

"The Grit Bare-Legged Laddie."

Sixty years ago a stout bony youth of eighteen years old, who had been known among his neighborhood as "a grit bare-legged laddie," called on a poor village schoolmaster, and said:

"I would like to attend your evening school, sir."

"What do you wish to study?" asked the teacher.

"I want to learn to read and write," replied the lad.

The teacher looked into the lad's face with a somewhat scornful glance, shrugged his shoulders, and said:

"Very well, you can attend."

Now if that bony lad had said to the teacher: "I mean to become a great inventor, to be the companion of rich and noble men, to hold conversation with kings, and to write my name among the great men of the world," I dare say the teacher would have called the boy a fool, for cherishing such wild dreams. Yet that poor bony lad, who at eighteen did not know the alphabet, did all these things before he died.

Who was he? His name was George Stephenson, the great railway pioneer!

It was not the fault of young George that he was ignorant, it was only his misfortune. His parents were too poor to send him to school. He was the son of a fireman of a pumping engine in a colliery. His birthplace was a cottage with a clay floor, mud wall, and bare rafters. He had to help earn his living from his earliest years, first by herding cows and barring up the gates of the mine at night.—Next he was put to picking stones from the coal, and after that to driving a horse which hauled coal from a pit. By and by he was made assistant fireman to his father. When he was seventeen he was made plugman of a pumping engine—a higher post than his father's—and had climbed, as it seemed, to the top of his ladder. What hope was there of a youth who could not read at seventeen?

But George had hope in his breast.—His engine was a lesson book to him. He took it apart and put it together again, studied it, loved it, and when he was told that there were books which told about engines he made up his mind to go to school.

To school he went, and soon learned all that the village master could teach.—When twenty years old he was made brakesman, and began to think about inventing better engines than he saw about him.

Thus working, thinking, reading, he kept on, avoiding all bad habits, until he built a locomotive that traveled at the rate of four miles an hour on a tramway. This was a great affair at that time.

His next work was a railway eight miles in length, and from this point he went on, until he was known as the great railway pioneer of the world.

George was often laughed at by men who thought themselves much wiser than he. One day he was proposing to build an engine to run twelve miles an hour. A grave-looking gentleman, thinking to put him down, said:

"Suppose one of these engines to be going along a railroad, at the rate of nine or ten miles an hour, and that if a cow were to stray upon the line, would not that be a very awkward circumstance?"

"Yes," replied Mr. Stephenson, "very awkward indeed—for the cow."

Thus, by his own industry, did the "grit bare-legged laddie" climb to a very high place among men. Great men, and even kings, sought his advice, wealth flowed into his purse, his name was honored, his character respected. At a ripe age he died and went to his eternal reward.

Let this sketch of the "grit bare-legged laddie" cheer on the boys and girls to patient effort in the path of duty. Learn something every day. Press forward!—Be good and you will prosper.—[S. S. Advocate.]

The Telescope.

There is no amusement or occupation for a clear evening in winter more interesting and instructing than the observation of the planets and the starry heavens through a good telescope. All that is necessary for its thorough enjoyment, is such a knowledge of astronomy and of the times and motions of the stars, as a week's diligent and careful study will give to any person of quick apprehension and fair intelligence.

There is no instrument of human invention which has enlarged the nobles of man's natural faculties, so much as the telescope. As one among many examples of this enlargement of a natural faculty, let us take a glance at Saturn, one of the most wonderful objects in the heavens. This planet is 82,000 miles in diameter, and 900 millions of miles distant from the earth. It is surrounded by a circular ring, which is 23,000 miles wide, 100 miles thick, and 19,000 miles distant from the surface of the planet. To the naked eye, Saturn appears merely a small dull star, and its ring is utterly invisible.

Now observe what a power of 200 on a good three inch achromatic telescope does for a man in respect to Saturn. It takes him up, and setting him astride, as it were, on a flash of light or of lightning, it carries him in an instant of time a journey of 895 1-2 millions of miles towards Saturn—that it places him, exactly as near Saturn as he would be placed after a continuous journey by night and day for three thousand years at express railroad speed. It shows Saturn larger than the moon, it shows plainly its belts, his moons, his wonderful double ring, and makes his solid globu-

lar form, suspended and swinging within the ring, perfectly distinct and palpable to the eye. A view of this magnificent planet, alone, on a clear night, is worth the price of such a telescope, and the same is true of the view of Jupiter with his moons and belts, of our own moon, of the revolving double stars, of the glorious clusters, of the great nebulae of Orion, and of many other of the superb sights scattered over the mighty dome of the nocturnal heavens, which to the unaided eye are, comparatively speaking, as nothing or next to nothing.

The constellation of Orion, which is generally considered the most beautiful and brilliant of all the constellations, is now seen to great advantage, as it reaches the meridian about ten o'clock, and the centre of it is then directly over the celestial equator and midway between the North and South poles of the heavens. It is then about forty degrees south of the zenith. At the same time may be seen Sirius flaming fiercely, and by far the brightest of the fixed stars. It is situated twenty three degrees south of the three stars forming the belt of Orion, which point directly towards it. Its distance from the earth is proved to be at least twenty million million miles, or so great that light, which flies a million times faster than a cannon ball, is three years in coming from it to the earth. Its light, and by inference, its size also, is proved to be fourteen times greater than that of the sun.

The telescope of Lord Rosse reveals a succession or perspective of nebulae composed of millions upon millions of such stars or suns, so distant that 30,000 years is required for the passage of light from them to earth. The fair conclusion is that there are incalculable millions of such masses of suns beyond the reach of any telescope, so distant from each other and from the earth that if a man were to employ his whole lifetime in making a straight line of figures and each unit was to stand for a million of centuries, the sum represented by that line would fall far short of expressing the smallest fraction of the time required for the transmission of light from them to the earth. From this may be formed some faint notion of the infinitely insignificant part which the earth, and even the solar system plays in the mysterious game of creation, and of the supreme folly arrogantly assuming to be its most important part.

Jupiter is now the most brilliant and conspicuous of the planets. It rises now at about six o'clock, and at nine marks a fine show at the northeast, even to the naked eye. A power of 200 on a three inch telescope gives it a diameter five times and a disc more than twenty times as large as that of the full moon. It shows also his belts and his four beautiful moons, which change their relative positions every night. It shows also the shadows of his moons as they pass across his disc. Saturn is now in the constellation of the Lion, and rises about two hours later than Jupiter, following in his wake in the ecliptic about thirty degrees distant from him towards the northeast. To the naked eye it is merely a pale, dull star, but with a telescopic power of two hundred, the most splendid and wonderful of all the heavenly bodies. A few degrees to the left of Jupiter is seen Castor, a single star to the unaided vision, but with a power of 250, the most beautiful of all the double stars, one of them making a revolution about the other in about 400 years. About half way between Sirius and the constellation of Orion, is seen a small star in the constellation of the Unicorn, barely visible to the naked eye, but, with a power of 200, seen to be beautifully triple.

The Pleiades, or seven stars, are now on the meridian about nine o'clock, and afford a splendid object for the telescope. At the same time, towards the northwest, and about thirty degrees up from the horizon, blazes Lyra, one of the most brilliant of the fixed stars. Just above it and forming a triangle with it are two little stars, one of which, with a power of 200, is resolved into an exceedingly beautiful quadruple star.

The star Mizar, in the tail of the Great Bear, is also found to be a superb double star.

The planet Venus may now be seen just after sunset, far down at the southwest, and with a power of 100, is always an exceedingly brilliant object, resembling closely, but much larger than the new moon.

The planet Uranus is now on the meridian at ten o'clock. His diameter is 34,000 miles, and his distance from the earth 1,800,000,000 miles. The moon itself becomes an object of inexpressible grandeur and sublimity, when seen through the telescope. With a power of 240, the observer is instantly carried over 239,000 out of the 240,000 miles of distance which divide us from it, and is set down at a point only a thousand miles from its surface, so that its spherical solidity, whirling through space like a monstrous cannon ball, its blasted and desolate appearance, its strange, circular mountains, and volcanic craters and valleys, become as real and palpable to the eye as the rocky precipices of Rocky Hill, or the cliffs of East and West Rock.—[Hartford Times.]

PRESERVATION OF FURS.—The largest emporium for furs in the world, is, doubtless, Moscow; and apropos of this last named city, we see it stated by one who was present at the World's Fair in London, in 1851, when the furs from Moscow for the exhibition were being unrolled, he observed that each fur contained a swan's quill, one end of which was tightly corked. On inquiring of the Russian gentleman who had the furs in charge, he was informed that the quills contained liquid quicksilver, and were a certain preventive of the attacks of moths.

Heathen Mythology.

For the benefit of our readers we collect and publish the affinities of the heathen gods, so often referred to in the mythology of the ancients:

Juno was the daughter of Saturn and Ops. Ceres presided over peach orchards and other garden sassa. Mars was the god of war. Pan protected those rural citizens engaged in tending sheep. Venus attended the affairs of love, and regulated the motions of amatory youths. Jnpiter was god of the celestial regions.

Apollo was a prophet, a pretty man, and consequently had the nine muses, who were females, running after him. He owned two servitors humble, named Triphod and Lyre; the latter is supposed to be the person that invented lies, a commodity now extensively used.

Vulcan was a master of a blacksmith shop, and had a partiality for fire. Mercury was the *avant courier* of the gods, and presiding genius of the thieving fraternity. He used to go around in company with Iris, the daughter of Thomas, who was his better half. Diana had a great love for beasts and trees. Neptune ruled the ocean, though it is not intimated that he had the control of any very large vessels; a tiny shallop was all that he could order to do his bidding.

Hercules was a real bruiser of the Tom Hyer order; nothing delighted him more than a forcible, effective and well-planted blow. Cupid always maintained a great interest in affairs of the heart, and was supreme ruler of the human gizzard.

Hebe was some pumpkins as a waiter, and tended table for the divinities with marked approval. Bacchus was the god of rum, and frequently had the delirium *tremendous*. Proteus was a fortune-teller, and could see as far into a millstone as the man that picked it; he was a very changeable fellow, hence the word protean.

Pluto was a native of a tropical clime, and consequently had a *penchant* for warm things and hell fire. Hygera was a protectress of health, and a very kind-hearted female. Plutus used to "spend his money free," (see song of Ethiopian serenaders,) and was a "broth of a boy" on a midnight carnival or a "general bust."

Olympus used to tend a light-house, and look after the hours. Flora was the mistress of a flower garden—bouquets used to sell very high in her time. The Dryads and Nymphs were generally utility folks, who haunted around shady places, and did little chores for a consideration. They had plenty of imitators. Satyr was a rare old fellow, objected to a man blowing hot and cold with the same breath, and left a numerous progeny who can do the same thing; he was already to go it, but belonged to a short-horned breed.

The Faries were given to promiscuous dancing; they were always in a frolic on the lawn, and had no objection to a "cotton factory ball"—tickets one dollar and a fight in the prospect.—[Petersburg (Va.) Express.]

Condensed History of Steam.

About 280 years b.c., Hero, of Alexandria, formed a toy which exhibited some of the powers of steam, and was moved by its power.

A.D. 540, Anthemius, an architect, arranged several cauldrons of water, each covered with the wide bottom of a leathern tube, which rose to a narrow top, with pipes extending to the rafters of the adjoining building. A fire was kindled beneath the cauldrons, and the house was shaken by the efforts of the steam ascending the tubes. This is the first notice of the power of steam recorded.

In 1843, June 17, Blasco de Garay tried a steamboat of 200 tons, with tolerable success, at Barcelona, Spain. It consisted of a cauldron of boiling water and a movable wheel on each side of the ship. It was laid aside as impracticable.

The first idea of a steam engine in England was in the Marquis of Worcester's "History of Inventions," A.D. 1663.

In 1710, Newcomen made the first steam-engine in England.

In 17, patents were granted to Savery for the first application of the steam-engine.

In 1636, Jonathan Hulls first set forth the idea of steam navigation.

In 1764, James Watt made the first perfect steam-engine in England.

In 1778, Thomas Paine first proposed this application in America.

In 1781, Marquis Jouffroy constructed one on the Saone.

In 1785, two Americans published a work on it.

In 1789, William Syming made a voyage in one on the Forth and Clyde Canal.

In 1802, this experiment was repeated.

In 1782, Ramsey propelled a boat by steam at New York.

In 1783, John Fitch, of Philadelphia, navigated a boat by a steam-engine on the Delaware.

In 1763, Robert Fulton first began to apply his attention to steam.

In 1793, Oliver Evans, a native of Philadelphia, constructed a locomotive steam-engine to travel on a turnpike road.

The first steam-vessel that ever crossed the Atlantic was the "Savannah," in June, 1819, from Charleston to Liverpool.

The above condensed history of the discovery of steam power is an item of news which, in all probability, there is not another man in all Georgia at this time who feels as much interest in this notice of it as we do, and particularly in relation to the last paragraph. Our reasons for feeling thus deeply interested are as follows:

In the year 1819, we (the editor of the Blade) were merchandizing in Washington, Wilkes' County, Ga. (the place of our birth), and in the latter part of May, in that year, we had gone down to Savannah to lay in our summer stock of goods, and while there, the steamship Savannah came paddling up the river and anchored at Bolton's wharf (this was previous to her leaving for Liverpool.) A steamship, at that time, was considered the wonder of the world, and by the time she was moored to the wharf, the Exchange platforms were crowded with spectators, when the captain threw out his plank and politely invited some ten or a dozen gentlemen who were standing near, to go on board, and then down into his cabin and take a glass of old Modeire with him. Well, we were one of that number, and in our twenty-eight year of age, weighing about one hundred and eighty pounds, and as hardy as a buck, and could stand a bumper about as well as the next man. Well, the cabin seemed to be a solid piece of the highest polished mahogany furniture we had ever seen at that time, and everything about the ship looked to be done up brown; and that we had a 'gaily' time of it that evening none need doubt.—[Independent Blade.]

"She Works for a Living."

Commend us to the girl of whom it is sneeringly said—"she works for her living;" in her we are always sure to find the elements of a true woman—a real lady. True, we are not prepared to see a mincing step—a haughty lip, a fashionable dress, or hear a string of splendid nonsense about the balls and young men, the new novels and the next party, no; but we are prepared to hear sound words of good sense, language becoming woman, and to see a neat dress, and mild brow, and to witness movements that would not disgrace an angel.

You who are looking for wives and companions, turn from the fashionable, lazy, haughty girls, and select one from any of those who work for a living, and never—our word for it, will you repent your choice. You want a substantial friend and not a doll; a counselor and not a simoleon. You may not be able to carry a piano into your house, but you can purchase a spinning wheel or a set of knitting needles. If you cannot purchase every new novel, you may be able to take some valuable paper. If you cannot buy a ticket to the ball, you can visit some afflicted neighbor. Be careful then when you look for companions whom you choose. We know many a foolish man, who, instead of choosing the industrious and prudent woman for a wife, took one from the fashionable walks and is now lamenting his folly in dust and ashes. He ran into the fire with his eyes wide open, and who but himself is to blame?

The time was when the ladies went a visiting and took their work with them. This is the reason why we have such excellent mothers. How singular would a gay woman look in a fashionable circle, darning her father's stockings, or carding wool to spin? Would not her companions laugh at her? And yet such a woman would be a prize for somebody.

Blessed is the man who chooses his wife from the despised girls "who work for a living."

A Good Bargain.

The Paris *Charivari* gives the following 'true story': Twenty years ago three young men were walking together on the Boulevards. "Shall we go to breakfast?" said one. "With all my heart," replied the second.

"But," chimed in the third, "where are the funds? which of us has a purse?"

"I," exclaimed the other both at once, "but it is empty."

"Christ! and I am as hungry as a lawyer's clerk. What's to be done?"

"I have an idea," said the first speaker; "come with me." The three entered a music-shop, and asked the proprietor whether he would buy a song.

"A song! Diable! Whose is it."

"Ours."

"Let me see it."

"I will sing it to you," said the shortest of the three. He sat down to the piano and sang the piece offered for sale.

"Well," said the publisher, "it is not bad—I will give you 25¢ for it."

"What, words and music and all?"

"Oh, certainly, the times are hard."

"It is very little—never mind—shell out—it will be enough to pay for our breakfast."

The publishers paid the 25¢, and the three friends went to breakfast together.

"Why this story?" the reader will ask. Oh, nothing in the world but this—the song was "Andalouse!" The publisher made 100,000¢ by this bargain. The author of the words was Alfred de Musset; the author of the music was Monpou, and the singer, Duprez. That's all.

A CONTENTED WOMAN.—"Mrs. Jones," said a gentleman, one day last summer, when railroad accidents were so numerous, to a lady whose husband was a brakemen, "Mrs. Jones, do you not feel worried about Mr. Jones while he is on the cars, in view of the many accidents that are now daily occurring?" "W-e-l-l, n-o—not at all," replied the contented lady, "for, d'y'e see, if he is killed, I know I shall be paid for it, because Mr. Williams got \$40 for his cow that was run over by the cars a few days since!"