

HEALTH

"ARTHRITIS DEFORMANS."

This is the name of a chronic disease of the joints, which is more frequent in women than in men, and generally declares itself between the ages of thirty-five and fifty-five.

It was at one time supposed to be closely related to rheumatism or gout, but this belief is no longer held, although the disease is perhaps more likely to overtake people with a family history of gout. It is pretty generally conceded to be of nervous origin, and its symptoms are undoubtedly increased by anything which tends to lower the general health, such as exposure, damp dwellings, poor hygienic surroundings, improper diet, and especially worry and exhaustion.

The chronic form of arthritis deformans, which is the form under consideration at present, is most insidious in its beginnings, often attacking one joint only, but gradually spreading to nearly every joint in the body.

One peculiar characteristic of this complaint is the symmetrical way in which it makes its attacks. If, for example, the middle finger of one hand is the first to suffer, the middle finger of the other hand will come next. Each joint as it is attacked becomes the seat of much pain, tenderness on pressure, and swelling, and there is likely to be more or less rise of temperature.

The progress of the disease is not steady, there being long seasons of apparent cessation when, although the point deformity persists, all the other symptoms cease. These periods of relief may last for weeks or months, and have been known to last for years.

Although arthritis deformans is recognized as an incurable disorder, it does not directly threaten life itself, and many sufferers from it live to extreme old age. The mischief done to the joints during the acute stage, in the form of swelling, muscular contractions and atrophy, is in direct ratio to the length of the attack, and treatment therefore becomes of great importance.

The inflamed joints should be kept at rest. Such exercise as they receive should be with the direct purpose of preventing contractions and deformities, and should take the form of gentle and skillful massage, when the case is home. Great restriction of diet is unwise, as patients suffering from this disease are already below par, and need every advantage of nutrition. The patients do best in a warm, dry climate, and in good weather should be outdoors as much as possible.

Treatment by baths helps some cases, but that is a matter for the physician to determine. In home treatment, relief of pain may be gained by hot fomentations of the immersion of the joint in water as hot as can be borne.—Youth's Companion.

THE DANGEROUS FEATHER BED.

Few people seem to know the reason why medical science condemns the use of feather beds.

It is because feather beds are highly hygroscopic—a rather formidable word, but one meaning simply that feathers readily absorb and condense moisture. The body constantly throwing off waste matter through the skin and the lungs. The feathers in the bed will absorb this waste matter as readily as it will simply atmospheric moisture. The feathers retain the waste matter during the day when the bed is cold—even when it is aired, unless also warmed by sunshine during the time it is exposed to the air.

At night, when the body of the sleeper warms the bed, the feathers renew their hygroscopic action, and throw off the waste matter absorbed the night before. The susceptible body of the sleeper is soon surrounded by a dense and highly poisonous atmosphere, the accumulative effect of which cannot help but be very injurious.

The skin, like the lungs, is continually breathing, and is very sensitive to external influences. Hence arises the need for air baths as well as for water baths. The entire body should be exposed to fresh air every day for as long a time as you can make possible, and all beds should be very thoroughly ventilated.

SPIDER BITES.

The question whether the bite of a spider can have serious effects on the human system having been again raised, the French scientific journal, La Nature, replies, through a physician, that spider bites are not dangerous. Nevertheless, the doctor says that in some rare cases the bite of a spider may produce inflammation to require local treatment. The best plan is to wash the bitten place with pure water, and, if practicable, apply a little antiseptic lotion. In the vast majority of cases the bite even of a large spider causes nothing more than a slight local irritation.

PHONE WITHOUT WIRES

WONDERFUL METHOD OF SPEECH TRANSMISSION.

Wireless 'Phone Will be Invaluable in Factories and Business Houses.

Wireless telephony is the latest development of science. At Nuremberg, Germany, Herr Wirth has perfected an invention which he claims is capable of accomplishing the steering of dirigible balloons by wireless means. Writing in London, The Daily Mail, T. Thorne Baker says:—It is equally within the bounds of possibility to equip military airships with wireless telephones, day by day the weight of the apparatus—that vital factor—is being diminished, and who can tell how soon it will be made sufficient light to render possible telephonic communication with those who navigate the sky?

TESTS BETWEEN BATTLESHIPS

One great value of wireless telephony lies in the fact that an inexperienced man can talk by telephone, while a trained operator is required for any form of telegraphic work. Only recently twenty-eight sets of wireless telephone apparatus were ordered by the United States Government, and tests were carried out between the battleships Connecticut and Virginia, the distances varying between ten and twenty-five miles. Every word spoken was distinctly heard, and the trials were eminently satisfactory. The enterprise of the United States Government was thus as successful as it was legitimate.

One of the most up-to-date wireless stations is at the Technical High School of Charlottetown, and experiments were recently carried out there with a portable military station fixed thirty kilometres away. Masts were used in each station about sixty feet in height, and the transmission of speech was so perfect that it was not even necessary to hold the receiver close to the ear.

ARC LAMP'S PROPERTIES.

Practically the whole of the recent advance made has been founded on the discovery of a method of producing very rapid electrical oscillations. The electric arc lamp is employed for the purpose, and it is interesting to note with what extraordinary properties this modern illuminant is endowed. Simon discovered that by having a microphone attached to a special way to the dynamo, it generates the electricity for running an arc lamp it is possible to make the lamp, while burning, repeat every word or sound spoken into the telephone.

An actual "arc lamp concert" was given at Frankfurt, at which the light was made to speak and sing almost like a human being. It was due to Duddell, three years later, however, that the present system was inaugurated, for he discovered that the arc lamp could be employed to transform an ordinary electric current into one which supplied electrical oscillations of many thousand per second, such as were essential to the successful wireless transmission of speech. Poulsen, the Danish physicist, made extraordinary progress with the system, and making the arc burn in an atmosphere of hydrogen, and using specially cooled elements, he found it possible to generate a current of electricity sending off waves half a million to the second.

SCIENTIFIC EXPLANATION.

The simplest explanation of the method of transmitting speech is as follows:—These exceedingly rapid waves are sent off by means of an antenna and the sound waves formed in speaking are utilized so to modify them that they carry the sound impression with them. The waves are sent off by means of an aerial, or mast, and thus speech is transmitted in the form of electrical waves to anyone who is waiting to receive it. The receiving station is fitted with an aerial, which collects the waves, and these are made to actuate the earpiece of a telephone. Both sending and receiving stations can be "tuned" in the manner already adopted in wireless telegraphy, so that only the person to whom the message is addressed can receive it. This is, of course, a matter of vital importance in warfare, and at present the most likely application of speech without wires will be to naval and army work and shipping.

USEFUL FOR SPECIAL WORK.

Asked as to the likelihood of wireless telephony being adopted by the postoffice, a prominent official told me that it was sure to be used at some future time for special work, though for the ordinary telephonic business it could never replace the present system, in which two wires are used, insulated from one another. But more than one portable wireless telephone is on the eve of introduction, which will prove invaluable in factories, hospitals and large business houses, where speech can be transmitted with the utmost readiness over a distance of five hundred yards or more. Even in this compact little apparatus the speaker has the power to tune his electrical voice for any particular person, so that while everyone is ready to receive it, only the individual will just speak with whom he pleases.

YOUNG FOLKS

A GIFT AND A GAME.

Lorraine and Doris Weston always thought it the best of good news when they heard that Aunt Laura was coming for a visit; and even David and Philip, the twins, who were nine years old, and small Mary, who was not quite four, knew that something pleasant was sure to happen when Aunt Laura arrived on her annual visit.

"What do you suppose it will be this time?" asked David, as they all gathered at the sitting-room windows to watch for fating who had driven down to the depot to meet Aunt Laura. "Do you suppose it will be something lovely to do, or do you guess it will be presents?"

"Both!" declared Doris, happily. "It's sure to be something we never thought of before," said Lorraine, with a little skip which meant that she could hardly wait for the good time coming.

Mary skipped, too, and gurgled happily. When Aunt Laura jumped from father's high cart and came running into the sitting-room, and hugged mamma and kissed all the children, she ran back to the porch and called to father, "Be careful of that box; there is breakable stuff in it!"

"Presents!" whispered Doris; and a little fear that it might be dolls crept into Lorraine's heart, for she was sure that she had all the dolls she wanted. But none of the children asked a question. It was happiness enough for a while just to tell Aunt Laura all that had happened since her last visit, and listen to all the things she had to tell. The winter was nearly over, and the days were growing longer, and at tea-time Aunt Laura said:

"I know of a lovely thing to do just before Mary goes to bed."

Lorraine and Doris looked at each other joyfully. The good time was beginning so promptly. "As soon as David finishes his supper," continued Aunt Laura, with her pretty smile, "I want him to go to the kitchen and Maggie will give him something. He must wear his cap and coat. What Maggie gives him he must take very carefully and walk slowly to the front gate, and wait there until we all join him."

"I've finished my supper!" declared David, leaving a round brown coat and hurrying toward the kitchen. Aunt Laura nodded, and in a minute or two said, "Now, Lorraine, you go to the kitchen, take what Maggie gives you very carefully and stand beside David at the gate. Be sure and put on your hat and coat."

One by one the children were sent to the kitchen, even little Mary trotting off quite by herself. Then Aunt Laura went down the path to the gate. And there twinkled five tiny lights from five tiny lanterns, and five eager faces turned toward her as if asking what joy would come next.

The shadows were not very deep now at six o'clock, but the tiny lights looked like dancing fireflies. "Now," said Aunt Laura, "we will hunt for the daylight. Mary shall go ahead, then Doris and Lorraine next, and the boys can walk right behind me." So the little procession filed down the path, and there from the houses of neighbors, and at these Mary would wave her lantern and say, happily, "Not daylight."

Down by the meadow bars two pheasants rose noisily and fled across the road; and when they reached the deep shadow of the big oak, then, indeed, the hunt for daylight really began. It was quite dark close to the big tree, and Aunt Laura stood all in line and told them to look toward the meadow fence, and walked in that direction.

Lorraine could not keep from skipping, and Mary, who always wanted to do what Lorraine did, skipped, too, and the small lanterns twinkled brightly.

"Aunt Laura had a package," said Philip in a whisper. "It's better than daylight!" declared David, as the third cloud of rose-colored tiny stars went toward the sky, followed by Roman candles and the red lights.

"Anyway, it was lovely," said Lorraine, with a long breath of satisfaction. Then all the tiny lanterns were swung gaily, and all the children turned away happily toward home.—Youth's Companion.

TOO NEAR.

He—"The closer a man gets to nature the happier he is."

She—"That's not what you said when you slipped on a piece of banana peel yesterday."

"Thought you said you had ploughed that ten-acre field!" said the first farmer. "No; only said I was thinking about ploughing it," said the second farmer. "Oh, I see; you've merely turned it over in your mind!"

ON THE FARM

COOLING THE CREAM.

At once on finishing the separating, begin the cooling of the cream. The calves can wait a few minutes better than can the cream. There are devices made for cooling the cream as fast as it comes from the separator. These are good and can be made of much service if kept clean, but they add to the number of utensils that have to be washed and, like the strainer, they may be dispensed with. The dairymen should provide himself with enough cans to hold the cream. A can of this kind holds from three to five gallons, is about 20 inches deep and nine inches in diameter. These cans are the best to keep the cream in at the farm. They are convenient to use and keep clean, and they present a large cooling surface, which is a great advantage in cooling cream. Set the cans or pails of cream in a tank of cold water and stir, testing the temperature with a thermometer until the cream is as cold as the water. This is imperative if success is to be obtained. As with the wiping of the cows' udders, this is a matter of a few extra minutes, but it will be a factor in deciding success or failure.

The stirring rod and the thermometer should be considered as indispensable as the crank on the separator, and yet hardly one in five hundred farmers has a thermometer that can be used for this purpose. If the can of cream is set in a tank of water and left without stirring, it will be hours before it becomes thoroughly cool. In the meantime the germs which have gotten into it in spite of the great care, have been multiplying at a tremendous rate and the cream goes to the station spoiled. At the temperature of ordinary well water the development of the germs is very slow, and for this reason no time should be lost in cooling the cream to his temperature. The thermometer is absolutely the only means by which one can tell whether the cream is fully cooled or not.

By stirring and testing with the thermometer the task of cooling will be found to be short, and one will finish with the satisfaction of knowing that the cream is cool. It ought to be cooled down to 60 degrees F. If the water is cold enough to carry the cream lower so much the better.

One can scarcely pick up a poultry periodical that does not have some advice to people starting with poultry. Some may be good, some bad, and some indifferent. If many of the parties that write this would follow it themselves they would be better off.

To begin with any kind of business one must have an object in view. The two objects that are foremost in most people's minds are money returns and success generally. Success is only obtained by a combination of honesty, energy, printer's ink and a first-class quality of goods to back up your claims. In order to succeed you must have some ideas of your own, for no one can succeed in anything on other people's plans and ideas. One begins in the poultry business just as he would in any other kind of business—with capital and some ability. Both are needed. One may have plenty of money to carry on a business and yet have no ability necessary to succeed. Others have the ability but are minus the money. The poultry business offers a better chance to a person with ability minus the money than the man with money alone, for there are very few people who can get a start in the poultry business. A very small outlay will give one a good start if they only have the patience to wait and grow up with the business. Some of the largest and most successful poultry breeders of to-day built up from a very small start as a side line.

Poultry is the greatest industry in the world that appeals to and is handled by everyone. It is not subject to trust methods. It will pay a large interest and does not necessitate a fortune to start with. All one needs is energy, ability, thoroughbred poultry and a small patch of land. Start with an object, either eggs and fancy stock, meat and fancy or commercial poultry. The advantage of keeping thoroughbred stock is that you have two chances. They will lay more eggs even if sold for market eggs and you can advertise, sell breeding stock and eggs for hatching, and thus increase your profits. Begin to think for yourself when you begin to raise poultry. If you make a mistake find a way to avoid it and success is yours.

"I fear no foe in shining armor," sang the man at a concert. "Don't you, old chap?" concluded the bachelor in the front row. "Then you try and open a sardine tin with a pocket-knife!"

"Well," remarked a gentleman, after a long argument on the question of man's superiority over woman, "at least there is one good, sweet, and perfect thing which a man can have and a woman cannot." "Never!" cried his wife, passionately. "Never! I deny it! What do you mean?" "A wife!"

SHREDDED

Brain Fog and Tired Nerves Yield to

SHREDDED WHEAT

It is a natural food and with milk or cream and fresh fruits is an ideal diet in warm weather. BRINGS THE GLOW OF HEALTH TO WAN CKBREKS

MADE BY ALL GRINGERS

WHEAT

OUT-OF-THE-WAY PLACES

BITS OF BRITAIN WHERE FOOT OF MAN HAS NEVER TROD.

Parts of Edinburgh Castle Never Climbed—Cumberland Rocks Defy the Climber.

At first sight it may seem incredible that there can still exist, in the twentieth century, a single square yard of our islands where human beings have never set foot. Yet the fact remains that there are many such places, though, admittedly, they are small in area and, as a rule, in out-of-the-way parts of the country, says London Answers.

Oddly enough, however, one of the most notorious of these untraced spaces is actually to be found in the midst of one of our greatest cities—namely, Edinburgh. The extraordinary crag on which Edinburgh Castle stands—Stevenson called it "a Bass Rock on dry land," and spoke without exaggeration—is, in parts, unscalable. There are patches of it which have never been climbed, and never will be, without the aid of ropes. Prisoners have been known to escape the cliff, but only by circuitous routes. No human being can walk or scramble straight up it at one point opposite Princess Street.

In Cumberland there are, however, many far more striking examples of rocks which defy the climber, even when he is aided by ropes. Indeed, many experts consider certain of the Cumberland

than the highest Alps of Switzerland. George D. Abraham.

THE FAMOUS ROCK CLIMBER.

has stated that the man who can negotiate the most difficult English climbs, under all conditions of weather, could also conquer the Matterhorn.

The Eagle's Nest Arete, on the Great Gable, Cumberland, is pronounced by many to be the most hazardous climb in the world, although it is only four hundred feet high. One hundred and fifty feet of this is almost vertical and practically ledgeless, and about thirty feet above the starting point there is an overhanging "nose" of rock which has to be circum-navigated with infinite pains on a rope. No foot, obviously has ever trodden that "nose"; and even going round its side the venturesome explorer's feet are temporarily dangling in mid-air, while he hangs, metaphorically to it by his eyelashes. To right and left of him are quite wide expanses of rock which have never been traversed, and probably never will be.

The most difficult climb in Britain is said to be on Snowdon, on the "buttress" called Lliwedd, and in the Slanting Gully, which is eight hundred feet high. Half way up, the climber, according to one who has performed the feat, is "like a fly walking across a ceiling"; and of course, there is only one way up, so that on either hand there are unexplored patches of considerable extent.

In the Highlands there are 638 summits of 3,000 feet, and over, and a dozen of 4,000 feet, and over. On the mountain called Bidean-dan-Bian, overlooking Glencoe, an American expert says: "There are still a number of routes on these cliffs which offer the honor of first ascents to enterprising amateurs." That is to say,

THEY ARE STILL UNEXPLORED

British Alps have claimed their victims, too, and not always inexperienced climbers. A certain well-known Swiss mountaineer once travelled specially to Skye, apparently to prove to the Highlanders that their hill, Sgurr-nan-Gilleann, would be a mere stroll for one who had ascended the Matterhorn. The mountain took a terrible revenge on the boaster, and his mangled body was found at the foot of one of its grey precipices. Another Scottish peak, Schiehallion, has more than once witnessed accidents as serious as any which have occurred among the Alps.

The Kern Knotts Crack, in the Lake district, for long remained unclimbed, until conquered by the intrepid Owen Glynn Jones, who recommended it as a practice-place for amateurs who want to learn to climb the world-famous "Mum-mery Crack," the hardest part of

Mont Blanc, and the most nerve-racking climb in Europe. Near the Kern Crack are many small portions still unclimbed.

ROMANCE OF A BROKEN ARM.

How General Bugly Scored Against the Insurance Company.

Here is the story of a case which is puzzling many lawyers. Some time ago an agent of the Beware Accident Insurance Company called on General Bugly and implored him to have himself insured against accident.

"I don't need to be insured," said the general. "I am not exposed to danger."

"It may seem so," the persistent agent replied, "but, regardless of apparent security, accidents may befall us."

"There may be some truth in your view," said the general; and then after a few moments' reflection he added, "For several years I have been tormented with a presentiment that my left arm is to be broken."

"Very likely to happen," exclaimed the agent.

"Still," the general continued, "time passes, and the accident seems as far off now as ever."

"My dear sir," said the agent, "misfortune is ever distant until it falls upon us."

"That's a fact," the general assented. "Now, I'll make you a proposition; if you'll agree to insure my left arm I'll take out a policy."

"It is not usual, general, to insure one certain leg or arm, but I am inclined to accommodate you."

"All right. Now this is my plan: insure my left arm, and if it be broken I'll pay you five dollars a week."

The agent said he would write to the secretary of the company. He did so, telling the secretary, after explaining the proposition, that the general was one of the most peculiar men he had ever seen. The secretary, much amused, submitted the matter to the board. The board, as much amused as the secretary, accepted the proposition.

Regularly every week, during two months, the company received five dollars from the general, and then came the information that the general's left arm was broken. The local physician, employed by the company, and who was, by the way, a friend of the general's, sent in his statement to the effect that the arm was broken, and the general received instructions to draw on the company for fifty dollars each week, until his arm should be pronounced well.

Six months passed and still the general continued to draw. The secretary wrote to the physician and received the reply that the arm had not begun to mend. Six more months passed, during which time the general, patiently, even cheerfully, drew his money. The board held a special meeting, and instructed the secretary to go to the general's home and investigate the matter. The official, upon arriving, sought the company's physician.

"Is it possible," said he, "that the general's arm has not recovered?"

"It is a fact."

"Did you bandage it properly?"

"Yes; come and see for yourself."

The physician, conducting the secretary to the general's house, remarked, as they entered:—

"The general is not at home, but his arm is here. There it is, on the table. Nicely bandaged, you see. Don't understand why it does not grow together? Perhaps it is made of the wrong sort of wood."

The secretary immediately brought the general home. The general immediately brought an action. Able lawyers have been employed, and the result is anxiously awaited.

SICK-ROOM RULES.

Never whisper in an invalid's room. To most people it is intensely irritating. If you want to say anything that it is best for the patient not to hear, go into another room to say it.

Don't allow household annoyances to be spoken of in the sick-room. Only cheerful topics should be discussed.

Remember that when a person is lying on his back he is deprived of the protection of his eyelids from the light; therefore, blinds and curtains should be adjusted with this fact in view.