

PEARLS OF THOUGHT.

Hope is a dream of those who are awake.

Friendship is woven fast by interwoven benefits.

If there is anything better than to be loved, it is loving.

Anger causes us often to condemn in one what we approve of in another.

The kind wife who has a smile for her husband when he comes into the house will not drive him to a saloon to get one.

Men are guided less by conscience than by glory; and yet the shortest way to glory is to be guided by conscience.

The prejudices of men and their failure to understand each other are the principal causes of their bitterness and ill-temper.

Many of our cares are but a morbid way of looking at our privileges. We let our blessings get moldy, and then call them curses.

Though avarice will preserve a man from being needlessly poor, it generally makes him too timorous to be wealthy.

There are braying men in the world, as well as braying asses; for what is loud and senseless talking, any other than a way of braying?

The good things of life are not to be had singly, but come to us with a mixture; like a schoolboy's holiday, with a task affixed to the tail of it.

Usually the greatest boasters are the smallest workers. The deep rivers pay a larger tribute to the sea than shallow brooks, and yet empty themselves with less noise.

Lightning Rods.

A letter to the New York Journal of Commerce and the editorial reply impels us to make a few remarks upon a subject of great interest to underwriters, namely, lightning rods. The writer of the letter desires to know the proper method of putting up lightning rods, the proper size and material of rods, the proper distance between points, and how deep in the ground the rod should go. At the annual meeting of the Northwestern association in 1877 a paper on this subject was prepared by Professor Haskins, superintendent of the Northwestern Telegraph company, and published with the proceedings of the association. It attracted considerable attention at the time, more particularly from the statement that nine-tenths of all the rods in the country were not only no protection, but were a positive danger to the buildings they were supposed to protect. To quote his own words:

No philosophical apparatus has been more thoroughly misunderstood and misapplied than the lightning rod. Nothing promises more and performs less; the men who make them; those who put them up and the victims who pay for them, all alike are dealing with what they do not understand; and the purchaser, especially, is putting his faith in an arrangement that fails him frequently when danger is high. More still, the rod, in its faulty application, kindles the fire it was introduced to prevent, and actually assists in the destruction of the property it was intended to protect.

The professor sums up briefly the requisites for protection. The best rod is copper, and is seven times as good as iron. Make the joints perfect. Don't try to insulate it, because you can't, and only injure the rod by trying. Nail the rod solid to the house. The rod will protect, when elevated above the roof, a circle whose radius is the height of the rod above the building. Don't invest in gold or platinum points. Tinned copper is as good as any. Carry your rods down to permanent moisture. Otherwise they are worse than useless, positively dangerous.—Weekly Underwriter.

Why Ostriches Eat Stones.

An ostrich's digestion is aided by stones or pebbles, which the bird puts into its stomach to grind the food it has eaten. This habit is brought out by the following narrative told in Forest and Stream, of a visitor's experience, while at an ostrich farm in South Africa:

The first familiarity one of them ventures to take is to make a snap at our neck. We give him a slap and stand back.

"Oh! he's only after your breast-pin," says the farmer; "I forgot to tell you to keep your jewelry out of sight."

This is easily removed, but the inquisitive bird makes a peck at the top button of my coat, and when I find at last that he does not seem to be very strong in the beak, and that this is not his weapon of offence, I let him continue the operation.

If we ask why these birds have a passion for buttons and studs, and bright things generally, including jack-knives, the farmer replies that they are in the habit of eating pebbles and stones to help digestion by the trituration of food.

The harder the stone the better, and it is probable they associate brightness with hardness.

WOMEN AS PHYSICIANS.

Results so Far—The "Experiment" a Success—Interesting Statements by Lady Physicians.

Though the actions of various legislatures has shown that the dominant sex is not prepared to give women the equality of suffrage, the equal extension of women's prerogatives and employments during the last thirty years is enough to make the departed advocates of old-time conservatism turn in their graves. The change is specially marked in medical circles. Not very long ago a female physician was only heard of in the ranks of quackery and jugglery, classed with fortune-tellers and other humbugs. The address of Dr. Rachel Bodley, a Cincinnati by birth, at the twenty-ninth commencement of the Women's Medical College of Pennsylvania, of which she is dean, has unusual interest. The institution has 244 living graduates, from 189 of whom letters have been received in answer to inquiries. Of those replying, all but twenty-three are in active practice; 150 report that they are accorded due social and professional recognition, and only seven the contrary. Seventy-six tell how much they are making: twenty-four between \$1,000 and \$2,000 per annum; twenty between \$2,000 and \$3,000; ten between \$3,000 and \$4,000; five between \$4,000 and \$5,000; three between \$5,000 and \$15,000; four from \$15,000 to \$20,000; and ten less than \$1,000. The average is \$2,907.30. Sixty-one answer the question, "What influence has the study and practice of medicine upon your domestic relation as wife and mother?" Fifty-two are married, and of these forty-five report "favorable," six "not entirely favorable," and one "unfavorable." The author adds:

Returning to the answers of married women, because these possess the greater general interest, I remark that the song of domestic life, as I have listened with ear and heart, has been sung in no minor key. In the melody are a few discordant notes. For example, a thoroughly conscientious mother writes from her nursery, where three quite young children claim the mother's ministry: "The study of medicine is of great benefit, but the practice often interferes with my duty to my family." The clear, pure quality of the replies, as a whole, is truly exhilarating, for example: "Purifying and ennobling. Married a physician since I began practice. Am the mother of a boy eight years of age." Another: "I keep house and care for husband and three children as I would if not in practice." Another: "I have not been less a wife or mother. My duties as such have never been neglected. At times I may have been more taxed than if I had not these duties to attend to." Another wife and mother, whose successful training of three children, now in adult life, entitles her to an opinion: "I think if the history of the families of woman physicians were written it would be found that their children are well cared for, well trained, well educated; all this and household duties not neglected. * * * Women who study medicine are watchful and careful." Another: "As a wife my duties have never been interfered with; as a mother I have been incalculably benefited. * * * My husband is also a physician. I am often enabled to assist him with his cases, both in diagnosis and treatment, and I often find his advice of great value to me. We are, mutually, a help to each other."

On the whole Dr. Bodley is highly encouraged. She calls attention to the small number of deaths among the graduates—thirty-two out of 276 in thirty years—as a refutation of the idea that the female constitution cannot sustain the wear and tear of medical practice, and dilates upon the usefulness of the graduates among their sex at home and in foreign mission fields, and sums up by declaring that the inherent vitality of the cause is in no manner more thoroughly demonstrated than in the fact that as workers fall or sleep new toilers arise, the ranks close solidly up, and the work with accelerated strength moves on. She has certainly made a good showing for the institution with which she is connected.—Cincinnati Gazette.

Lobster Spearing in Canada.

This sport is pursued in the Indian fashion by torchlight. A dark, calm night and a falling tide are the first requisites, and the crew of the canoe must consist of three—one to row, one to hold the torch so that its light will fall through the shallow water and light up the bottom to show the lobsters crouched among the seaweed; and last, but not least, the spearer, armed with a long wooden spear, which it requires considerable skill and practice to drive down so that the two prongs will close over the lobster's back, capturing him firmly, while leaving his body unimpaired. It is a sport both exciting and picturesque, as the boat creeps along under the shadow of the bank, and the torch casts a Rembrandtish light on the occupants and on the overhanging trees. The captive lobsters sometimes make very unpleasant occupants of a boat, and it requires great equanimity to feel them crawling about one's feet.

SCIENTIFIC SCRAPS.

A new, worm-like parasite of pork has been discovered by a Berlin microscopist. The organism is found crawling among the muscular fibers, sometimes moving very actively.

A scientist in the Magazine of Pharmacy asserts that the usual physico-chemical methods of determining the potable nature of water have proved themselves to be quite insufficient, and he says that "recourse must be had to the microscope and to the culture-glasses used by physiologists in their inoculation experiments before any really sound and valuable knowledge can be gained by the examination of waters," as to their purity or impurity.

In a brief review of a paper on the sanatology of odors, by Dr. John S. Linsley, the Scientific American wisely remarks that, in view of the uncertainty touching the occurrence and action of ozone in the air, it may be prudent to wait awhile before admitting ozone to be quite so powerful a factor of individual or national genius, health, or social development as Dr. Linsley and others would have us to believe.

M. Milne Edwards, in commenting on the results of the deep sea dredgings in the Caribbean sea and the Gulf of Mexico, concludes that a comparison of the abyssal and the littoral animals seems to lay before us two distinct faunas belonging to different epochs and climates. The animals of the shore deposits belong to higher types. Those of the great depths have a more ancient character, some of them presenting affinities with the fossils of the secondary epoch, and others recalling the larval state of certain recent species.

In the new edition of his work on the coal fields of Great Britain, Professor Hull states that the South Wales coal field, after that of the Valley of the Clyde, is the largest in Great Britain, and contains vertical strata of more than 10,000 feet. Of this total depth only 120 feet are coal. As the lowest coal bed must have at one time been exposed to air and water for the growth of the plants which formed the coal in their decay, the South Wales coal field testifies to a subsidence of the earth sufficient to have brought some of the highest Alps to the sea level. It is only, however, to a depth of 4,000 feet that, having regard to the increased heat of the earth as we descend, coal can be won; but even with this limitation the supply left in the veins of the district is sufficient to supply consumption at its present rate for 1,800 years.

Neglected Muscle.

Because thousands of spectators flock to the boat races, ball matches and other athletic diversions that a few spirited fellows indulge in every holiday, there is a general impression that muscle is held in high esteem by the present generation. The truth is, that for every man who takes part in the games there are a score of spectators who never willingly indulge in any exercise more violent than that of cigarette smoking, and among the remainder there are not many who can see that athletic sport is good for anything unless it enables a man to outdo somebody else and get his name into the newspapers. The idea of cultivating and maintaining muscle because it deserves good treatment and because it richly repays its owner for all that is done, is one that seldom gets into the American mind. Most of our men of good physique have either their parents or their daily work to thank for it; not anything that they themselves have intentionally done for the purpose of securing a sound body. It is not the easiest thing in the world to obtain general physical training, for gymnasiums are few and men competent to manage them are fewer; but any man can devise some exercise for unused muscles that will be a great improvement on nothing. Merely to swing the arms, bend the back or go through the motions of fencing or boxing for a quarter of an hour every day would make any listless young fellow far better company to himself than ever before, and it might prevent him being so much of a bore to other people as listless fellows usually are.—New York Herald.

Force of Habit.

It is stated that there is one regiment in the Russian army made up entirely of American commercial drummers. While fighting in Central Asia they met one tribe that still clings to the old Chinese method of fighting by beating gongs. The regiment was on the run when the gong corps came on the field. The result was a terrible surprise to the Chinese. The drummers had not been well led, and they hadn't heard a gong since they left America. The sudden and desperate rush they made in the direction from which the sound of gongs came was irresistible. It was such a rush as they made for hotel dining rooms. They swept all before them, turning defeat into victory. But they were awfully disappointed when they found out why the gongs were rung.—Boston Post.

POPULAR PHRASES.

How Some of Our Common Words and Phrases Originated.

"Consistency's a jewel." The origin of this quotation has been erroneously attributed to Shakespeare. It was originally used in an old Scotch ballad entitled "Jolly Robin Roughhead." The following is the verse in which the quotation occurs:

Tush! tush! My lassie, such thoughts resign! Comparisons are cruel; Fine pictures suit in frames as fine, Consistency's a jewel, For thee and me coarse clothes are best, Rude folks in homely raiment drest, Wife Joan and Goodman Robins.

"Whom the gods would destroy they first make mad." A very ancient Greek proverb. It occurs in a note on a fragment of Euripides, but is probably of much earlier date than the Attic dramatist. It is often met with translated into Latin, and may be found among the classic quotations in Webster's dictionary. In confirmation of its great antiquity, it may be observed that the passage, both Latin and Greek, reads not gods, but God or Jupiter, referring it, perhaps, to the period of a purer worship, when the Egyptian sages inculcated doctrine of the Divine Unity, and the Athenians raised altars to the unknown God.

"Bankrupt."—Few words have so remarkable a history as this. The money-changers of Italy had, it is said, benches or stalls in the Bourse or exchange in former times. At these they conducted their ordinary business. When any of them fell back in the world and became insolvent his bench was broken, and the name broken bench, or banco rotto was given to him. When the word was first adopted into English it was nearer the Italian name than it now is, being bankrupt instead of bankrupt.

"Bust."—This word Visconti traces to the place of Bustum, for burning dead bodies, which was soon transferred to the numberless images there set up.

"Blackmail."—In ancient times the farmers of the north of England and the south of Scotland were compelled to pay a certain rate of money, corn, cattle or other things to certain men who were allied to the robbers, to be by them protected from pillage, which was called blackmail. "Black" denoted the low coin in which it was paid; or, in the moral sense, the illegality of the payment. Rent received in silver, and for a legal purpose, was called white money and white rent. In the United States this word has come into general use as a term applied to persons who extort money from threats of accusation or exposure of some alleged offense.

"Uncle Sam."—The name originated from Samuel Wilson, a beef-inspector at Troy, N. Y., during the Revolutionary war. He was very popular with the men in his employ, and was always called Uncle Sam. The boxes of provisions were shipped to a contractor named Elbert Anderson, and were marked "E. A. U. S." A joking workman was asked what these letters stood for, to which he replied he did not know, unless it was Elbert Anderson and Uncle Sam. The joke took, and afterward packages marked U. S. were said to belong to Uncle Sam.

"Selah."—Derived from the Hebrew word selah, to repose, to be silent. It is, however, a word of doubtful meaning, occurring very frequently in the Psalms; by some supposed to signify silence or a pause in the musical performance of the song; by others, to indicate special attention to the subject.

"Dry Wine."—That in which the saccharine matter and fermentation are so exactly balanced that they neutralize each other, and no sweetness is perceptible. It means opposed to sweet wine, in which the saccharine matter is in excess.

"Skedaddle."—This word may be easily traced to a Greek origin. The Greek verb (rendered in Roman letters) skedannumi, of which the root is skeda, is used freely by Thucydides, Herodotus and other Greek writers in describing the dispersion of a routed army. From the root skeda the word skedaddle is formed by simply adding the euphonic termination "dle," and doubling the d, as required by the analogy of our language in such words. An old version of the Irish New Testament contains the passage: "For it is written, I will smite the shepherd, and the sheep of the flock shall be scedaddol."

"Molly Maguire."—Some fifty odd years or more ago a poor old woman in Ireland had her house pulled down over her head by her landlord. Her name was Molly Maguire, and she died of exposure and grief. Her sons and neighbors therefore formed themselves into a society, and called it the "Molly Maguires," and vowed and took fierce vengeance upon unoffending landlords generally. The band increased rapidly, and Irish miners brought the name to America.

The czar's new home, the chateau of Gatchina, is a paradise for a hunter. A part of the wood belonging to it is consecrated to bear-hunting, and is actually hedged around, the bear being as much protected as if he were a fox or a pheasant in England.

TOPICS OF THE DAY.

The census of 1881 in England reveals the startling fact that a decrease in the population of rural parishes in the west of the country is going on with a rapidity which threatens almost entire depopulation. Towns are becoming villages and villages hamlets, while hamlets are passing out of existence.

Within a few years the exportation of apples from this country to France has enormously increased. It is now said that a considerable part of this useful product comes back in the form of Normandy cider and light claret. Late frosts are reported to have injured the French apple crop, and of course this country will be expected to supply the deficiency in accordance with its usual custom of providing for the world's wants.

The number of artesian wells in New York city steadily and rapidly increases, something like forty having been sunk during the past year. Their depths range from 200 to 2,000 feet, and the flow ranges from 1,000 to 2,000 barrels a day. These wells are used mainly by brewers and other large manufacturers who require a large amount of water, and who find the artesian well water economical both from its cheapness and its coolness, which enables them to dispense with much ice. Usually the wells are vertical. In one instance seven holes were drilled in different directions and at different angles, only one being vertical. The boring was carried to a depth of about 260 feet on the average, the longest at an angle being 457 feet deep. Water was struck in all the borings, and an abundant supply has been obtained continuously.

There is always satisfaction in seeing a man of science avoid technicalities and come right down to good old Anglo-Saxon speech. And while so many scatter-brained impostors are endeavoring to scare people into the belief that the planets are going to wreck the world during this year of grace, there is solid comfort in the following letter written by Professor Young, of Princeton, N. J., to a Nebraska inquirer: "Dear Sir—It is true that Saturn, Jupiter and Venus are near conjunction and T. near its perihelion. But they have no influence whatever of any sort on the earth. The nonsense talked about the matter is worthy of the dark ages. Two tomcats fighting in the streets of Pekin will disturb the world more than all imaginable planetary conjunctions. Yours, C. A. Young." That letter ought to keep many a good half-dollar out of the pockets of peripatetic philosophers who are going about the country lecturing to the credulous and ignorant people.

The troubles of the unfortunate and persecuted Count Von Arnim, the German diplomatist, are ended at last. His death is announced at Nice, France. At the conclusion of the Franco-Prussian war in 1870-1, he was appointed an ambassador to arrange the final terms of peace. In that connection he was accused of having betrayed the interests of his government, offending his emperor and insulting Bismarck, for which he was tried by the high court of Germany, found guilty and sentenced to five years' exile. Count Von Arnim was fifty-six years of age. He was a member of one of the oldest and most esteemed families of Prussia. In private life he was highly thought of, being polished and courteous, and ranking high in literary and philosophical circles. He was twice married, his second wife being the sister of one of the richest grandees of the Uckermark, the Count Arnim Boytzenburg. He leaves one son, who is a lieutenant in the second Dragoon guards.

In his recent lecture at the national fishing exhibition in Norwich, England, Professor Huxley said a great many interesting things about that prolific and valuable friend of man, the herring. He described this fish as occupying a place in natural history almost unique in itself, which still to a certain extent puzzles biologists. Practical men may have little difficulty in determining whether a given fish is a herring or not; but scientific zoologists, looking a little deeper, have not always succeeded in drawing a hard and fast line between the herring, the sprat, the shad and the pilchard. One thing is certain, that, by whatever name the fish is called, the numbers on the English coast are enormous, and so long as climatic conditions remain the same, the supply is practically inexhaustible. Calculating by the evidence of fishermen, a "shoal" of herring may contain more than 500,000,000 fish, and as many shoals are observed year after year, not only on the English coasts, but on those adjacent, the number of good herrings in any one year must be reckoned by billions.

It is discouraging to learn that of all the essays submitted to the judges who were appointed to award the international prize of two thousand marks, offered by the Empress Augusta of Austria, for the best work on diphtheria, not one contained any new fact with re-

gard to the origin, nature or treatment of the disease, and that the prize was, therefore, not awarded. A new offer is now made to the medical profession throughout the world, for "experimental researches into the cause of diphtheria, accompanied by essays upon the practical deductions to be derived from those investigations." The committee will give the decision upon the works offered in this new competition upon September 30, 1882. The money value of the prize will, of course, furnish no inducement to learned and skillful men to prosecute this inquiry, but the hope of doing a great service to humanity, and the fame which would follow a valuable contribution to the meager knowledge of this scourge ought to insure important results from the competition.

The surgeons of the marine hospital service are now confining their examinations as to color blindness to men desiring to enter the pilot service of the country. All the pilots of steam vessels in the United States were examined last year before their licenses were granted them. The theory then and now entertained by the treasury department, under whose direction these examinations are made, that color blindness was hereditary, promises to change a belief that it may also be acquired. The department bases its first theory on expert testimony. It is asked to change it by experts. In his address before the board of supervising inspectors of the steamboat inspection service, not long ago, Dr. B. Joy Jeffries, of Boston, said: "Color blindness, beside being congenital and hereditary, may be acquired. It is a symptom of some diseases of the brain and the optic nerve. Men, after any exhausting disease, like typhoid fever, should be tested before again resuming their duties. The necessity of periodic examinations, for instance, with pilots, as often as they are relicensed, is thus readily understood. This is quite aside from the necessity of testing their visual power, which may have decreased from many causes during the preceding year. Injuries about the head, such as sailors and railroad employes are particularly subject to, may cause diminished color perception. Alcohol and tobacco produce a deterioration of the vision and color sense." The treasury department has not yet accepted this theory. It considers steamboat travelers safe, so far as pilots are concerned, when the latter have been proven possessed of perfect color sense by one examination.

Minor Trials of this Life.

- Trying to recollect the store you left your umbrella in.
- Losing penknife.
- Losing cane.
- First greasy spot on pantaloons.
- Shirt buttons found wanting on cold morning.
- Mosquitoes.
- Flies.
- Bugs.
- Uncut books and magazines.
- Getting shaved.
- Full barber shop when you are in a hurry to be shaved.
- House hunting.
- Piano practice in next room.
- Accordion, flute, violin, next room.
- Newspaper with five supplements.
- Trying to interest girl who wants the other man.
- Hand organs.
- Trying to talk to an "Oh, dear!" "Oh, my!" and "Oh, isn't that nice!" girl.
- Trying to save money.
- Remembering what a fool you made of yourself when tight last night.
- Reading your own love letters when it was very bad and you were not expected to recover.
- Tumbling upstairs.
- Tumbling downstairs.
- Conundrums.
- Puns.
- Rickety chairs.
- Leathery steak.
- Old bill against you forgotten.
- Toothache.
- Trying to write home because it's your duty.
- Atmosphere of stove-heated railroad cars in winter.
- Cold feet.
- Making a purchase at one shop and seeing the article marked fifty per cent. cheaper at the next.
- Having your ash-box stolen.—New York Graphic.
- Sleigh Bells—How Made.
- It has no doubt been a mystery to many how the iron ball inside of sleigh bells got there, and it is said to have taken considerable thought on the part of the discoverer before the idea struck him. In making sleigh bells the iron ball is put inside a sand core, just the shape of the inside of the bell. Then a mold is made just the shape of the outside of the bell. This sand core, with the jinglet inside, is placed in the mold of the outside, and the melted metal is poured in, which fills up the space between the core and the mold. The hot metal burns the core so that it can be all shaken out, leaving the ball within the shell. Ball valves, swivel joints, and many other articles are cast in the same manner.