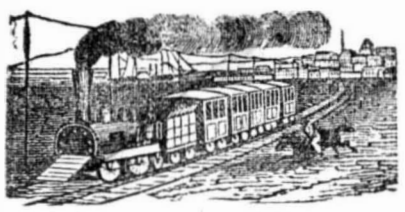

Destructive Fires.

If we spoke in reference to judgments of an appalling nature, we might distinctly point to the devastating fires that have lately scourged several cities of our land. Not long since one sixth of Albany fell a prey to the devouring element, and on Sunday morning last a destructive fire laid over two hundred buildings in the city of Brooklyn in ashes. Lives have been lost at all of these fires and this is the most heart rending circumstance connected with these calamities. One of the most distressing events that ever occurred was the burning of the splendid packet ship Ocean Monarch in the English Channel, the news of which was brought out by the Hibernia. No less than 151 human beings perished, some by the flames, others by falling spars, and others drowned.

Shok oef an Earthquake.

Two shocks of an earthquake were felt in in this city and vicinity, on Friday night last week about half past ten o'clock. The first shock was very slight, lasting nearly a minute It was more of a tremulous motion than a shock. About one minute after, another shock was felt—a short, quick, jerking, undulating motion, accompanied by a rumbling noise, like a heavy vehicle passing rapidly ver the pavement The second or principal shock lasted only five or six seconds. In New Jersey its duration is stated to have been eight or ten seconds. On Long Island, the second shock and the sound appeared to come from the north, passing southward.

We felt the shock with terrible distinctness and had it been 1843, we would have been thinking about Father Miller. We believe however, that the shocks were from the south west, in the great line of the galvanic current. The resistance to the current must have been towards the North East.

Coal and Gold.

From the annual report of the Director of the U. S. Mint, it appears that the value of all the gold coined in the U. S. mints for twenty four years prior to 1847, was $12,741,653, or somewhat exceeding the average sum of half a million a year--a very considerable addition to the stock of American wealth ; but it appears from the returns of the coal trade in Pennsylvania that the value of this commodity brought to market in that State is annually equal to the above large amount :—the last year, for example, the value of her anthracite brought down to tide-water—nearly 3,000,000 tons—was actually equal to the value of all this gold dug up in the South during the whole twenty-four years. From this it appears that our Northern (Maryland as well as Pennsylvania) coal mines are more valuable gold mines than those of the South.

A Mexican Churn.

The Mexicans have a peculiar churn, which may probably suit a certain class of community right well. It puts all others far in the back ground, as it has the merit of delivering the butter fresh at the doors of their customers. It is described thus:

" Two tin cans are enclosed in a green cow hide, the size to correspond to the quantity of milk. The hide on drying will shrink and adhere to the cans. These cans are partly filled with milk, and placed on a hard trotting horse like saddle bags ; a person then mounts the horse and rides seven or eight miles into the city ; the motion of the horse effects the separation of the butter from the milk, and the rider has only to pocket the cash for his butter and buttermilk and wend his way home at his leisure.

So scarce are laborers in Australia, that the waggons in which copper ore is conveyed from the mines to Adelaid, where it is shipped to England, are driven by boys between ten and fifteen years of age.

The Hot Springs of Arkansas.

In the State of Arkansas there are some singular springs to which are ascribed some medical virtues and are a subject of no little wonder. They are in Hot Springs Co., about 30 miles west of Little Rock, on a creek, which empties into the Washita river, 6 miles distant, in latitude 31½. The creek, which rises in the mountains some 4 miles above, winds its way between two hills, running north and south, with a valley between, and which is in some places fifty, and in some one hnndred yards wide. On the side of one of the hills, which is very precipitous, and rises to the height of 100 feet the Hot Springs break out in various positions, from the margin of the creek to the summit of the hill. The number of Springs is said to be about 75 or 80, within a space of 500 yards, but the number is not uniform, new springs breaking and old ones filling up. There are numerous cold water springs within a few yards of the hot ones. The heat of the water is sufficient to scald a hog or fowl, to boil eggs or wash cloths, without the aid of fire.

The creek is so much heated by the springs that horses and cattle will not drink of it for a mile below. The United States claim the Hot Springs as a reservation ; individuals claim them under pre-emption. The consequence is, that only temporary improvements are made, or will be made, until the title is confirmed. These Springs are destined to attract great atttention for their invaluable healing properties, as well as natural curiosity. In the same vicinity is the Magnetic Cove, a large bed of magnetic rock, and the Crystal Mountain, where beautiful crystals of various forms are found. In several of the mountains are found the best quarries of whetstone known in the United States.

Mrs. Fry's Rules.

First, never lose any time ; I do not think that lost which is spent in amusement or recreation, some time every day ; but always be in the habit of being employed. Second, never err the least in truth. Third, never say an ill thing of any person, when I can say a good thing of them : not only to speak charitably, but feel so. Fourth, never be irritable or unkind to any body. Fifth, never indulge in luxuries that are not necessary.—Sixth do all things with consideration, and when my path to act right is more difficult, feel confidence in that power alone which is able to assist me, and exert my own powers as far as they go.

Flowers and the Law of Gravity.

As an instance of the adaptation between the the force of gravity and forces which exist in flowers—some flowers grow with the hollow of their cups upwards ; others " hang the pensive head," and turn the opening downward. The positions in these cases depend upon the length and flexibility of the stalk which supports the flower, or in the case of *euphorbia*, the germen. It is clear that a very slight alteration in the force of gravity, or in the stiffness of the stalk, would entirely alter the position of the flower-cups, and thus make the continuation of the species impossible. We have, therefore, here a little mechanical contrivance, which would have been frustrated if the proper intensity of gravity had not been assumed in the rekoning. An earth, greater or smaller, denser or rarer than the one on which we live, would require a change in the structure and strength of the footstalks of all the little flowers that hang their heads under our hedges. There is something curious in thus considering the whole mass of the earth, from pole to pole, and from circumference to centre, as employed in keeping a snowdrop in the position most suited to the promotion of its vegetable health.

Martin Goldsborough, Esq., of Talbot county, Md. has a farm containing about 240 acres of cleared land, which divided into three fields makes 80 acres each. Having accurately laid off one acre, and measured it, it was found to yield the enormous quantity of fifty odd bushels of wheat—and if the balance should give the same yield, it will be upwards of 4,000 bushels on eighty acres.

In 1847, there were 740 patents granted in England, and the fees amounted to £32,977.

Perpetual Roses.

Many cultivators of this fine new class of roses, " waste its sweetness" by allowing it carry all its blossoms in the month of June. Now to have the perpetual rose fully enjoyed, it should not be allowed to bloom at all in rose season. Roses are so common then that it not at all prized while blooming, from midsummer to November it is highly prized by all persons.

The way to grow it in perfection, is to pinch out, as soon as visible, every blossom bud that appears at the first crop, say from the middle of May to the middle of June. This reserves all the strength of the plant for the after bloom; and accordingly you have large clusters of roses in July, August, September October, and those who have not tried this stopping system can have no idea of, La Rein, Madame Laffay, Compte de Paris, and the Dutchess of Sutherland are particularly superb varieties under this treatment. Indeed, they may be recommended as among the best in the perpetuals.

International Postage.

Mr. Bancroft, the American Minister in England, has written home that there are reasons for believing that an international postage law will be agreed upon shortly,—a universal ocean penny postage we hope ; at present the expence of foreign letters are beautiful taxes upon the people of both nations.

Soda Manufacture.

A new factory to make soda is about to be started at Birmingham near Pittsburg. We are glad to see this. Soda is much used in the manufacture of glass and we are determined to urge the manufacture of Plate Glass at home. We shall describe the process with illustrations in our next volume.

Death of Berzelius.

A letter from Stockholm, Sweden, announces the death. on the 7th of August, of the illustrated chemist Berzelius, aged 69 years.

Berzelius was a great man and his name is familiar to every one who has taken an interest in modern chemistry.

Drinking in the dark.

It is reported there is a young lady residing in Coeymans, county of Albany, N. Y., who eighteen months ago drank with water in the dark, a small snake, since which time her body has grown nearly as large as a barrel, and the physicians attending her say the snake now is about the size of a man's arm. All fudge.

Pictorial National Library.

The publishers, Wm. Simmons & Co., No 12 School st., Boston, have kindly favored us with the September number of the above magazine, which we have perused with much interest. Each number contains 52 pages, is full of original engravings, and published monthly at $2 per annum.

New Project for Reporting.

A corps of Phonographers, reporters and compositors, is about to be organized in Philadelphia, to do the Congressional reporting. The duty of the compositors will be to set up the type directly from the report, and it is said that this is not only feasible but has been often done.

On the evening of the 7th ult. two balloons started at the same moment from the Cremorne Gardens, London, for a race, each containing four persons. The weather being clear and favorable, the sight was very interesting.—Lieut. Gale commanded the "Royal Cremone," and Mr. Gybson the "Royal Albert." The ascent was imposing and magnificent ; they kept so near together that the voyagers could hear each other's voices. They attained an altitude of a mile and a half and descended without accident, near to each other, about sixteen miles from London.

A new spring of iodine has been discovered between Toeltz and Heilbroun (Bavaria); it is supposed to communicate with that of Adelaide.

Ireland pays some $3,500,000 per annum for the support of a church establishment, in which not over 700,000 of her people feel the slightest interest.

TO CORRESPONDENTS.

" J. M. of Pa."—We have forgotten what your question was in regard to the mandril. When you write again please tell us. We are obliged to you for the drawing you sent, and shall probably have them engraved during the volume. You can obtain all the information you desire relative to Parker's Water Wheel, by directing a letter to O. H. Parker Esq., care Sutton & Smith, Philadelphia.

" F. G. of Long Island."—The Prairie Plough made at Chicago, is the invention you have probably heard of. Its cost is about $25 we think, but as to its capabilities we are uninformed.

" S. N. P. of Mo."—There is no question of the practicability of your plan, but there is of its utility. No boat would use it. A slight derangement would prevent its operation, and as every part of an engine should be daily cleaned, the person cleaning it would be likely some day, to set a screw wrong. Of all means for preventing explosion in boilers, resulting from low water therein, the steam whistle alarm is the best. This invention, an engraving of which appeared in the Scientific American a few weeks since, is fast coming into use. We shall make no charge but should be glad to have you use endeavors to obtain for us a few subscribers in your place.

" G. V. of Rhode Island;"—We do not know where the gentleman you refer to resides.

" H. G. of Pa."—All the information you desire will be published before long in the Scientific American.

" T. E. S. of Pa."—The air chamber placed on water pipes near the orifice for discharge, has long been known and is in common use. You could not obtain a patent

" L. M. W. of N. Y."—Your plan for a Corn Sheller is new, we believe. We understand the principle and consider it good. The $3 you enclosed came duly to hand.

" J. F. M. of Pa.—Your improvement for spirit lamps is not new. It is in common use and you could not obtain a patent.

" R. R. of Penn.—The copal must be made without oil. For this purpose it must be mixed with borax, and then it will dissolve in pure alcohol or turpentine. Tritarate the two in a mortar before using the alcohol which should be heated with the mixture in a long necked bottle. The balsam will then mix as one to three, when a liitle warm. This is the direction we have got.

" Z. C. of Iowa."—Your plan for working cranks for paddle wheels is different, but not half so good as that in common use. We have always considered that atmospheric air was necessary to produce butter. Some valuable information upon all the subjects you have named will be published during volume 4. We cannot tell the whole cost of the patent till we see the model of the thing to be patented.

" R. S. I. of R. I."—We shall have several hundred copies of vol. 3 bound which will be ready for delivery in about 2 weeks. Price $2 75.

" W. S. of Vt."—Mr. Z. Parker is at present residing at Philadelphia.

We have several communications on hand, which are necessarily delayed. We will attend to them as soon as possible.

A Characteristic Present.

A splendid plough has been presented by some agriculturalist, to Hon. J. W. Farally, member of Congress from Crawford, Pa., for his defeat of the attempt to have Wood's plough again patented; Wood being dead some twenty years, and speculators having the matter in their own hands. Now only that Mr. Farally sifted this case to the bottom, we believe that the patent would have been obtained The Bill passed the Senate, but was nailed to the floor of the House.

The question between Mr. Ellet, engineer, and the directors of the Niagara Bridge Company as to who shall receive the have mining from passengers who cross the temporray bridge, has been referred for legal decision. Wagons weighing two tons have crossed it.