



SCIENTIFIC SCRAPS.

An aseptic barber shop has been started in Baltimore, where all objects that touch the face have been sterilized.

Asiatic cholera was first supposed to have originated from the consumption of uncooked rice, and was called the "rice disease."

There are several varieties of fish that cannot swim. In every instance they are deep sea dwellers, and crawl about the rocks, using their tails and fins as legs.

Experiments with locomotives on the Wheeling and Lake Erie railroad show that a slight addition of graphite to the oil used for lubricating purposes promotes economy.

It has recently been claimed that iron ships fitted with electric plants suffer rapid deterioration of their pipes having direct connection with the sea, due to electrolytic action.

It is said that every thread of a spider's web is made up of about five thousand separate fibres. If a pound of this thread were required it would occupy 28,000 spiders a full year to furnish it.

A case of leprosy in its worst form has been discovered in London. No hospital or home for incurables will take the patient in and no means of isolating him from contact with other persons has been found yet.

According to a German publication, a chemist of that country has prepared a fluid that has the power when injected into the tissue of a plant, near its roots, of anesthetizing the plant—not destroying it, but temporarily suspending its vitality.

Recent investigations by Dr. Linden-Kohl have shown that the principal source of the gulf stream is not the Florida channel, but the region between and beside the islands of the West Indies. At Baniun the volume of this warm water is sixty times as great as the combined volume of all the rivers in the world at their mouths.

Recent developments in train lighting with the storage battery as an important adjunct warrant the belief that the electric light will at no distant day be universally used for illuminating day and sleeping coaches on all steam railroads. Not only is this true of the United States, but one of the largest railway companies in England is already equipping fifty of its day coaches with dynamo and storage batteries of a system which has been successfully tested for some months past.

Food in an Egyptian Village. "An Artist Among the Fellaheen" is the title of an article in the Century, written and illustrated by R. Talbot Kelly, the English artist. Mr. Kelly says of his daily food in a typical Egyptian village:

We rise early, and a cup of coffee is always offered, sometimes accompanied by a piece of bread, or a small cake made of flour mixed with honey or oil. Somewhere about midday, if we are within reach, some light food, such as boiled eggs, bread, and coffee, is sent to us. In many cases the eggs are boiled hard, shelled, and served in a large bowl of oil, and the meal has the added interest of the endeavor to catch the slippery morsels as they bob about in the liquid. The taste for oil or semma (clarified butter) is one that must be acquired; both are frequently more or less rancid, and are liberally mixed with almost everything you eat.

At night, from 6 to 8 p. m., the only meal of the day is prepared. It is almost always the same. This consists of a little very greasy soup, to which is added semma, stewed or boiled mutton, or goat's flesh, on a pyramid of rice, and the ceremonial dish of riz bil laban (boiled rice and milk). This last is always good, and in most cases is the only thing eatable. Pigeons and turkeys from a peasant variety when offered; but few hosts give one the choice, a "lamb or kid of the flock," being considered a more "honorable" dish, and demanded by one's position.

As Many Kinds of Turtle as Fish. Did you know that there were turtles of so many kinds that it required the mind of a naturalist to remember their names? And did you know that out of all these, only two varieties were convertible into savory soup? They are the Chelonia Mydas and a variety of terrapin.

They are caught mainly in the Gulf of Mexico. The desirable weight for a turtle is from 110 to 140 pounds. It is a delicate being and requires tenderest care or it will inconspicuously die before being cooked. At the same time by an almost feminine contradictoriness, it is very tenacious of life, and while it may perish of a chilly breeze it is quite likely to refuse to die for twelve or fifteen hours after having its head chopped off.

The turtle which provides soup for aldermanic banquets and that which provides combs for aldermanic wives are not the same brand. The latter is the hawk's-bill turtle.

The common turtle is the only amphibious animal whose contentment is proverbial, but whose brain is so small that it can't be taught a single trick.—New York Journal.

Happy Family of Bees and Rattlers. While out hunting recently Claus Ahlf found a colony of bees hidden in the crevice of a huge rock, and, on opening the cavity, discovered snugly coiled in the same apartment five rattlesnakes, two of which measured four feet ten inches in length and nine and a half inches around the bodies. The half of oil rendered from the rattlers Mr. Ahlf thinks more profitable than both honey and bees taken from the rocks.—Oceanside (Cal.) Blade.

Verdict of the Quaker. Mrs. Elizabeth Cady Stanton tells an amusing incident which occurred to her at a meeting of a Society of Friends at Farmington.

Pursuant to a request she delivered an address upon the political equality of the sexes. She was eloquent, and when she closed she expected a speech in opposition or else in comment upon her own. To her surprise, no one stirred. At the end of an hour a dignified old Quaker rose to his feet, looked about the assemblage and then said, with great deliberation: "What I think is this, if a hen wants to crow, why let her crow."

The Shades That Go. In dress goods brown will, it is expected, be much worn. The shades range from bright tobacco to castor and the slightly grayish tea colors.

There are also bright golden tints and those with a strong hint of pink. A brown cloth gown of light weight, with touches of yellow or pale rose at the throat and in the hat would be a safe purchase for those contemplating a southern trip.

Black is coming more and more to the front. Black is also in immense favor, and black cloth skirts, it is predicted by those who know, take the place of the black satin and brocade skirts, with separate waists, of last season. Gray, blue and lilac, also a pale green, will reign as favorites.

The Fashionable Petticoat. The silk petticoat of this season is a multitude of silk frills, tucks, insertions, appliques, quilting, ruchings and cascades. It is as wonderful as a Florentine mosaic, and as bewilderingly pretty as the tints and the petals of a full blown rose.

For street wear it should in color carry out some shade of trimming in the dress, and if it be in light tones, such as apple green, turquoise blue or rose pink, a lattice work applique of beige black velvet ribbon is effective above a narrow flounce.

This applique also prevents the dress skirt from rubbing the silk into holes. A silk petticoat should not be too long. A petticoat that touches the ground is not considered smart. It should, for walking, be quite three or four inches above the street.

Lace trimmed petticoats, except in summer, are out of place out of doors. For house wear many women prefer delicate lawn petticoats to silk ones. Chemise and petticoat in one are very pretty and much in demand by women of too ample outlines.

Pleasures of a Princess. The tuft hunting heiress may take a gloomy pleasure in hearing something about the Princess Clementine of Belgium, who, it is said, is engaged to her cousin, Prince Albert Leopold Clement Maria Meinrod, heir to the Belgium throne, who is touring in this country.

The princess is 28 years old—five years older than the prince—and as she is the daughter of the king she has less fun and liberty than the poorest peasant girl. Her pleasures, works and studies are laid out for her and she is obliged to follow them like a school girl. She rises at 6.30 winter and summer, whether she likes it or not. At 7 she attends mass with the queen in the palace chapel.

After breakfast she goes for a walk or a drive, always accompanied by a lady-in-waiting. While at home with the queen she does not even have the privilege of selecting her own hats and gowns or receiving her special friends.

At the court balls she is not allowed to dance alone with one partner, joining in the quadrilles only. But when the poor princess has the good fortune to travel with the king she has perfect freedom and makes up for the petty tyrannies of home life. The king is exceedingly fond of his youngest daughter, and they take little journeys to Paris and Holland occasionally, like two very jolly comrades.—New York Commercial Advertiser.

Stories of Seven Queens. One day the queen of Servia, while playing at Biarritz, missed a valuable portion of her jewels. A few days later an advertisement appeared in the local papers to the effect that if the jewelry were returned to the queen she would present it to the poor of Biarritz.

Two days after she received her lost or stolen jewels by post, accompanied by a sheet of coarse paper, on which was scrawled in printed characters: "I shall be curious to see if a queen can keep her word." The queen did keep her word and presented the restored trinkets to the sisters of charity, who immediately organized a lottery, which was eagerly subscribed to by the visitors and residents of Biarritz, and the treasure was won by a poor little seamstress.

Queen Amelia of Portugal, who is considered the most beautiful and the best dressed royal personage in all Europe, while driving in the environs of Lisbon recently, heard a cry for assistance coming from a neighboring wood. She went to see what was the matter and found that a wood cutter had been injured by a branch of a falling tree. Queen Amelia, who has

MAKING THE STAR-SPANGLED BANNER.

HOW PRETTY MAIDS AND OLD SALT SEA DOGS WORK UPON THE GLORIOUS EMBLEM.

It is an excellent time to talk about flags, particularly the American flag—the finest of them all. It takes an incredible number of them to supply the annual demands of the nation.

Nobody knows how many are made. There is one firm in Elizabeth street, says the New York World, that manufactures more than 150,000,000 each year, and there are scores of other makers in this country. From which it may be inferred that there are half a dozen flags made annually for each man, woman and child in the United States.

Of course the majority of these flags are little affairs three inches long and two inches wide, which sell for twenty-seven cents a gross. They are printed on muslin and are turned out by the million. Cheap muslin flags are made six feet long and forty inches wide.

The good flags, those made of bunting, sewed together, and with carefully arranged stars, are manufactured by flag-making firms and by every sail and awning maker in the country.

The most interesting place where flags are made is Building No. 7 in the Brooklyn Navy-Yard. There every flag used in the United States navy is made. There are the various United States flags, signal flags, pennants, ensigns, flags of high officials, from the President of the United States down, and the flags of forty-three foreign nations. Wherefore it will be seen that the flag outfit of a United States warship is pretty extensive.

Just now the workers under James Crimmins, master flagmaker, are very busy. Nowhere are flags so carefully made. Every star, stripe, bar and device is measured to geometrical accuracy, and each flag must stand a strength test. They are being turned out at the rate of 100 a week.

turesque workers. They are two old sailors, and expert sailmakers. It is their business to put on the finishing touches—the rings, the tape that adds strength, and many other things. They wear a white canvas uniform, use the queer sailmakers' thimble and talk in a fascinating sea jargon.

Directly the flags are finished they must be measured. Triangles, squares and stars of polished brass mark off the floor. If also the best, may be really the cheapest.



CUTTING OUT STARS. inch or two out of the way it is rejected. The width of an American ensign must be ten-nineteenths of its length. The largest flag made at the Navy Yard is thirty-six feet long and nineteen feet wide.

The foreign flags give the greatest trouble. Some of the designs are extremely intricate and the colors are as



PRETTY GIRLS WHO MAKE THE STARS AND STRIPES.

The hunting is made in Massachusetts. It is entirely of wool and of the best quality. It must have so many threads and a fixed tensile strength. The colors must be fast.

The stripes are cut out just as clothing is cut, in many layers at a time, by means of a circular knife that is kept as sharp as a razor. Then they are sent to the sewing-room, where skillful young women sew the stripes together and place the blue field in place.

The stars are cut out thirty at a time by means of a cold chisel and a big iron-bound mallet. Folds of goods, smoothly woven, of a standard grade, are laid in yard lengths, thirty thicknesses together, on a large square block made of cubes of oak, put together with the grain running in different directions. A metal star, used as a model, is placed on the muslin and carefully marked around with a lead pencil. Then the workman places his chisel on the pencil line



AN OLD SALT MAKING THE NAVAL MILITIA FLAG.

and drives it through. A few blows and a constellation of thirty snowy stars are released.

The sewing of the stars upon the blue field is very exacting work. There are ninety stars on each flag, forty-five on either side, and they are put on so evenly and carefully that when the flag is held up to the light there appears to be but one star. The stitching is wonderfully even and dainty.

The flagmakers are the most pic-

Joseph's coat. At one time these designs were painted, but they didn't last. Now the color is cut out by itself and sewed in place. It requires expert needlewomen to do this work.

One of the most difficult flags to make is that of China. It is triangular in shape, a brilliant yellow, with a black, open-mouthed dragon crawling about. One of the most beautiful flags is that of the President of the United States. It has the coat-of-arms of the nation on a blue field, surrounded with stars. The eagle is white, and the shield he holds is properly colored.

There has been a deal of dispute over the evolution of the American flag. When the Revolutionary War broke out the flags used by the colonists were English ensigns, bearing the Union Jack, upon which were written "Liberty and Union" or other similar expressions. Then were developed the Pine-Tree flag, the Rattlesnake flag and many others.

The American ensign was adopted in 1777 by the Continental Congress. There is a dispute as to the significance of the flag. The explanation accepted as the most probable is that the blue field is intended to represent the night of affliction that in 1777 surrounded the thirteen States, which were typified by the white stars arranged in a circle, signifying the endless duration of the new Nation, while the stripes were chosen out of compliment to New York and the Dutch Republic, and were a compliment to Republican principles.

The number of stripes symbolized the thirteen States, the first and third, both red, representing New Hampshire and Georgia respectively. General Washington was a member of the committee appointed to design a flag. Mrs. John Ross, of Philadelphia, made the first flag. She designed the five-pointed star.

John Paul Jones put the new flag to the first public use. He ran it up to the masthead of the Ranger. The flag, strangely enough, had but twelve stars, probably due to a blunder. Jones had the same flag on the Bon Homme Richard.

Of course everybody knows that each star in the flag represents a State, and that for two years the ensign had fifteen stripes, the additional one representing Vermont and Kentucky. The flag has been unchanged, save for the adding of stars, since 1818.

AGRICULTURAL TOPICS.

Buying Cheap Fertilizers.

There is no longer much desire among well-informed farmers to get the lowest priced fertilizers with the idea that these are therefore the cheapest. It is impossible to cheat nature. All the elements of fertility, mineral or nitrogenous, cost money, and if little money is given for fertilizers, we can expect but little good to the crop from them. When we take into account that much of the expense of commercial fertilizers consists in the cost of distributing them evenly through the soil, it will be seen that the highest priced, if also the best, may be really the cheapest.

Weak and Crippled Chicks.

Often, from various causes, the young chicks are weak or deformed, and we are puzzled to know just what to do with them. From past experience, I, for my part, think it far better to at once kill all such. They, in most cases, die anyway after a few days, and are worthless even should they live.

The deformity, as a rule, is inherited, the egg germ being weak, and from such it is impossible to get strong fowls.

The thrifty chicks will hatch about the nineteenth or twentieth day, and will be ready to leave the nest on the evening of the twenty-first. It will give them a better chance if all cripples are disposed of at once.—W. H. Cambron, in Farm and Home.

Old Farm Wagons.

No really good farming is possible without good wagons. An old, broken-down wagon, with tires always likely to come loose and axles or wheels sure to break whenever any unusual strain comes upon either, is perhaps the most expensive piece of property a farmer can have on his farm. But the old, worn-out wheels need not be thrown aside if all else is. If the spokes are cut down and a new tire put around, the wheel will last a long time on a truck wagon to be used only on the farm. This is much better than trying to patch up the old wagon for going on the road to market, and often paying each year twenty-five per cent. of what a new wagon would cost. The cheapness of iron enables wagon makers to sell the best wagons more cheaply than ever before. There is not much reduction in the cost of repairing, as the chief labor in repairing old wagons is the factor.—Boston Cultivator.

Spraying With Kerosene Emulsion.

Kerosene emulsion is one of the most valuable insecticides we have and as it may be easily made and applied, its use should be general on the farm and well understood. It is made by dissolving one-half pound of common hard soap in one gallon of boiling water. Remove from the fire while boiling and add two gallons of kerosene, converting the mixture into an emulsion by passing it through a force pump with a spray nozzle back into the same vessel, continuing the operation until it appears like thick cream, and the oil does not rise to the surface.

Used to kill the common insects during the growing season, the emulsion is diluted one part to ten of water, the dilution being greater when the insects are small. Used on animals the dilution is one part of emulsion to eight or ten of water. It must be applied thoroughly, as it is effective only when it comes in direct contact with the insect. A spray pump is the only proper method of applying the emulsion, and the finer the spray the more effective it will be. Many plants and young trees could be saved from scale and other insect enemies if this simple remedy was applied in time, and in this age of numerous and annoying as well as dangerous insect enemies, the farmer or fruit-grower who goes without a spraying outfit is running a risk he can ill afford.

The San Jose Scale.

The Agricultural Department has just issued a bulletin on the San Jose scale in 1896-97, prepared by Entomologist L. O. Howard. It is of much interest at this time because of the recent edict of the German Government prohibiting the importation of living plants, fruits, etc., because of the alleged discovery of the scale on peas shipped from California. The present bulletin is supplemental to one on the same subject published in January, 1896, which contained a history of the eastern occurrences of the insect down to December, 1895.

Never, it is said, in the history of economic entomology in the United States has a single species of insect excited so much interest as the San Jose scale. In the light of what we know, the bulletin says, our actual knowledge of the distribution of the scale in the East in the fall of 1895 was comparatively slight. It was then reported as occurring in the twenty States, but in comparatively few localities in each, with the single exception of New Jersey. In 1896-97 actual field inspection in Virginia, Maryland, Illinois, Ohio, Georgia and several others showed that in these States the insect was nearly as widespread as in New Jersey, while twelve States and the District of Columbia have been added to the number containing infested points.

The pest also was found in lower Ontario in 1897, and the Dominion Government is considering the question of legislation on the subject. A list of fifty-five fruit and shade trees and ornamental shrubs affected by the pest is given. Considerable space is devoted to a discussion of the remedies suggested to kill the pest.

The Seoul Independent says that a recent census of Korea shows a population of 5,198,248, of whom 2,829,707 are males and 2,328,481 females.