

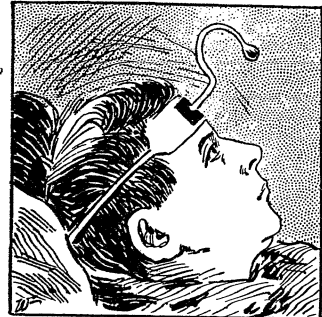
SCIENCE AND INVENTION.

MACHINE-MADE HYPNOTISM.

Clever Mechanical Devices That Will Produce Sleep.

It has long been recognized by experts in hypnotism that the hypnotic sleep is induced by the subject himself. All that the operator can do is to persuade the patient that he has ability to produce the sleep. Any mechanical device that will cause the belief that sleep is inevitably approaching will do as well, and a number of these are now in use by physicians who resort to hypnotic suggestion in the treatment of nervous affections. Some of them are described in the Technical World Magazine by John Elfrith Watkins. We read:

"One of the newest of these mechanical aids employed by the hyp-



A Machine for Inducing Hypnotism. The Little Knob Claims and Holds the Subject's Attention.

notist is the 'hypnotic ball.' It might be mistaken for the half hour of an hour-glass mounted upon a short handle of ebony. It is, in fact, a glass ball, half-filled with sand, and having a bottle-mouth, into which the wooden handle fits snugly. Stuck into the interior extremity of this handle—the end protruding inside the ball—is a pin, whose head extends to the center of the transparent globe. The sand is dyed a bright indigo blue, as is the globular head of the pin. Thus we have a little ball—the pinhead—with a larger transparent one, and between the two, a bright colored powder.

"The subject concentrates his eyes upon the pinhead, while the ball, held at about the height of his head, is revolved by the operator with both a circular and rotary motion within a foot of the subject's eyes. The rotary manipulations cause the sand to fall like a cascade behind the pinhead.

"Thus there are three movements—circular, rotary, and vertical—all intended to puzzle vision as it inquisitively follows the ball.

"In this way the ocular muscles become quickly fatigued, the influence being an exaggeration of the soporific stimulus caused by the rapid flight of the landscape past a car window, or the rapid change of environment viewed from a rapidly moving swing. That which fatigues the ocular muscles, of course, favors sleep, and physiological drowsiness is but the vestibule to the hypnotic state. The eyelids becoming heavy, the skilled hypnotologist has but to command 'Sleep!' and the sensitive is then ready to abide by his will."

Other mechanical aids are: The 'electro-hypnotic head-band'—a rubber band, clasped about the forehead,

holding a tiny incandescent light between the eyes; a bright disk, illuminated by a miniature search-light; and mirrors, revolved by electric or mechanical motors, and known as 'alouettes,' some with single, others with multiple, disks, while still others have wings like those of a bird, or geometrical solids with mirrored surfaces. A single alouette may hypnotize an entire roomful of persons at once, provided all have previously received the suggestion that the machine will cause sleep—a condition necessary to the success of all mechanical aids. Another device, the 'vibrating coronet' of Dr. Gaiffe, consists of three metal bands which encircle the head and support branches that vibrate against the eyelids. Some hypnotists, we are told, employ a large drawing of a human eye, on a card, while others use a combination of magnets, relying on the common idea that magnetism is connected in some way with the hypnotic sleep. It may often be necessary to employ makeshifts in case none of these devices is at hand. Says Mr. Watkins:

"A candle placed behind an ordinary brown or colored bottle is sometimes used in lieu of a hypnotic lamp. The candle flame focuses itself at a spot on the side of the bottle nearest the patient, who has been given the suggestion that sleep will result when, after staring fixedly at this spot, the light will go out. The candle, cut short for the purpose, burns itself out, and the sensitive consequently falls asleep when there is no longer a vestige of light in the room."

DEVICE FOR THE INVALID.

Chair Which Instantly Can Be Transformed Into a Rocker.

To instantly change a rocking chair into a wheeling or invalid chair is made possible by the recent invention of a California man. An ordinary rocker is employed, a pair of rubber-tired wheels being journaled close to the center of the rockers. When the



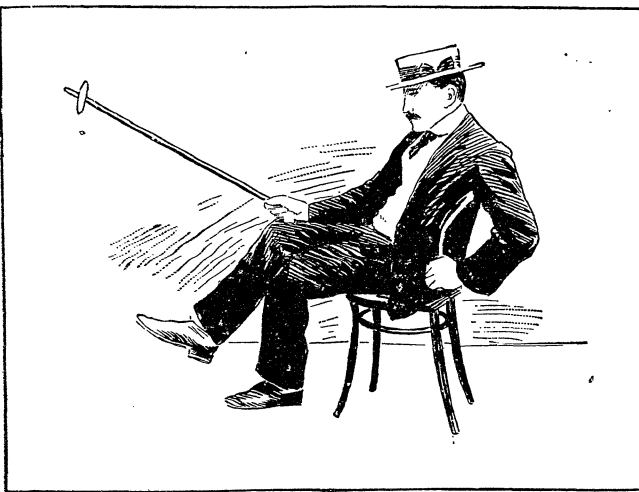
The Wheeled Rocker.

device is used as a wheeling chair a rod attached to the framework is hooked to the axle of the wheels. To transform to a rocking chair the lever is released and the end hooked to the framework. Those who are entrusted with the care of invalids will instantly appreciate the usefulness of this combined chair. The invalid will also recognize the advantages of this simple device.

A Genuine "Trouble" Line.

To avoid a personal conference the Shah has had a telephone line built from his palace to the public square for the use of subjects having grievances to present. When he gets enough troubles for one day he gives the "busy" signal. The czar might profitably employ a few thousand miles of wire in the same way.

A NOVEL FORM OF TELESCOPE.



Comfort While Using the Unilens.

A novel form of field-glass or telescope of a remarkably portable and handy description, has been invented by Major Baden-Powell, F. R. A. S.

It consists of a single convex lens, 2 1/2 inches in diameter, mounted in a metal rim, and may be carried in the waistcoat pocket. The mount has a small clip and screw, enabling the lens to be attached to a walking-stick or umbrella.

The invention is thoroughly practical, and with it a large view of distant objects may be obtained, the maximum magnification being about four diameters.

The "unilens" is the most efficient when mounted on a walking-stick and held at arm's length, as the further it is held from the eye the greater the magnification.

With the arm fully extended, which is roughly equal to a distance of six feet between the eye and lens, the object has its maximum magnification, though at this distance there is a slight blurring.

The best way to use the "unilens" is to sit down and rest the hand holding the stick on the knee, when the glass is about four feet distant from the eye, and the user is able to see objects clearly and sharply.

The lens has the great advantage of always being in focus and it is a useful aid to the natural sight in the examination of hanging pictures, the architectural features of buildings, and similar objects. Although the appliance is not suited to all sights, three people out of every four can use the "unilens" quite satisfactorily, and with good results.



PURELY FEMININE

CHILDREN AT TABLE

NEVER TOO YOUNG TO BE TAUGHT MANNERS.

With the First Meal Taken with the Elders Attention Should Be Paid to the Little Graces of Good Breeding.

As soon as a baby is old enough to take its first meal at the table with grown people attention should be paid to its manners. Precisely why instinctively we seem always to do the wrong thing until taught better I do not know, unless it is on the basis of the perverseness of human nature.

The fact remains, however, that unless a baby is taught differently it will shovel up food in a most distressing manner and fill its little mouth too full at every bite. Infants seem also to have a positive talent for holding fork or spoon in the wrong way, and all these things, apparently trivial, must be corrected by mothers.

To think that a baby is too young to be shown the proper amount of food that a fork should hold is the greatest mistake, because the little one will continue in the way it begins.

Each one of us has been appalled or disgusted at the bad table manners of the children of some of our friends, but it is not too much to say that such are entirely the result of indifference or ignorance on the part of parents and reflects upon them accordingly.

Only such quantity as may be comfortably put into the mouth should be taken on the fork at a time, and two bites from the same forkful is the height of bad manners, small boys and girls should learn. Attention

should be given to the way this implement is held, for the instinctive method seems to be to grasp it at the head of the tines. A child should be taught at once that the clasp must be well toward the end of the handle, and thus eating will be a simpler process for little children, especially if the fork is not large.

There is no excuse for a little boy or girl taking soup from a spoon so full as to be dripping while raised. I know some grown persons have this habit that one cannot help calling disgusting, because it is pigish, but a spoon should never be more than moderately full and the liquid should be taken from the side, not from the tip.

Comparatively few children are taught how to drink in a well-mannered way. Instead of the cup being allowed to go into the mouth to the corners the little one should learn to take small mouthfuls of the liquid, and the lips will be less covered with it when the cup is taken down. "Milk mustaches" should be as reprehensible for children as for grown persons.

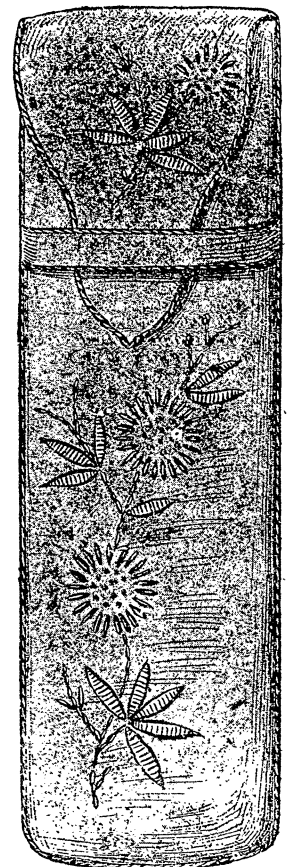
Being just a healthy little animal by nature, a child regards a napkin in the light of foolishness, and will use it only when the arts of civilization are being inculcated. This, however, is one it should learn, for remnants of food left on the mouth render the sweetest child unattractive.

The child is always more or less of a mimic, and in nothing will this show more positively than in its table manners. If those at the table with it eat in slovenly fashion so will he or she, but unfortunately the reverse does not work without aid. A good example alone in the matter of eating is not enough for little children. Prompting also is necessary, but it will more quickly acquire attractive ways and be less of a young animal at its food if the teaching is reinforced by example.—Baltimore American.

CASE FOR THE SPECTACLES.

Makes Pretty Present for Elderly Member of the Family.

Here is a suggestion for a very useful present to give an elderly lady. It may be made of kid, suede or silk, and



is embroidered with silk in long satin and cording stitches. The case may be made the size shown, or a little smaller to fit the glasses they are intended to hold. Cut two pieces of card, one for the back and one for front; cut one piece of silk for the lining; cut one piece of silk for the cover, allowing turnings all round, and one for the back, which must have the turn-over tab cut on for the top; a piece of silk for lining each must also be cut; work the pieces for the front and the tab with the embroidery design as shown; place a thin layer of wadding over the card for front, then stretch the embroidery over it, line with silk and stitch neatly together at edge; put the silk and lining over the card for back in same way, but put an interlining of linen in the tab to make it firm; make a strap of silk one-third high wide and stretch across the front, then sew the back and front together neatly at the edges. Finish all round either with the finest silk cord or very coarse embroidery silk.

Worthiness in Humble Guise.

Massinger: Look on the poor with gentle eyes, for in such habits often angels desire aims.

FICHUS OF OLD LACE.

Grandmother's Treasures Can Be Turned to Good Account.

Apropos of embroidered muslins, a veritable raid is being made on genuine old world scraps for the tiny revers facings on spring cloth and the later summer linen coats.

The secret of reproducing the frailness and also the color imparted by age to these scraps has not been discovered; consequently, when procurable they lend an air of covetable exclusiveness. Since those large embroidered or lace-decked handkerchiefs in vogue during the early part of the nineteenth century are absolutely useless in their original capacity, by reason of their size, there is no particular sacrifice in cutting a hole in the center to form a yoke or collar application for a lingerie blouse.

In deft hands these treasures can be induced to present the most fascinating aspects, a hint that will probably induce many readers to a further rummage among their treasure drawers in quest of such dainty pieces long lying idle, lacking inspiration for their service.

Smart Traveling Costume.

It is never so difficult to look well dressed as when traveling, whether by land or sea, and the woman who can appear neatly gowned at the end of a long journey deserves the highest praise.

If taking an extended land trip across the continent or embarking upon the ocean voyage, which may be anywhere from five days to two weeks, depending upon whether the direct or the southern route is planned, there must be due time and consideration given to the selecting of traveling costumes.

Dark colors are always best, whether on the car or on board a steamer, and such shades as do not readily show the dust should be chosen. For this season the separate waist should be of the same color as the skirt rather than white. Dark blue is always an excellent shade for traveling, but there are many women to whom brown is more becoming and this is equally good.

TWO GOOD BLOUSES.



The waist on the left is the much-liked Peter Pan, which sprung into favor last summer. The design is ideal for outing or athletic blouses and just the thing for heavy linen.

The other came later and is sure to be immensely popular this summer for wash silks and lavans. The little plaatings down each side of front and around collar and cuffs add greatly to the chicness.

Is the Sailors' Friend.

Sixty thousand sailors look to H. A. Hanbury for advice and for protection. Mr. Hanbury is the United States shipping commissioner for the port of New York. He is the sailors' judge and jury. The men who sign on foreign craft now must appear before him for their papers instead of going to the consuls of the various countries. He decides all disputed questions between the men and their sailing masters. Many of the abuses of these men that formerly were common, such as compelling them to buy their outfits from the ship owners or captains, have been done away with under Mr. Hanbury's rule. His office is on the Battery park, New York, where he easily can reach all the ships leaving that port.

INSURANCE INVESTMENTS.

How 'One Company's Assets Are Distributed in the South and West.

In connection with its withdrawal from Texas, along with many other companies, rather than to submit to the new law which requires that 75% of the reserves on Texas policies shall be invested in securities of that state, which securities shall be deposited in the state and subjected to heavy taxation, in addition to the large tax now imposed on life insurance premiums, the Equitable Life Assurance Society has made public the distribution of its assets, at the end of the second year of the new management. The Equitable now has \$10,958,000 invested in Texas, which is twice as much as the new law requires, but the management decided that to submit to the additional taxation would be an injustice to its policyholders in other states, which impose no such penalty on the thrift of their citizens.

The Equitable's report shows that more than 37% of its total reserves are now invested in the southern and western states, while only 35% of its total insurance is carried in these states. Its investments are distributed as follows: Ala., \$3,099,000; Ariz., \$974,000; Ark., \$4,038,000; Cal., \$5,142,000; Col., \$5,222,000; Fla., \$4,924,000; Ga., \$4,048,000; Idaho, \$5,197,000; Ill., \$12,617,000; Ind. Ter., \$443,000; Ind., \$6,836,000; Iowa, \$3,690,000; Kansas, \$11,637,000; Ky., \$2,631,000; La., \$3,054,000; Md., \$2,207,000; Mich., \$6,009,000; Minn., \$2,065,000; Miss., \$767,000; Mo., \$3,197,000; Mont., \$1,890,000; Neb., \$7,528,000; Nev., \$640,000; New Mex., \$1,376,000; N. C., \$1,649,000; N. D., \$677,000; Ohio, \$11,534,000; Okla., \$1,006,000; Ore., \$1,158,000; S. C., \$975,000; S. D., \$1,305,000; Tenn., \$1,909,000; Utah, \$2,134,000; Va., \$6,592,000; Wash., \$1,202,000; W. Va., \$5,523,000; Wis., \$2,342,000; Wyo., \$3,367,000.

New Austrian Railway.

Hitherto tourists from the United States who chose the southern trip to Europe left the steamer at Gibraltar or Naples, but many, chiefly those who had already been in Italy, now come to Trieste and continue from here their voyage by the new Austrian railway. There can hardly be a more beautiful country than the regions which are made accessible by this new Transalpine railroad. The new railway is owned by the state, and is 130 miles long. There are 49 tunnels, with a total length of ten miles. There are 50 bridges, one of which, across the river Isonzo, has the longest stone span in the world. There are, besides, as many as 678 smaller bridges and viaducts.—Consular Reports.

New Automatic Rifle.

The self-loading or automatic musket is now being seriously considered as the infantry arm of the future. The equipment of the great armies of the world with an improved rifle is hardly completed when the mechanics begin work on a new weapon. At the recent examinations of the German War Academy the automatic rifle was one of the themes for discussion. The piece now on trial has a magazine holding ten cartridges; the recoil is utilized to load and cock. Consequently the soldier can remain quietly in position, never removing his eye from the target, and fire his ten shots.—New York Sun.

COFFEE COMPLEXION.

Many Ladies Have Poor Complexions from Coffee.

"Coffee caused dark colored blotches on my face and body. I had been drinking it for a long while and these blotches gradually appeared, until finally they became permanent and were about as dark as coffee itself.

"I formerly had as fine a complexion as one could ask for.

"When I became convinced that coffee was the cause of my trouble, I changed and took to using Postum Food Coffee, and as I made it well, according to directions, I liked it very much, and have since that time used it in place of coffee.

"I am thankful to say I am not nervous any more, as I was when I was drinking coffee, and my complexion is now as fair and good as it was years ago. It is very plain that coffee caused the trouble."

Most bad complexions are caused by some disturbance of the stomach and coffee is the greatest disturber of digestion known. Almost any woman can have a fair complexion if she will leave off coffee and use Postum Food Coffee and nutritious, healthy food in proper quantity. Postum furnishes certain elements from the natural grains from the field that Nature uses to rebuild the nervous system and when that is in good condition, one can depend upon a good complexion as well as a good healthy body. "There's a Reason," Read, "The Road to Wellville," in pkgs.

TO CLEAN THE KETTLE.

Pumice or Manicure Stone is the Proper Agent to Employ.

Every housewife knows what a trouble it is to get burnt kettles clean; and cleanly, fastidious women realize how almost impossible it is to have clean food on account of the slovenly way most servants "wash" kettles. When food has burnt on the bottom of kettles it will not "wash" off, but it will soak up soapuds, and grease, etc., and that dried and again soaked out and into the next food cooked in the vessel is not exactly delightful in flavor and certainly is far from healthful. The housewife who really has the good of her family at heart should insist on sanitary dish-washing as well as sanitary plumbing. How to get it? Procure a bit of pumice stone—manicure stone from a drug store is best, but a rough stone from a marble yard will do. Rub the inside of all kettles and trying pans thoroughly with it; then wash, and they will be perfectly clean, and it will take less time to make them so than usually is spent in scraping, which according to usual methods takes off about half, and leaves half of the undesirable hardened food to be cooked up in the next dish.

HINTS ON BOILING RICE.

Nutritious and Appetizing Dish Should Be Given Care.

A hint on boiling rice: Put a tablespoonful of butter in rice while cooking. Time to cook, one hour. Take one teaspoon unbroken rice, pick out all broken grains and wash in cold water, pouring off the water several times to get rid of loose starch; Put the rice into the upper part of a granite double boiler, measure over it three cups cold water and one level teaspoon salt. Set the boiler with rice and cold water directly over the hottest part of the range, having a good fire, so that it may boil quickly, stirring the rice every few minutes to keep it from sticking to the bottom and burning. Let the rice boil rapidly for 15 or 20 minutes or until the water is about to be absorbed, then stir in one tablespoonful rounding of good butter and set the pot in lower half of double boiler, with enough boiling water in it so it will not spatter on the range. Set where the water will keep boiling for another 20 minutes. The rice will be white, puffy and each grain separate. It will taste good, for all the nutriment is in it, and everybody will ask for more.

To Clean Choice China.

Have made to order at any broom-maker's a set of brooms about ten inches in length and five inches in circumference. These brooms should be made just like a whisk broom, but perfectly round. Hot water can be used, as with a little care in handling dishes it is not necessary to put the hands in the water—the greatest recommendation for the use of the brooms. They will slip inside cups, glasses and pitchers; will rub off stains, and sticky substances easily, and are particularly fine for greasy pans and pots. Keep three brooms in use; one for glasses, one for dishes and silver, and one for kettles and frying pans, promoting them from one class to another as they become worn. The old brooms are excellent for cleaning sinks, closets, and garbage pails. After using, pour boiling water over them, shake, and hang up to dry. They will keep sweet and clean longer than any dish mop.

Try This Meat Pie.

A new meat pie appeared on a certain dinner table the other night which staggered even the man of the house, who is past authority on epicurean dishes. As a rule, in that household the meat pie is made of left overs from former meals, but this one contained an entirely unknown filling. Not until a piece of green meat was discovered did the truth begin to dawn. Some weeks before, in a raid on a wholesale grocery of which he was the entree, he discovered some canned Mexican turtle meat, had several tins sent home and speedily forgot them. But his wife, in looking over the assortment, accumulated from similar trips, discovered them, and the pie was the result of her quandary as to the use to put them to. Turtle never served a tastier purpose, according to the guests at the table that night.

Meat Pie with Tomatoes.

Use about a pound of meat, left from a roast, or fresh meat (beef is best); cut in chunks and boil until tender; season with salt and pepper. Boil meat down until enough broth is left to moisten meat well; thicken with flour as for stew. One-half hour before meat is done put in a good-sized onion, sliced. Cook one-half can of tomatoes seasoned with salt, butter, and a pinch of red pepper. Put meat in two quart basin, then the tomatoes. Have ready a rich biscuit crust made of one and one-half small coffee cups of flour, one heaping teaspoon baking powder mixed well with flour, one heaping tablespoon of shortening and a good pinch of salt. Moisten with milk into a soft dough as for biscuits. Place crust on top of mixture. Prick crust several times with a fork to let steam out while baking.

Dress for Little Girl.

You can make over your old lace embroidery shirt waists for your little girl even if they are open in front. Take your pattern and lay on the waist and cut. You will be surprised to see how nicely it will make up. They will look nice worn with jumper skirts.