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See advertisement on last page.

## Poetry.

### THE POOR VOTER.

They knew that I was poor,  
And they thought that I was base,  
And would readily endure  
To be covered with disgrace.  
They judged me of that tribe  
Who on dirty mammon dote,  
So they offered me a bribe  
For my vote.

My vote—it is not mine  
To do with as I will,  
To be cast like pearls to swine,  
For these wallowers in ill.  
It is my country's due,  
And I'll cast it while I can,  
For the honest and the true,  
Like a man.

Ah no! I'll hold my vote  
As a treasure, and a trust—  
My dishonor none shall quote  
When I'm mingled with the dust.  
And my children, when I'm gone,  
Shall be strengthened by the thought  
That their father was not one,  
To be bought.

### A CHRISTIAN LIFE.

He envied not the pomp and power  
Of kings in their triumphant hour,  
The deeds that win a lofty name,  
The songs that give to bards their fame.

He sighed not for gold that shines  
In Guinea's brooks, in Ophir's mines;  
He stood not at the festivals  
Of nobles in their gorgeous halls,

He walked on earth as wood-streams pass,  
Unseen beneath the fresher'd grass;—  
His were pure thoughts, and humble faith,  
A blameless life, and tranquil death.

He kept, in days of strife and wrath,  
The Christian's straight and narrow path;  
But weep thou not:—we must not weep,  
When they, who rest in Jesus, sleep.

### MY MOTHER'S SMILE.

My mother's smile! how oft in sleep  
It lies like sunshine on my heart,  
Till when I wake, I wake to weep  
That aught so lovely should depart.

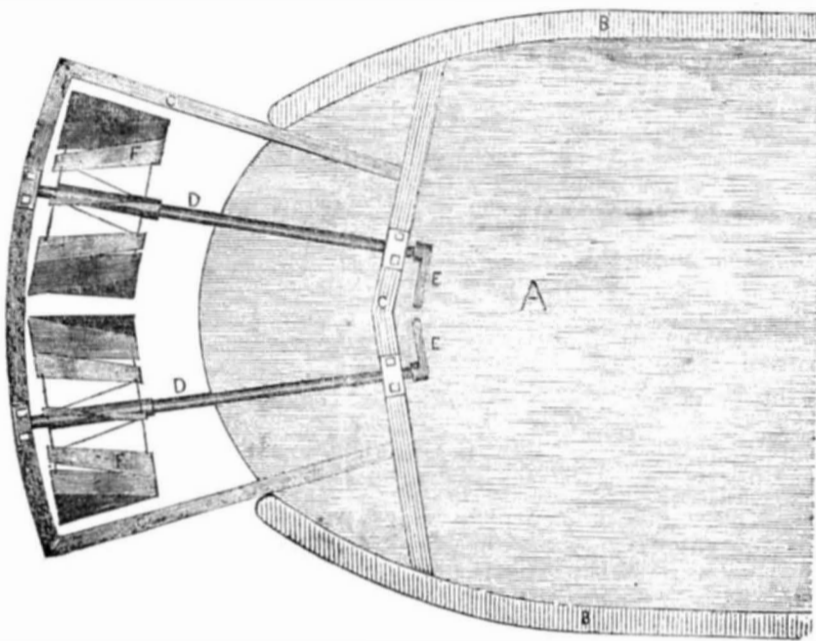
I sometimes sit and dream of fame,  
But when I foolishly the while  
Would link its glories to my name,  
I smile a sad reproving smile.

As o'er I number, one by one,  
Through all my youth's misguided years,  
The things which I should not have done,  
How darkly dim that smile appears!

But when I hush my bosom's wrath,  
Or smooth beneath the pilgrim's feet  
The weary and uneven path—  
O, then that smile is heavenly sweet!

When last I kissed my mother's brow,  
She called me a poor orphan child,  
And with me in my spirit now  
Is the last smile she ever smiled.

## BARKER'S TORTUOUS PADDLE WHEEL.



This engraving is a representation of a new plan for propelling vessels, invented by Mr Benjamin Barker, of Ellsworth, Maine, and which he names the "Inclined Tortuous Paddle." The above engraving is taken from a small model, and its nature will be readily understood. It is a kind of screw and paddle combination applied to the stern, the paddle being somewhat broader at one end. This is a vertical view. A is the interior of the vessel, B B, the sides, D D, are shafts of the paddles, C C is the frame work for the bearings of the shafts, F F, are the paddles of an angular form. These paddles are inclined to each axis respectively at an angle of about ten degrees—with the interior edge inclined at a somewhat less angle than the exterior edge, in proportion as it is nearer the axis, thereby giving the paddle its tortuous form. E E, are cranks for driving D D, by shafts from the engine. As the virtue of this method will much depend on the speed, cog wheels will have to be used, so that the paddle shafts may have a greater speed than the main shafts.

If power be applied to the cranks causing the wheels to revolve and the paddles move towards the centre, as these are immersed in water and inclined in their axis of motion, a speed will be given to a vessel—in the opinion of the inventor—greater than by any

### Preservation of Butter.

The method used by the Tartars consists in fusing the butter in a water bath, at a temperature of 190° Fahrenheit, and retaining it quiescent in that state until the gaseous matter has settled, and the butter become clear; it is then to be decanted, passed through a cloth, and cooled in a mixture of salt and ice, or at least in spring water, without which it would crystallize, and not resist so well the action of air. Preserved in close vessels and in cold places, it may be kept for six months as good as it was on the first day, especially if the upper part be excepted. If, when used, it be beaten up with one sixth of cheese, it will have all the appearance of fresh butter. The flavour of rancid butter may be removed almost entirely by similar melting and coolings.

The Copper Ore from Quid Mine, Lake Superior, is being smelted at Pittsburg, Penn. It yields from eighty to ninety per cent pure copper, in addition to a small quantity of silver.

other method of propulsion. Many plans of propulsion have been tried and set aside, and for that reason there are few who will express an opinion, but from beholding an experiment. Experiment indeed is the only true test of utility. Yet the screw has its defenders and friends and many eminent men believe it to be superior to the paddle wheel. The paddle wheel again has its friends, and we must say they are not yet driven to the defensive, in regard to its merit. This combination propeller of Mr. Barker is different from any that we have seen proposed. The only resemblance to it to our knowledge is that of Daniel Bernoulli, and his differed materially in the arrangement, which was not so good. Bernoulli's plan consists of planes immersed in the water parallel to the sides of the vessel and turned in a collar which moved in a plane perpendicular to the keel, and which were thus to move the vessel forward. It requires both time and many experiments to perfect every invention, and there are some things about this that may be modified for the better, such as a greater incline of dip in each wheel, but when we talk about these things, we should not forget that "Morgan's Paddle Wheel" that lay dormant so long on the other side of the Atlantic, is now coming into general use although it was long neglected and despised.

### Chinese method of making Sheet Lead.

The method of making sheet-lead employed by the Chinese, is carried on by two men. One is seated on the floor, with a large flat stone before him, and with a moveable flat stone-stand at his side. His fellow workman stands beside him with a crucible filled with melted lead, and having poured a certain quantity upon the stone, the other lifts the moveable stone, and, dashing it on the fluid lead, presses it out into a flat and thin plate, which he instantly removes from the stone. A second quantity of lead is poured in a similar manner, and a similar plate formed, the process being carried on with singular rapidity. The rough edges of the plates are then cut off, and they are soldered together for use.

It appears, from a return just made to Parliament, that the declared value of British machinery and millwork, exported from the United Kingdom in the year ended on the 31st of January last, was £1,263,015.

## RAIL ROAD NEWS.

**Norwich and Worcester Railroad.**  
The Norwich and Worcester Railroad Company have sold their boats, the Worcester, Cleopatra and Knickerbocker, to Drew, Newton, Coit & Co. by which operation the debt of the Company has been reduced some \$200,000. The Directors are introducing economy into the management of the road, which will make a very large reduction in the yearly expenses.

### The Broad and Narrow Gauge of Rail Roads.

The value of the broad and narrow gauge, so far as profit and loss in concerned, seems to be in favor of the narrow, as being less expensive according to the practical working of both systems. The question in a mercantile light has lately been examined in England by commissioners appointed for the purpose. It is to be hoped that the New York and Erie may prove an exception to this conclusion, at least, that it may be equally profitable as any other line.

### A Funny Railroad Accident.

On Saturday evening the 2d inst. as the last train of cars from Lowell was approaching Boston two of the hindermost cars accidentally parted from the train in Medford, about five miles distant. The occurrence was not discovered, however, until after the conductor had supped in the city and returned to the depot, when he was astonished to find that two of his cars, containing some 100 passengers each were "among the missing!" He instantly dispatched a locomotive on the return track, and the lost cars, with their population, were brought into the city after a detention of about an hour and a halt, by this both amusing and vexatious oversight.

### Tribute of Respect.

By the Reading Pa., Herald, we learn that the mechanics at Reading R. R. machine shop have presented Mr. L. J. Kirk, the master machinist, with a splendid silver pitcher and silver goblets as a mark of esteem. The present is a magnificent one. The pitcher and goblets are beautifully chased with figures representing railroad cars, with a figure of the patent steam hammer invented by Mr. Kirk. We take great pleasure in noticing such instances of good will among mechanics and their employers. The utmost good feeling and good will in workshops among the whole of the hands is a source of great pleasure.—More work is done and done better in such shops.

### Current of Niagara.

The current of the Niagara river for the first five hundred feet below the Suspension Bridge, runs at the rate of nineteen miles per hour; for the next eight hundred feet it runs at the rate of twenty-five miles per hour—giving an average of about twenty-three miles per hour for the first quarter of a mile below the bridge.

### Iron Dross Flags.

In extensive furnaces and iron works, the dross or slag collects and is thrown out as useless. A French machinist, some years ago, devised the plan of making a good use of this material. He accordingly laid moulds, or forms in a situation to allow the dross to flow into them. The dross is allowed to cool very gradually, so as to render it tough; and to effect this, the forms are placed so as to receive a portion of the surplus flame of the furnace. The inventor thus forms flag stones, blocks for building, or for paving and other useful purposes, and they have been found to be very durable and convenient; exhibiting a hardness in many instances superior to granite.