fair, had but one opinion regarding it, and that opinion was its superiority over others. It is not possible to give a full description of its parts by one view, but a single glance at the above perspective engraving will at once convey to the practical machinist some idea of its great worth and some just conception of its important parts.

DESCRIPTION.—A, is the frame. B, is the face plate on the spindle. C, are pulleys, geared to a small cog wheel which connects with F, on the back shaft, which is connected with the back gearing and gears into the spindle wheel, which communicates with E, a wheel on the back driving shaft and drives the screw giving motion to the rest. D, are intermediate wheels co-operating with the nest wheels and E on the driving shaft. H, is the

slide and rest, the slide being marked with accurate degrees for correct mensuration in the turning. I, is a handle to move the slide and rest on the rack. Below is another handle J, attached to the rods for shifting the motion of the wheels. G, is the moving or poppet head, the use of which is so well known.

To this brief description of this machine, we will only add that from the operation of this lathe at the Fair, a number of orders for others have been given and this lathe was sold and could have been sold a dozen times over. The work is substantial, beautiful and correct, and a good article is always a cheap one.—Mr. Hartson's machine shop is at No. 42 Gold street, New York, where Turning Lathes, Drilling and Planing machines are made of a very superior finish and quality.

Harvests Without Previous Sowing.

In the Schnellpost of Wednesday, we find an account of a method of compelling the wheat plains to become perennial, like grass, and to perfect in grains annually without annual growing of seeds which has been successfully practiced at Constance in Germany. It was discovered by the steward of an estate named Kern. His method, after ploughing and manuring the land, and sowing it with Summer or Winter wheat, is to mow it in the Spring before the ear makes its appearance. This process is repeated several times in the season and the product is used as hay. The plant is then allowed to grow and be cut in the ordinary manner. The next year it ripens earlier, and bears more abundantly than wheat treated in the ordinary manner. It is manured in the autumn like grass in the meadows, and in Spring cleared from weeds. In this manner from one field four successive harvests have been gathered.

Brick Back Logs.

Brick back logs to fire places where wood is burned are very useful and economical. The brick takes up the heat slowly and retains it, whereas iron backs take up the heat quick and lose it as rapidly, and besides, become very hot and burn up the wood, thereby producing a loss. Persons who use brick and common flat-irons heated to place to the feet of sick persons, will notice how much sooner iron loses the heat and becomes cold than brick.

The Priest and his Bargain.

The Courier de Lyon relates that a few days since the priest of a town near the Loire while returning from receiving his salary, riding a spirited horse, was stopped by two robbers, who took all his money and exchanged horses not losing by the exchange. On returning home and examining his new steed, he found tied to the saddle a bag containing 2,000 francs, and before he could ascertain the extent of his riches, his horse which had thrown its riders, came running home,

Philosophy of Churning.

The cream, of which butter is made, consists of minute globule, about one-tenthousandth part of an inch in diameter, each surrounded by a very thin transparent pellicle of film, that prevents them from adhering to one another. During the agitation by churning, these little pellicles break, and the fatty portions of the globules unite into a mass, forming butter, whilst the buttermilk is left behind which consists principally of casein, (the basis of cheese), milk sugar and a watery fluid, called serum.

Ether in Mania.

In the licensed lunatic wards of the St. Marylebone Infirmary, Dr. Boyd has tried the inhalation of sulphuric ether in four cases, one chronic and three acute, of violent mania, amongst the females, with excellent effect, and without any unfavorable results. The tranquilizing effect was produced at various intervals of from two to ten minutes—at a time, too, when the patients were unusually violent. All of them appeared to become intoxicated. Before this effect was fully produced, their anger in every instance seemed turned to joy—a soporific effect was the utmost that was produced in any case operated upon.

That Old Tea-Kettle.

Don't throw away that old crackad tea-kettle, I say, said Aunt Patty Parley. It is one of the most useful articles in the pot closet. When you have a cracked tea-kettle, then you have the best thing in the world for cooking potatoes.

Wash them, cut off the end where the eyes are thick, and then put them in the tea-kettle without any water, and hang it over a moderate fire, and in half an hour or so, you will have your potatoes baked, dried and mealy, and just the very thing for a good dinner. The nose of the kettle allows all the moisture of the vegetable to escape, and a cracked tea-kettle is essential to good eating.

RAIL ROAD NEWS.

Disastrous Collision.

About noon on Tuesday last a collision took place on the Western Railway, 5 miles east from Pittsfield, Mass., between one of the trains which left the East Albany depot on that day, and a wood train. The engines driving the two trains, the Albany and Louisiana, were almost demolished. We regret to state that eight men employed in working the trains, were more or less injured, one man so much so that he had to submit to the amputation of one of his legs.

Another Accident.

We learn that as the New Haven train of cars for Boston last Monday evening, had arrived within two miles of Westborough, they came in collision with the down freight train, demolishing one or two of the freight cars and somewhat injuring the engines. The accident was occasioned by the breaking of some portion of the engine attached to the passenger train, the conductor of which sent a man ahead to stop any train which might be coming, but not in time to prevent the collision. No person received any injury.

What is the use of the telegraph, if it cannot be employed to prevent railroad collisions on the railroad. With the telegraph at the command of any railroad company, no collision need ever take place.

Ohio Railroads.

The Sandusky, Ohio, Mirror states that eastern capitalists have just closed an engagement with the Mad River Railroad Company, under which they are to assume the management and control of the road, finish its construction, and put it in order for freight and passenger business through from Cincinnati to Sandusky City, at the opening of next spring's business, or as soon as men and money can do it. The distance of continuous railway will be 218 miles, which can be run in 11 hours. The Mirror also states that fast boats will also be built during the winter, to perform trips between Sandusky and Buffalo in 13 hours, thus connecting Cincinnati, Sandusky and Buffalo by railroad and steamboats, in 24 hours running time.

Railroad Survey.

Captain Henderson and a party of the men engaged in making the survey of the line of railroad to connect Halifax with Quebec have dispersed, one portion having proceeded to Boiestown, another to the head waters of the Richibucto, and a third to the Bend of Petticodiac. The report given of their progress in the counties of Gloucester and Restigouche in New Brunswick, as well as on the Canada side of the Bay de Chaleurs is said to be very satisfactory.

Influence of the Periods of the Day upon Births and Deaths.

Dr. Caspar has arrived at the following conclusions. The greatest number of Births occur between nine o'clock in the evening and six in the morning, whilst the smallest number occur between six o'clock in the morning and nine in the evening. Individually regarded, the ratio of deaths from Inflammations, pthisis, and pulmonary hemorrhage, is greater in the afternoon: from fevers and exanthemata, just before midnight; from cerebral appoplexy, during the day; and from diseases of the nervous system in general, in the hours which immediately follow midnight.

Who are the Happiest Men.

They who live to benefit others—who are always ready with a word to encourage—a smile to cheer—a look to persuade, and a dollar to assist. They are never fearful lest a good trade or an excellent bargain should fall into the hands of a poor neighbor, but the more rejoice when such an one meets with encouragement.