

HOW TO MAKE MATCHES.

Not the Sentimental but the Sulphurous Kind—An Interesting Process Described.

There are only seven match manufacturers in the State, and but twenty-five in the United States. Within the past three months the manufacturers have formed an association, and are practically united. There are three factories in New York city, one at Frankfort, one at Utica, and two at Syracuse. The details of match-making is an interesting one. The Utica firm employ sixty hands, and in the busy season turn out 400 gross of matches every twenty-four hours. The first process is the sawing of the blocks. Good clear pine is selected, of an average thickness. The blocks when sawed are sent down an inclined plane, being "fed" by an operator into a machine that cuts them cleanly into the shape required. The working of this machine is interesting. The cutter is of finely-tempered steel, and every movement tells. It cuts out sixty-four matches at each stroke, and makes 380 strokes a minute, or 17,920 matches a minute. The matches are of double length. The machine drops the matches into a trough which mechanically feeds them up an inclined plane, from which they are removed by a boy and taken to the coiling room. The machines which cut up the blocks vary in certain details, some of them cutting a square match—known as the old-fashioned "telegraph match." From this room the matches are taken to the coiling department.

The process of "coiling" is also a mechanical one, and the mechanism is remarkable for ingenuity. The matches when straightened are put into a hopper and "fed out" by the machine passing at regular intervals between a thick bar and a thin one. From a small roll the matches are picked up separately and "coiled" with perfect exactness until the roll is as large as a good-sized cheese. Each match is held securely in place. When coiled the mass is ready for "dipping." There are ten coiling machines now in operation in this factory. Each machine is capable of coiling fifty gross per day. The coils are even, heated and then dipped in a boiling vat of sulphur. The process of dipping requires experience. After being dipped in sulphur they are further heated by being dipped in a preparation of phosphorus, glue, etc.—the exact nature of the compound being a secret known only to the manufacturer. One of the objections to matches has been the fact that they mar the wall and disfigure wall paper when struck. This objection has at last been removed. After a series of experiments extending through years, the Utica firm have at length discovered a process which not only leaves the head of the match perfectly white, but also makes it impossible for anyone to mar the wall paper, or a delicate surface while in the act of striking. As may be supposed, the call for this match is very great; the firm has been unable to meet the demand. When the writer visited the factory, men were employed in dipping the white or "tiger" match. The great coils, when dipped, were dried for a few minutes and then passed on to the cutting machines. Up to this point the matches have been of double length, being dipped on both ends. They are now cut in two with great exactness and rapidity and passed through to the filling room. Here twenty-five girls are employed in sorting and filling. They work with a rapidity of movement that is wonderful. Practice enables them to take up just the number of matches required to fill a box. One of the girls employed has filled 4,320 boxes of matches in a day, handling 432,000 matches.

The Utica firm make the boxes required, buying the straw board and other paper needed and cutting and working it up. The straw board is cut, scored (or creased) in one department and then passes into the box-making department. Here fifteen girls are employed in making boxes. In another room may be seen one of the latest triumphs of mechanical art in the shape of a box-making machine. The machine seen in operation yesterday drops 104 boxes a minute, and the machine that makes the covers also turns out the same number per minute. The patents expect to receive their patent some time during the present month. As soon as the patent is issued we shall allude to the machine at greater length. The covers of the large boxes are now made by a machine that cuts off the corners of the straw board and puts on the glue required. The board then passes to a machine that perfects the form. The Utica factory is at present making six varieties of matches. The parlor match is made round and square. The red-headed match is made square form. It is sold largely in Vermont. The round white, or "tiger" match, circulates everywhere. The blue-headed match sells largely in Pennsylvania and the South; the head large and glaringly blue—a regular charge on a large scale, which the dorkies of the South take delight in. It is square in form and quite bulky. The black-headed match is rounded in form and is in demand in all sections of the country. The largest match manufactory in the country is located at Wilmington, Delaware—*Utica Observer.*

The United States Congress.

The Senate of the United States consists of seventy-six members, and of this number fifty-nine are practicing lawyers. Of the 293 members of the House of Representatives 219 are lawyers. The President and Vice-President of the United States are lawyers, and nearly all the government departments are headed and directed by the same profession. In the Senate there is only one physician, and in the House there are but six. There are among the Senators eight business men or merchants, one doctor, one editor, two planters, two farmers, one banker, one mine owner and operator, and one of no profession or business.

Besides the 219 lawyers in the House there are twenty-five merchants, five bankers, three capitalists, two inventors, five manufacturers, two teachers, twelve farmers, six physicians, one architect and builder, four editors, two ministers, two millers and three owners and operators of transportation lines. The oldest member of the House is Mr. Wait, of Connecticut, who is sixty-nine years of age, and the youngest member is Mr. Frost, of St. Louis, who is twenty-eight years of age. Fernando Wood has been longer a member of the House than any of his associates, and next in point of long service is Judge Kelly, of Pennsylvania. Mr. Stephens, of Georgia, is generally spoken of as being older than any other member of the present House, but Mr. Wait has about one year the advantage of him in that respect.

FOR THE FAIR SEX.

A Kiss?

A pout, and a parting of lips as they touch—That's a kiss in the abstract. It does not seem much; But where is the language can rightly express it? What letters can sound it to help you to guess it? What simile suggest, or what fancy reveal The mysterious bliss it can cause one to feel? Here nature assuredly won a diploma For fragrance of flavor and perfect aroma.

A kiss is electrical—comes with a start That tingles a delicate shock to the heart, And sets the eyes twinkling with rapturous delight, Like stars in the sky of a clear frosty night.

When 'tis over the ecstasy clings to you yet; This a joy to remember and never forget. All pleasure condensed in an instant of bliss Can but partly describe what's contained in a kiss.

—George Birdseye.

Fashion Fancies.

Shell trimming is much used to head bouffants.

Flowers reappear as trimming for dress bouffants.

Corduroy is the fashionable material for a child's dress.

The magnolia has found its way into the brocade patterns.

Ostrich bands are the only feather trimmings that wear well.

Turbans matching their ulsters make pretty school hats for little girls.

A yard and a quarter of satin is all that is needed to trim a cashmere gown.

Bracelets of flower buds are the newest thing for fastening the long glove wrists.

A sickle in which a four-leaved clover is caught is the design of one of the new lace pins.

Lace pins, looking like branches of holly with bright berries, are pretty and reasonable.

Cashmere colors are more sparingly used, and chiefly as relief to plain velvets and cloths.

The New York girls have adopted the Parisian fashion of wearing India scarfs for extra wraps.

Caps and jackets of colored velvet, trimmed with gold or silver braid, are worn by young girls.

Twined French sateen, which is used to line dresses of cream tulle, is almost as light and firm as silk.

Coat-basques are made gay at a very small expense, by adding skirts, cuffs, and a collar of cashmere.

A new style of bonnet, gradually coming into use in New York, is small and close, and almost like a coil.

A great deal of figured and stamped velvet is used inexpensively with satin and silk in street costumes.

The birds used for dress trimmings are very natural looking, even the beaks and claws being perfectly imitated.

Madam Sin-Fu-Gen, the wife of the Chinese minister at Berlin, is the first Chinese lady who has ever been in Prussia.

The latest boots for ladies have a broad projecting sole, and button on the outside of the foot instead of over the instep, as formerly.

Evening dresses which have their skirts made up in wide box-plaits have masses of roses set on each plait by way of trimming.

Plush turbans, with deep bands of fur sewed around the edge, and having chenille tassels falling at the back, are pretty and tasteful.

Silk tassels of cream, or blue, or red silk, are used as ornaments for children's caps, and sometimes constitute their sole trimming.

Some turban bonnets are covered with folds of soft silk with raveled edges, and have bands of white velvet placed around the edge.

Little yellow chrysanthemums and clusters of rose geranium leaves have taken the place of the daisy bouquet that was worn in summer.

Bronze turkey feathers are used in some of the new feather bonnets, as well as the more aristocratic plumage of the golden and purple pheasant.

Sapphires of many colors are combined in one ring by New York jewelers. They are cut in the same way as diamonds and mounted high.

Wide ribbons with dark borders and clintz or palms in the center, are used with striking effect with delicately tinted muslins and satins for evening dress.

The new fur-lined circulars are made with a deep collar of fur instead of the hood of last winter, and all a trifle shorter, to enable them to be worn with the short costumes.

Butterfly bows may be made either of India muslin, edged with Languedoc, Valenciennes, or Duchesse lace, or of black China crape, bordered with hand-painted black lace.

Gray, brown, olive and blue French cashmere, wrought all over with polka dots of the same color, are imported for combination with satin or velvet in pretty house dresses.

Red and yellow, the Spanish colors, are in high favor in Paris, and so are Spanish mantillas, which are worn in ways that would convulse the gravest of senoras with laughter.

The Tallien overskirt, which opens on the left side almost to the waist, and has a deep border of silk or figured goods, is worn with an underskirt of alternate platings of plain and figured goods.

The gowns which have the skirt straight and full at the back, and the front breadth gored, or shirred, or quilted, or embroidered, or painted by hand, are intended to imitate the Queen Anne style.

Visiting costumes of plain velvet have appeared this season. They are lined with satin, and a little ivory lace is worn at the throat, and if one wishes to be showily dressed, an ivory feather is placed on the bonnet.

Garnet and pink are the leading combination of colors for evening dress. No shades are more inviting in assistance to the complexion. A great deal of filmy white lace or gauze de sole is indispensable with such costumes for young ladies.

It is averred by dealers that ladies who own fine diamonds purchase and wear numbers of paste stones in band-some settings, to enhance the splendor of their display. The white topaz, found

in Arizona and Idaho, is frequently set with real diamonds to make a show.

The new cuffs are very deep, and reach up nearly to the elbows as to make the upper part of the sleeve seem puffed, even when it is quite plain. The leg of mutton sleeves will not seem so ugly when they come if the eye be gradually accustomed to something like them by these cuffs.

Princess dresses for evening have the front slashed in deep points from below the hips, edged with feathery fringe, falling over satin of a deeper shade. An Oriental scarf, which combines the shade of the dress with brilliant, yet subdued embroideries, in gold and colors, is draped round the hips.

The broad brimmed hats of fur felt, wrongly called beaver, are in request by ladies wishing a change of millinery, who cut off part of the rim, and bend the hat into close, becoming shapes. Broad satin loops and a feather or wing are the proper trimming for such hats, which are rather more stylish abroad than the dressy turbans.

Flowers are worn with evening toilets in every fashion. A bouquet is tucked in the lace at right of the low, round corsage, or on the Grecian bertha directly in front. In other designs, smaller knots are worn as epaulets, and a rose heads the lacing in the back of the cuirass basque, or a dozen roses of graduated sizes form a coronal from the left shoulder across the bosom. This is particularly rich, with black lace or satin dresses. A festoon of roses heads the deep lace of the apron, with a trail falling at each side, or a spiral of lace headed by flowers is carried down the back of the dress, in a new and elegant fashion.

Queen Christine.

The Queen of Spain's apartments at the Castle of Pardo are thus described: The rooms are eight in number. The first we enter is hung in white satin, with hand embroidered blue flowers; the furniture, of Louis XV. style, is upholstered in rich blue satin; in a corner is a remarkable fine cabinet of rosewood, ornamented with old Sevres panels of great beauty. This room leads into a smaller boudoir, style of the first French empire, hung in yellow satin, with furniture of the same. In a recess of a window is a small equestrian statue of the king when he was only four years old. The small mite, looking very frightened, is holding the bridle in one hand and is saluting with the other. The third room is the queen's music room. The hangings are red and gold, two grand pianos occupy two corners, and curves and knick-knacks abound. The queen's study or workroom, comes next. It opens upon a large terrace, which, in summer, is arranged as a garden. It is white and gold, the furniture being old Dutch, with inlaid colored flowers. Then comes the bedroom, which is a very marvel of splendor and luxury. It required no less than eight hundred yards of stuff for the hangings, which are of eury Lyons silk, broche, alternate lines of red and blue flowers. The furniture is Louis XVI.; in a corner is a table in old Sevres; in the middle of the room is the bed, in black wood, with embossed black ornaments; at the head two reclining nude figures support a shield, upon which is emblazoned the queen's monogram in red upon blue ground; a canopy, in embossed brass, supports the curtains, which are thick silk, of the same design as the hangings. The bathroom, which is close by, also opens into a room specially reserved for the queen's attendants, and near the bedroom also is the dressing room, the furniture of which is silver pine, the walls being hung with eury silk, with blue flowers.

News and Notes for Women.

There are now fifty girls among the students of Cornell University.

A Philadelphia woman owns the largest colored diamond ever brought to America.

The empress of Austria has a large riding school attached to her estate. She loves to watch the training of vicious horses.

Miss Eckhardt, a farmer's daughter, of State Center, Ohio, pitched "eighty acres of wheat from wagon to stack," and was married a few hours afterward.

A celebrated French beauty in the time of Napoleon Bonaparte, Mme. Louise Lucerne, has just reached her 100th year. She was the friend and rival in beauty of Mme. Recamier.

Miss Gabriella Stickney has been appointed postmistress at Collyer, Kansas. She was a type-setter on the Chicago *Legal News* four years ago, but went West to grow up with the country.

Miss Mary Ripley has charge of the boys' department of the high school, at Buffalo, N. Y., where there are over 200 young men, whose ages range as high as twenty-five years. Few men who have preceded her in the work have been able to do it acceptably. Her influence is such as to make not only law-abiding, but enthusiastic students.

A pretty miss of eighteen, who belongs to a good family in Union City, Ind., and has been well educated, has recently been released from jail, where she was awaiting trial for kleptomania. The most influential people in the county united in an appeal for the dismissal of the indictment, and the court gladly acquiesced in a nolle prosequi.

Steam Power of the World.

The aggregate steam power of the world is at present 3,500,000 horse power employed in stationary engines, and 10,000,000 horse power in locomotive engines. This force is maintained without the consumption of animal food, except by the miners who dig the coal. The force maintained in their muscles is to the force generated by the product of their labor, about one to 1,080. This steam power is equal to the working force of 25,000,000 horses, and one horse consumes three times as much food as one man. The steam power, therefore, is equal to the saving of 75,000,000 human beings.

Soon after building a magnificent home in San Francisco a few years ago Senator Sharon sold it to the late millionaire, W. S. O'Brien. The appraisers of the O'Brien estate have just been making estimates of the value of the furniture. Senator Sharon paid \$125,000 for it, and though many of the rooms have not been used a single day, the appraisers value the whole at \$26,000. For instance, the furniture of the library, which cost \$17,000, is valued at \$2,700; that of the "pink room," costing \$7,800, is valued at \$1,180; that of the "dram room," costing \$5,000, at \$1,173; and that of the "green room," costing \$4,000, at \$800.

The Mexican and His Lasso.

A South Texas correspondent writes as follows: An accomplishment of the cowboy, and one in which, to be successful, he must invariably be an adept, is "roping" cattle, or horses for that matter, with a lasso. It is an ordinary half fish hump rope, usually sixty feet long, and with what farmers call a "slip-knot." The Mexicans often use a "lariat," which is stronger, and by hand made of rawhide thongs. The cowboy, when about to use his lasso, secures one end to the strong and substantial horn of his saddle, which is itself secured to the animal he rides by two strong broad girths of hair from the cow's tail. With the bridle reins in his left hand and the rope coiled up in his right, the cowboy gallops off into the prairie and directs his course toward some horse or cow he desires to catch. At a sight of him they likewise set off at a gallop, and the race continues until the pursuer has gained sufficient ground upon them to use his rope. The coil is at length suddenly thrown into the air, and so accurately has the rider calculated time and distance that, although his own animal and the one he is pursuing are dashing along like a locomotive, the noose descends on the head or around the horns of the fleeing cow. So well trained is the cowboy's horse that the latter instantly stops in his career and pulls back. The cow has also been halted and secured, the rider and his horse experiencing a profound joy to which, however, they are not by any means strangers. A horse is caught in the same manner as a cow, only that the cowboy throws the rope around the neck instead of the horns, as in the case of the cow.

But cattle and horses are not the only subjects of the lasso, which is and has long been used by Mexican bandits and highwaymen in assaulting and killing or robbing unwary travelers on the Rio Grande. For this purpose the stealthy thug generally conceals himself in a thicket of chaparral or behind a grove of cactus (prickly pear, which here grows higher than a man's head) near by the roadside. In this position, he, panting, lies in wait for the approach of his victim, who is riding along totally unapprehensive of danger. At once away goes the lasso high in the air, nor does the wayfarer have time to recover from his surprise before the fatal noose has been so tightly drawn around his throat that his breathing is suddenly stopped, he is dragged from his horse in the death agonies and soon all is over. The thug first secures the horse, if valuable enough, then waits till the last struggles are past, then quickly rifles his pockets, drags the corpse into the chaparral, and rides away on the dead man's horse.

An Old Stage Driver's Reminiscences.

The Boston *Journal* gives some reminiscences of an old New England stage driver, from which we take the following: "Yes, I've carried people whose wives, husbands, daughters or sons were sick nigh unto death, and they fussing and fretting because the cattle didn't get over the road faster, and blaming me because there was so many hills to climb. I remember one man who had a sick wife at a house on the road, and he heard just afore I started from Boston that she was dying. We had a light cargo that trip, and the man kept urging me to go faster, he was so anxious, I was driving as fast as I dared to send the cattle, 'cause it was a pretty hot day, and told him so. He asked me how much my horses were worth. I said about seventy dollars apiece. Horses were cheap in those days. He just pulled his wallet right out and counted out two hundred and eighty dollars, handed it to me, and said he wanted to buy them, but that he must drive. Well, as I could get as good ones for the money, and seeing as how worked up he was, I just put the money in my pocket and handed the lines to him, telling him to go ahead if he wanted to, and didn't he go? He just kept the long whip-lash tickling the flanks of the leaders, all the time we was on level ground, and the only breathers they got was when they climbed a hill. We finally reached the house his wife was stopping at about three hours ahead of time; he found her alive, and rushing from the house made me a present of the team. I refused them, but he insisted, and so, as the cattle were all right the next day, not hurt at all, I concluded to let the company keep the horses and I the money. "I was once carrying a young couple—girl and her sweetheart—to Haverhill. I had taken them up at different places on the road. Pretty soon the young fellow was urging me to drive faster and I see that he and the girl were kinder nervous like, and it wasn't till the girl herself coaxed me with tears in her eyes, that I began to drive faster. They told me they were running away to get married, and as soon as the girl was missed her folks would be after her. You see I was young myself then, and so I just sent them cattle for all they was worth, and when I pulled up at the parson's house they was white with foam. I went inside the house with the couple and saw them hitched together, and just as we was coming out up comes the girl's father and brother, but it was too late. I know I had a warm enemy in that household for years after."

A Dog Crazy for Grief.

A family who formerly lived near Providence emigrated to Kansas about a year ago, leaving behind them an old dog named Dash. Dash had been brought up in the family from puppyhood; he had kept faithful watch every night in winter and summer weather, and he was deeply attached to his master. Dash was not ugly in disposition, and he discriminated instinctively between the wandering rogues, whose presence in the neighborhood was disagreeable, if not dangerous, and the substantial citizen out for a walk or a drive. Whether indifference or lack of means caused the proprietor of Dash to go away without him is not known. After his master's departure Dash seemed to be a changed dog. Although kindly treated by a relative of his former owner, he grew morose and despondent. He would sometimes run down the road to meet an approaching team, and look up anxiously at those in it, as if expecting to see a well-known face. When spoken to in a pitying tone, or patted and caressed, he would turn up his mild eyes with a mute and appealing glance, and his tail would wag in a hopeless, forlorn way. At length it became evident that the dog's brain was affected. Was he crazed by grief, or was he in the imbecility of old age? The writer is inclined to the former opinion. At any rate it was judged best to kill him, and a single bullet put an end to the life and the wretchedness of poor Dash.—*Providence Journal.*

THE MADSTONE.

Wonderful Cures Said to Have Been Wrought in North Carolina.

Robert J. Jones writes from Danville Va., to the New York *Star* as follows: Joseph Pointer, of Person county, North Carolina, had a madstone that had been in his family for many years—more than 100, I think. I have never seen it, but I have heard of it ever since I was a child, and I never heard anybody express a doubt as to its curative power. I lived within five miles of Pointer's house for more than twenty years. I went to school with his older children, and his younger children went to school to me. Those who have seen the madstone say that it is about the size of the ball of a man's thumb, of a dark color, and very compact—like glass—on one side, and porous and of a brownish color on the other side. When a person has been bitten by a rabid dog or a poisonous snake or spider, it is applied to the wound, where it adheres for a time, and then falls off. It is afterward put into warm water, where it gives out the venom it has absorbed, and the process of applying it to the wound and putting it in water is repeated till it will no longer adhere.

In the spring of 1871 a girl about twelve years, who was then going to school to me, was bitten on the top of the foot, while barefoot, by either a land moccasin or a spread-head adder (the children were so excited that they were not sure which). The reptile held on so hard that the girl had to kick to get it loose. She was about three miles from Pointer's. She was taken in a wagon and hurried there as rapidly as possible. The stone was applied to her foot, which was very much inflamed and swollen. In a day or two she was back to school again.

About the time that the war broke out, J. Scott, whose land adjoined that of my father, had a negro man bitten in his own yard by a strange dog that had all the symptoms of hydrophobia. The man was applied to Pointer's, and the stone was applied. He is still living, and has had no symptoms of hydrophobia, though no one doubts that the dog that bit him had rabies.

Joseph Younger, of Person county, a farmer and iron moulder, a leading member of the Baptist church, and for many years county treasurer, told me that many years ago, when the madstone was in the possession of Joseph Pointer's father, a man living near him was bitten by a spider, became delirious, and seemed about to die, but was cured by applying the madstone. This was vouched for by R. A. C. Mason.

Mr. Younger told me that John Bennett, Sr., for many years sheriff of Person county, and once a member of the legislature, told him that he knew of a team of four horses, all of which were bitten by a rabid dog. The old man Pointer objected to applying the madstone to any but a human creature; but he was finally persuaded to apply it to the wound of one favorite horse. The horse thus treated never showed any ill effects of the bite, while all the other horses that were bitten had rabies and died or were killed.

I have been told by four men, all of whom I have known from youth, and whom I believe to be trustworthy, have told me that last summer a cow and a colt were bitten by a rabid dog. Both had rabies and died. The same dog, on the same day, bit two negro boys. One of them, when he was taken to Pointer's house, was very sick. His jaws were set, and he was foaming at the mouth. The madstone was applied, and the boy was well in a day or two. The other boy was not so sick, and after having the madstone applied he never experienced any ill effects from the bite.

These are only a few of the cases I have heard of where persons were thus cured by the madstone. Joseph Pointer died not long ago, and his effects were sold on December 17, 1879, and I suppose the madstone was sold. If it was not, it is likely to be sold next court, which will be in March or April.

Imprisoned by Snow.

There was a thrilling adventure in Berk's county, Pa., recently, in which one of the Hungarian emigrants who not long ago landed at Castle Garden, New York, came near dying in a horrible manner. Ninety of the Hungarians were sent into the Blue mountains, near Lehighville, Berks county, to chop wood. Among them was a tall, black-bearded man, named Adolph Hintzky, very strong and of admirable physique—a circumstance to which he owes his life. The party live in rude shanties in the woods, but Hintzky, who was anxious to learn the English language, left his companions and took boarding in the hut of a charcoal-burner named Marks. On a Thursday morning he shouldered his axe, and went to his work alone, taking his dinner with him. He did not return at night, nor was anything seen of him for several days. But neither his companions nor Marks seemed to have troubled themselves about him, and no search was made for him. Three days afterward a hunter who was chasing a rabbit found Hintzky pinned to the ground under a tree which he had been chopping and which had fallen before he expected it and caught him. A projecting rock by his side received the weight of the tree and saved him from being crushed to death, but he was held so fast that he could move only one arm and could do nothing to extricate himself. The hunter was obliged to leave him there and go to Marks' cabin, two miles distant, to summon help, before Hintzky could be released; which was only done at last by chopping away the tree. Hintzky, when rescued, was dumb and speechless, and nearly dead. His ears, nose and one hand were frozen, and he was covered with snow. He was taken to Marks' place, where vigorous treatment soon brought him round, and he was able to tell his story. He said a sudden gust of wind had blown the tree over on him and the fall knocked him senseless. When he came to, he was wet and cold and his limbs were numb. It began to snow, and with his free hand he managed to cover his ears, and then put that hand in his pocket. He lay in that position from some time on Tuesday until Thursday afternoon, with nothing to eat or drink, and with the hope of succor growing fainter every hour. He was found just in time, for in his enfeebled condition the intense cold of Thursday night would have certainly frozen him to death.

When Capt. Godfrey, of Nevada City, walks in an ordinary manner over ground to be prospected, he is seized with a strange sensation accompanied by dizziness and sickness whenever he reaches a point beneath which rests quartz or gravel gold; and his indications are said to be reliable.

An Eye-Witness' Account of the Tay Bridge Horror.

So little is known about the terrible railroad disaster in Scotland that the following account of an eye-witness published in the London *Telegraph*, will be read with more than usual interest.

Enjoying the cosy comforts of my own parlor fireside on Sunday night, I listened to the fierce clamor of the storm without and felt a deep sense of gratitude for the security of my own dwelling for the poor sailors on the sea battling with the storm. The children had gathered round me for their usual Bible stories, and with an instinctive sense of fear they nestled close to my side as they heard the wild efforts of the blast to batter in the casement of the window. I chose the story of St. Paul's shipwreck on the island of Melita, thinking that the stern without might help me to impress upon their young minds the terrible nature of the dangers to which the Apostles were exposed as the ship lay riding helplessly upon the waves with four anchors between it and certain destruction. While thus engaged a blast of wind, more furious than before, had caught the chimney-tops of a house almost opposite my parlor windows, and brought them down to the ground with a thundering crash that startled every one of us to our feet. Stepping over the casement I gazed out upon the street, and just then a blaze of moonlight lighted up the broad expanse of the Tay down below, and the long, white sinuous line of the Tay bridge came into view. I looked at my watch and saw that it was exactly seven o'clock. "The Edinburgh train will be due immediately," I exclaimed to my wife; "come and let us watch to see if it will attempt to cross on such a night." So saying we turned down the gas in the parlor and prepared to await the coming of the train. The light by this time had become most fitful. Great masses of clouds were sweeping across the expanse of the heavens, at times totally obscuring the light of the full moon. "There she comes," cried one of the children, and at that moment, the slowly moving lights of the Edinburgh train could be distinctly seen rounding the curve at Wornet, and passing the signal box at the south side, entered upon the long straight line of that portion of the bridge. The train once on the bridge seemed to move along with greater swiftness, and when the engine entered the tunnel-like cloisters of the great girders my little girl excitedly described the effect of the lights as seen through the lattice-work when she exclaimed, "Look, papa, isn't that like lightning?" All this takes some time to write down, but to the eye it seemed as if almost simultaneously with the entrance of the train upon the bridge, a comet-like burst of fiery sparks sprang out as if forcibly ejected from the darkness from the engine. In a long visible train the streak of fire was seen till quenched in the water below. Then there was absolute darkness on the bridge. A silence fell upon our eager group at the window. Then, with stunning force the idea broke upon my mind. "Heavens!" I cried, "I fear the train is over the bridge!" With a growing horror I watched the curve at the north side to try if I could see the train pass at that point, but as several minutes passed and no moving object broke the continuity of the bridge at that point I snatched up my hat and hurried down and across the Magdalen Green, to meet several individuals all bent upon the same errand as myself.

The Value of Worn Gold Coins.

Inquiries are daily made at the United States mint as to the least current weight at which the government will receive gold coins at their nominal value. Under the fourteenth section of the coinage act of 1873, it is provided "that gold coins reduced in weight by natural abrasion not more than one-half of one per centum below the standard weight, after a period of circulation of twenty years, and a proportionate rate for a less period, shall be received at their nominal value at the United States treasury and its offices." The following statement exhibits the standard weight and least current weight of gold coins after a circulation of twenty years, and at which least current weight they are receivable in payment of debts to the United States:

| | Standard Weight in Grains. | Least Current Weight in Grains. |
|--------------------|----------------------------|---------------------------------|
| Double-eagle..... | 516 | 513.42 |
| Eagle..... | 258 | 256.71 |
| Half-eagle..... | 129 | 128.36 |
| Three dollar..... | 77.4 | 77.02 |
| Quarter-eagle..... | 64.5 | 64.18 |
| Dollar..... | 25.8 | 25.67 |

The legal deviation from the standard weight of the gold dollar being one-quarter of a grain, it will continue current until reduced in weight below 25 55-100 grains. All double eagles which have not been artificially reduced in weight will be found within the limits of natural abrasion allowed by law. The same rule will apply to eagles coined since 1845, half-eagles coined since 1855, and quarter-eagles coined since 1860.

The double eagle should continue current for fifty years from the date of coinage; the eagle for thirty-five years; the half-eagle for twenty years; and the three-dollar piece and quarter-eagle at least fifteen years. The deviation from standard weight of one-quarter of a grain allowed by law in the coinage of the gold dollar exceeds the legal limit of wear by nearly one-eighth of a grain. All pieces of this denomination coined since 1860 will be found within the legal tolerance, if not fraudulently reduced in weight.

These periods are estimated for coins when they constitute a part of the circulating medium, or are frequently transferred in treasury and customs transactions. In this country, as in England, there is no "least current weight" for silver coins fixed by law or treasury regulations. The natural abrasion of silver coin is not so great as generally supposed. It is expected that fully fifty years will elapse before the coins issued under laws passed within the last five years will need renovation. Careful observation and experiments in this country show the average loss from natural abrasion of the whole body of silver currency, when in actual circulation, to be about one per cent. In twelve years, the smallest coins, quarter-dollars and dimes, showing a greater percentage of loss than half-dollars or dollars.

The Cunard steamers carry small tin cases the size of an orange, full of a chemical preparation which ignites the moment it touches the water. When a man falls overboard in the night they throw one over, and the man is supposed to swim to it, enabling the boats to pick him up.