

PHYSICAL CULTURE

Published Monthly and Primarily Devoted to Subjects Appertaining to Health, Strength, Vitality, Muscular Development and the Care of the Body. Also to Live and Current Matters of General Interest.

VOLUME XXII

AUGUST, 1909

No. 2

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Entered as Second-class Matter at New York, N. Y., Post-Office.

PRICE, \$1 PER YEAR POSTPAID. WITH CANADIAN POSTAGE, \$1.20
WITH FOREIGN POSTAGE OUTSIDE OF CANADA, \$1.50.

BERNARR MACFADDEN, EDITOR-IN-CHIEF.

PUBLISHED BY THE PHYSICAL CULTURE PUBLISHING CO.

FLATIRON BUILDING

NEW YORK, N. Y.

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PHYSICAL CULTURE

DEVOTED TO HEALTH, STRENGTH, VITALITY, MUSCULAR DEVELOPMENT, AND THE CARE OF THE BODY

PUBLISHED BY PHYSICAL CULTURE PUBLISHING COMPANY, INC., BERNARD MACFADDEN, PRESIDENT,
S. W. HAINES, SECRETARY AND TREASURER, PLATIRON BLDG., NEW YORK CITY.

Vol. XXII.

August, 1909.

No. 2.

THE EDITOR'S VIEWPOINT

THE old-fashioned professions are everywhere overcrowded. Many men spend ten or fifteen years poring over the intricate details required to master a paying occupation, and even with the knowledge thus gained they are hardly able to make a living. They find the profession they choose overcrowded. **THE MAGNIFICENT REWARDS OF A NEW PROFESSION** Too many men are already seeking a living within its ranks. Such a state of affairs must indeed be a disappointment to hard working students.

These statements, however, apply mostly to what might be termed the old-line professions. Those who are willing to go into new fields, who are not afraid to take some risks, if they are made of the right sort of stuff, will as a rule gain satisfying rewards for the efforts they put forth. Within the physical culture profession, for instance, there are greater possibilities than even the most fantastic idealist ever dreamed of. The theories advocated by **PHYSICAL CULTURE** are just beginning to be felt throughout this entire country. You can notice this change now in the extraordinary increase in the demand for foods that we recommend. For instance, last year the manufacturers of grape juice were entirely sold out. In many localities it was impossible to secure this product. Fruit is going up in price. The demand is increasing constantly. Olive oil is becoming scarce and high in price. The value of this product is now being recognized everywhere.

Turning to the healing art, however, we find what might reasonably be regarded as a monumental revolution. The people are losing confidence in drugs. The time is not far distant when the mere name of medicine will be looked upon with distrust, and the medical men themselves, I venture to say, will have to find a more appropriate term to apply to their profession. There should be little or no implied connection between medicine and the healing art. Medicine and poison are closely related—they frequently represent one and the same thing—but poisons and health are never closely associated. They are enemies one to the other, and always will remain so.

The physical culture movement, however, offers almost boundless opportunities for capable men and women interested in the art of healing. These are not by any means confined merely to teachers and doctors, but the possibilities for business men and others, are just as great. Men who have special business ability will find, for instance, in the manufacture and sale of healthful, wholesome foods, wonderful possibilities.

Many men have already become millionaires through the manufacture and sale of appetizing and nourishing foods. For business men, however, there is perhaps no occupation which offers such quick and satisfactory results as sanatoriums conducted in accordance with the principles advocated in the natural healing art, in accordance with our theories, which we term Physcultopathy. A sanatorium established and conducted according to these methods soon effects such amazing cures that the institution quickly secures a reputation that redounds to its success. The opportunities for business men in starting institutions of this nature and conducting them with a view of giving their patrons the quickest possible results at the lowest possible price, will yield enormous profits in practically every instance.

There are many institutions at the present time that are conducted to a certain extent along this line, but in most cases they are handicapped by a hobby. They do not embrace all the various "good things" to be found in the natural healing art. They take one particular phase of it and "work" that to the limit, and totally ignore other valuable remedies to be found in natural healing. Such institutions also often attain a remarkable success notwithstanding the narrowness of their methods.

There are possibilities also for salesmen. If you were to ask just how a salesman could take up physical culture and expect to secure financial rewards, I would answer that in the sale of health-building foods, literature, etc., there will be found splendid rewards. But there is another method which a salesman can adopt which will secure wonderful returns, and that is to engage or go into partnership with a graduate of some institution of natural healing or someone especially capable in this line. The salesman could devote his time to securing patients or pupils for treatment, while the expert in the healing art could do the treating and teaching. In almost any moderate sized town a combination like this will produce splendid financial returns and at the same time will enable one to refer to pleased patrons in every instance.

Then there is the profession of physical director. Gymnasiums are now being built everywhere. They will soon be considered as necessary as public schools or libraries. They will all need instructors and for the next generation it will be difficult to supply the demand for capable physical directors. Then there is the occupation of health director, which to a certain extent includes the training of physical director, but which enters more into dietetics, hygiene, and the general care of the body from various viewpoints outside of the mere exercise of the muscular system, which by many is supposed to include the entire science of physical culture.

Though the development of the body which is sought in gymnasiums and in athletic fields is to be strongly commended, undoubtedly the most important profession of to-day is that which pertains to natural healing, as advocated in Physcultopathy. This science of healing includes all the really "good things" that are to be found in the drugless healing art. An article in this issue indicates, in a very remarkable manner, what has been accomplished recently through these particular methods. A doctor of Physcultopathy or of any of the drugless schools, if he is capable and broad-minded, will have opportunities before him in his profession that are greater than he can find in any other occupation at the present time—and remember that this profession is simply in its infancy. It has sprung up because of the fearful need for it. To be sure it is new, it is frequently misunderstood, but when one has been struggling year after year for health, when he has tried all the various medical methods and secures no relief, and then is able to secure health and strength of the highest degree through simple drugless methods, one can well understand the possibilities for this profession now and in the future.

Any occupation that has to do with the health of the people, individually or collectively, will offer possibilities that are beyond the imagination of even the wildest dreamers. Health represents a capital that is worth more than money. In the past it has been wasted, considered of but little value, but men and women are awakening. Manhood of the highest degree will soon be worth its true value. It will be preserved.

retained, cultivated, and when this period is ushered into existence, occupations which have to do with health building will everywhere secure the splendid rewards that they so richly deserve.

JOHN D. ROCKEFELLER suffered for years before he was able finally to secure health through golf playing and through the knowledge that he no doubt gained from his years of suffering as well as from his advisers. He is now a great believer in the game of golf. He has discovered the value of out-door life and he has no doubt fully learned the needlessness of medicine in the cure of disease.

It is the usual inclination of the average individual to envy these men of millions—just think of it, they can buy whatever they may desire, they can satisfy their taste in food and clothing and the comforts of life in every detail—but it is well to note that beyond food and clothing and the ordinary comforts of life, money is of but little value. It rarely secures happiness, in fact, the responsibilities that it brings often become a load on mind and soul that is destructive to health and happiness, and often to life itself.

A MILLIONAIRE SEARCHING FOR HEALTH

E. H. Harriman, the "hundred-times" millionaire, is now said to be searching for good health. He is travelling here and there, looking for the wonderful gift of health and strength which he has no doubt wasted in his struggle for power in the form of riches with which he is now so abundantly supplied. Have we any reason to envy a man in his position? He has spent his life working—no doubt night and day on many occasions—for the rewards that he finally secured. He probably paid little or no attention to his health, he knew little of health-building. His business was the making of money. Health was of but little importance to him. It was not until he reached that period in life when he realized that his health and strength were slipping away that he began to understand their value.

How many men who are not millionaires are making the same mistake? Year after year they are struggling and straining and striving with might and main, and what for? Nothing more in most cases than what might be termed pecuniary independence. They are trying to amass a fortune. They are thirsty for the power that comes with wealth and they drain their physical strength and in many cases their very life itself in the strenuous battle for riches. It is the duty of every individual to sit down and carefully compute his available capital at frequent periods in his life. Please remember, however, that there are two kinds of capital. One is measured by the amount of money you may have in the bank, or the value of your various "holdings." The other is capital in the form of health, bodily vigor, mental or physical abilities. This last form of capital is by far the most important. If we were capable of financially measuring the value of superior health, it would not doubt run into an enormous sum, and yet men are everywhere actually throwing away this priceless gift. Without health there can be no happiness, there can be little or nothing accomplished in life that is important; in fact, life is a mere miserable existence when one is compelled to struggle along day after day with depleted vitality and a weakened body.

It is the duty of every man to learn the value of superior vigor. He should conserve his physical forces, he should build up and lay aside a capital in the form of a physical reserve that will last not only three score and ten years, but even beyond this period.

You hear a great deal about cultivating the habit of saving. In various cities there are what are termed dime savings banks, organized principally for the purpose of encouraging the saving habit in those who are earning even meagre wages. That is all very commendable, but we hear very little about the value of conserving physical resources, of conserving the physical capital. In fact, we give so little attention to

these matters that the mere possession of a splendid capital in this way is quite unusual. One might say it is the first duty of our Government to develop by every means within its power the physical capital of the individual units of the nation. There is but little or nothing done with a view of accomplishing such results. It is to be hoped, however, that the time is coming when we can expect a change, when manhood and womanhood will be placed on a high pedestal, when we will struggle not so much for financial independence, but for a physical and mental capital that will forever eliminate the fear that comes when we consider the possibility of being without the price of a meal. Let us lower the dollar standard and in its place erect a standard of manhood and womanhood. Let us eliminate the money god and the awful fear with which many of his disciples are continually encompassed. Wealth has its uses. It represents a mighty power, but its importance has been exaggerated. It is really not necessary to life or health or happiness, and when we seek it with the idea that its attainment will completely fill all of life's desires, we are chasing an illusion and the awakening, when it finally comes will be severe and terrible to bear.

OUT in the State of Washington cigarettes have been barred. A recent law makes it a crime for one to sell or even to have in his possession one of these "coffin nails." This is certainly a move in the right direction. The cigarette habit is harmful to an extreme degree. It dopes the mind, lessens digestive and functional power, it destroys the manly instincts, and slowly but surely the body is poisoned by the nicotine that is absorbed when one is a slave to this habit.

THE WASHINGTON ANTI-CIGARETTE LAW

If you want to retain the instincts of superior manhood on to the very end of your days, by all means avoid the use of tobacco. The tobacco user slowly but surely loses his higher emotional instincts, the delicate sensitiveness of his nervous organism is subverted, he becomes a doped, phlegmatic dreamer. It is often said that tobacco is a solace to the nervous system. It has a quieting influence. It might also be said that morphine has a similar though a greater influence. If one can find happiness only in the parital unconsciousness that comes in its complete form with death, then tobacco will bring you one step in that direction. Tobacco cannot help to solve your problems, though it may befog your mind and thus enable you to cease troubling about them.

Tobacco is a poison to body, soul and mind. It benumbs your higher characteristics, it lessens your love for home and children and wife, it destroys your appreciation of the good things of life, and last, but not least, it destroys your manhood. While in the first flush of youth you may be able to use tobacco and still retain comparatively vigorous health, the day must come when you pay in full for your mistakes, and the price will seem high, the penalty will seem exacting, and if you insist upon poisoning your body, upon doping your nerves, with this destructive poison, you can rest assured that you will pay a high price in physical and mental efficiency for this indulgence.

THE stability of a race depends almost entirely upon its moral status. The continued prosperity and permanency of a nation depend upon the same thing. National life is built upon home-life. Home-life depends upon the strict observance of the moral law. The normal instincts of mankind are in favor of morality, and where these instincts are strong, there comes a desire within each human

SIGNS OF MODERN DEGENERACY

soul for the pleasures and responsibilities that come with the establishment of a home. When there is lax observance of the moral law, the home begins to fall. It is "shaky," and

unstable. It cannot be depended upon, it is not permanent, it is liable to fall into ruin at any moment. The moral law can rarely be strictly observed unless one's normal instincts are accurately followed. The love of one man for one woman simply indicates an attraction between them which can rightly be termed a command unto them to assume the responsibilities that come with home life and parenthood.

With the degenerate theories that are being promulgated everywhere through the influence of prudery, there are, however, many marriages that are made with the distinct intention on the part of each to take all the pleasures that come with love and marriage, and avoid all the responsibilities. Poor fools! They imagine that they can disobey the plain dictates of their higher instincts without suffering the penalty. The love of man for woman to be at all permanent must be fruitful. When efforts are made to avoid this natural result of love between the sexes, there can be but one result, and that is slow but sure destruction to the attraction that made love possible. The truth of this statement has been demonstrated in thousands of cases. Love to be at all permanent in character must be fruitful. I would like to repeat that statement again and again until it becomes a part of every struggling human soul.

Happiness that is satisfying in character is seldom seen. We are paying most terrible penalties for the sins that we are committing against the higher laws. We rush through life madly seeking diversion, pleasure, reaching out for the happiness for which we are eternally struggling. Now and then we feel that it is almost in our possession. For brief moments we are thrilled with the joys that come with it. There are times even when we feel that at last it is actually within our possession. Happiness is, however, very evasive. We think we have it—and lo, it is gone right before our very eyes! Sometimes we hardly know why or how it has disappeared, but we feel the yawning emptiness, the loneliness, as we yearn for its reappearance.

Poor, struggling human souls! What a terrible debt we are paying because of our ignorance and arrogance and willfulness and narrowness. We are supposed to be living in an age of enlightenment, but we often wallow in the mire of selfishness and discontent. Our souls are often steeped in a misery that burns like the scorching heat of a fiery furnace. We are the victims of our own mistakes, and we are often made the victims of the mistakes of others. We have lost the instincts that were such a certain guide to our savage ancestors, and now we are trying to make education, modern enlightenment, replace this certain guide. I say we are trying, but our efforts are not meeting with much success in many instances. Everywhere you can see the human wreckage that results from our misdirected efforts, that come because of the mistakes that are being made everywhere by the rich and the poor, the high and the low, by the so-called learned and the wholly ignorant. In fact, those who are termed ignorant often possess remnants of their savage instincts which have enabled them to guide their lives more successfully toward happiness than those who boast of their advancement and their learning. "A little knowledge is a dangerous thing" is a statement that has been made on numerous occasions, and its truth can be verified in the lives of thousands of men who are living under the impression that they have had every advantage of what is often termed higher education. Before progress of any importance can be made there must be a recognition of the fundamental laws that are so plainly set forth in this publication. We cannot build a house without a foundation. Should you endeavor to perform a feat of this nature, the result of your labors would be unstable and liable at any moment to become a mass of wreckage. And so it is with human life. Without knowledge of the fundamental principles upon which a human career should be founded, one actually "flounders" through life. He has no guiding stars, no mileposts to show him the way, he simply gropes along. He comes in contact with evils of all kinds, which, by the way, are in many cases painted in attractive guise. They often have a veneer of goodness. They are often alluring. They stretch out their arms and beckon to him, they welcome him frequently with a hearty handgrasp, and as he falls into the net that has been spread for him, he is frequently enmeshed, and not until he has paid for his experience with part or all of his life-blood, does he escape from its tentacles.

No, we believe in the spread of real knowledge—not in the superficial learning that comes with with polish considered essential to a degenerate age, but knowledge of life that gives stability to character, strength and virility to manhood, and brings also the unswerving principles that are essential to the individual, as well as to the up-building and permanent power of a nation. The principles that we are advocating will form a basis for a future civilization that will go onward and upward to heights hitherto considered unattainable. We are nothing but minute pigmies struggling through life, handicapped on all sides by our own mental and physical weakness, and our own defects are reflected and often intensified in those with whom we daily come in contact. May the day soon come when the scales will fall from our eyes, when a great awakening will come into every human life, when human possibilities will spread out before us with inviting brilliancy. Then hope will be intensified, then ambitions will be multiplied, then mankind may be able to see the light. You will be able to continually walk within its scintillating rays. There will then be no weakness, no mistakes; life will be one grand sweet song, for everywhere you will find men—strong, superb specimens—everywhere you will see women—splendid, beautiful to look upon. There will then be no cross, cranky specimens of human beings. They will be in the far distant, ignorant past, and we will look back upon the life in which we are struggling and suffering at the present time as a species of ignorant savagery.

Bernarr Macfadden

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Developing a Powerful Physique

The Science of Physcultism

WEIGHT-LIFTING WITHOUT WEIGHTS—THE DEVELOPMENT OF THE BODILY POWERS THROUGH PHYSCULTISM, THE SCIENCE OF ACQUIRING STRENGTH THROUGH SPINAL DEVELOPMENT

By Bernarr Macfadden

LESSON No. VII.

I HOPE that those who are following these monthly lessons have remembered the necessity for regularity. If you take the exercises, and then neglect them for several days, you can hardly expect results that will be especially valuable. Of course, it is possible to take too much exercise. One can overuse the muscles, but I think a fault of this kind is very rare. One would have to exercise several hours each day in order to take more than was really good for him. Do not forget the advice that I have frequently given to continue each movement until there is a distinct feeling of fatigue. If the use of one particular group of muscles is continued until it gives one warning in the form of fatigue, it is then sure to thoroughly secure the stimulation that comes from active use.

Where there are any especial defects, remember that those particular muscles or parts of the body that are defective should be given more attention than other parts. This is no excuse, however, for entirely neglecting even the well-developed parts. There should be harmony in all parts of the body, that is, the proportion should be symmetrical. For instance, the arms and shoulders should be of such a size as to compare favorably with the legs and hips and other parts of the body, and the same can be said of all the parts.

In the various exercises illustrated in the supplement which accompanies this issue, the muscles of the back, neck, abdomen and shoulders are brought into very active use. In fact, this lesson furnishes a fairly good all around system of exercises that will be found of especial value to those who are desirous of bringing nearly all the muscles of the body into play in a short time and with but a few movements.

Even if you are pursuing one particular class of exercises with the view of remedying some physical defect, it will be found that movements involving the muscles of the body in general, particularly those bearing a close relation to the great vital organs, will be of great value. Not only do such movements offer a useful change from exercises which call into sustained and vigorous action the muscles of one particular part, but they thus provide a change which supplies a sort of rest to the muscular system. They are also of great value in accelerating the important organs of the body in the proper performance of their functions. Do not lose sight of the fact that the value of these exercises will be greatly increased by their performance in the open air—or, at least, in such close proximity to open doors or windows as to assure you of securing absolutely untainted atmosphere.

Remember, too, that the value of these exercises will be greatly increased by a cold water bath taken afterward, or by sponging the body thoroughly with cold water, following this with a brisk rub-down.

If you are unaccustomed to exercise of a vigorous nature it is possible that more or less soreness of the muscles involved in these movements will be apparent to you after performing the exercises. However, this is by no means an unfavorable symptom, for it indicates that the muscles are being used vigorously, and you are destroying much dead tissue, which will be replaced by newer, stronger, and firmer flesh, provided that proper dietetic precautions are observed. It is far better to observe such far reaching effects from the exercises than to perform the movements in an indifferent, lackadaisical manner, and thus lose many of the possible benefits which may accrue from them.

DESCRIPTION OF EXERCISES.

Exercise Number 32 is quite plainly illustrated. It is especially devised for bringing into active use the muscles of the "small of the back." These are often termed the lifting muscles, for that is one of their special offices. In this exercise, secure an ordinary bath-towel, twist it around the hands in such a manner as to obtain a very tight grip of two corners of the towel, obliquely opposite each other, and then stand on the towel as illustrated in Figure 32, lifting up as vigorously as possible. Naturally, there is little or no movement in this exercise. It is simply an effort on your part to raise your feet off the floor by lifting vigorously. This, of course, is an impossible feat, but the effort can be made as vigorous as possible and it forms a splendid exercise for these muscles. The effort should be continued but a moment, then rest a brief period, and repeat it, continuing to lift and rest until there is a distinct feeling of fatigue in the muscles of the "small of the back," the region which is principally involved in the exercise.

Exercise Number 33 is more especially intended for the shoulders and also for the muscles of the forearm, which are used in gripping. Grasp the right wrist tightly with the left hand, as shown in the illustration. Now raise the left arm from the body, outward to the side as far as possible, resisting the movement slightly with the left hand. Return to normal position and repeat until there is a distinct feeling of fatigue on the outer side of the shoulder, which is the especial group of muscles used in this particular exercise. Continue the same exercise with the position of the hands reversed, that is, with the right hand gripping the left wrist. Be sure to grip the wrist very tightly in each case in taking this exercise, for the special purpose of developing the muscles of the forearm.

Exercise Number 34 might to a certain extent be termed relaxing in character. Place the head far over to the right until it is nearly resting on the right shoulder. Now, relax the muscles of the neck very thoroughly, and then, grasping the head with the right hand, try to pull the head still further towards the right. Be sure to keep the muscles relaxed as much as

possible during the exercise, as this is especially important in order to secure its full benefit. It stretches the spinal column and very materially stimulates spinal activity. The exercise should, of course, be continued until there is a slight feeling of fatigue, and then the same movement should be taken with the head far to the left, using the left arm instead of the right as previously described.

Exercise Number 35. Place the right hand on the back of the head and the back of the closed left hand in the "small of the back." Now from a slightly forward position bring the head back as far as you can, and also bend back as far as you can, pushing forward towards the small of the back with the left hand and resisting the backward movement of the head slightly with the right hand. Return to former position and repeat the exercise until there is a distinct feeling of fatigue from the use of the special muscles that are brought into activity by this movement. Take the same exercise with the position of arms reversed.

Exercise Number 36 simply consists of a flexing or tensing of the muscles between the shoulders of the back. This is a splendid exercise for straightening round shoulders, and, of course, very materially stimulates the activity of the spinal column, because of the active use of the muscles adjacent to this particular part of the body. Stand erect with elbows rigid, bring arms upward and backward, at the same time bringing the shoulders as far backward as possible and endeavoring to bring them still further. Continue this exercise, relaxing and flexing by bringing the shoulders backward and forward, until there is a distinct feeling of fatigue of the muscles lying between the shoulders of the back.

Exercise Number 37 is very plainly indicated in the two illustrations 37A and 37B. First of all the weight of the body should rest on the toes and hands, as shown in 37A, the body bending as much as possible at the small of the back. Now raise the central portion of the body as high as you possibly can, the feet and hands to remain in the same position. Return to former position and repeat the exercise until there is a distinct feeling of fatigue in the abdominal muscles.



A remarkable example of the big, strong rugged manhood developed by the great American game. Ten of the members of the Cincinnati "Reds" (National League), every member of the group more than six feet tall. From left to right, the players are: McLean, Moriarity, Mitchell, Rowan, Fromme, Pearce, Hoblitzell, Gasper, Bescher, and Savidge.

Baseball in the Making of Men

By Sidney Cummings

THE SPLENDID DEVELOPMENT OF BASEBALL PLAYERS ILLUSTRATES THE WONDERFUL VALUE OF THIS RECREATIVE EXERCISE

Baseball is a real, live game. It can only be played by red-blooded men, and there is no question but that it is inclined to fill the tissues of the body with blood of this character. It is a game that we highly recommend, and all those who have the opportunity of doing so should secure its splendid benefits. The following article will undoubtedly be of interest to our readers.—Bernarr Macfadden.

BASEBALL, the great American game, is to a certain extent characteristic of our strenuous life. It is a game marked by stirring activity—one cannot be an idler and play baseball. It involves real work, and at times calls into play every ounce of available energy that one may possess. It not only requires extraordinary agility of the body, but an equal degree of mental activity is required. One must be able to think with lightning-like quickness at times to play the game well. In the development of all around muscular and vital energy, there is perhaps no better exercise. Baseball players, as a class, are big, strong, rugged men. In many cases they

are striking representatives of the indubitable value of this splendid exercise. They do not exhibit the development that is found in the gymnast—there are none of the big, bulging muscles, but the breadth of chest, the squareness of shoulders, the well-set-up figure, and the general ruggedness that you find in the ball player clearly indicates what this great sport is capable of accomplishing in the making of men.

Baseball is a game that develops lung power—it strengthens the heart, the stomach, and all the vitality-building organs. One cannot play baseball without a good, strong heart. One must be ready to run with every atom of energy

that he possesses at any moment, and the pulsations of the heart under such circumstances must be equal to the emergency. To be clear of eye, alert of brain, and strong of limb is essential in order to become a capable player of this strenuous game.

Baseball is really a science in itself. To become a capable player requires years of practice, and the average ball-player will be found to have been indefatigable in the pursuit of his favorite game in early youth. Though the game is unquestionably of very great value to those of mature years, its principal advantage lies in the exercise that it furnishes to enthusiastic growing boys, who become lovers of the game. The average American boy takes to baseball almost like a fish to water. It is one of the first games that he learns. All sorts of games which lead up to the scientific development of baseball itself are indulged by these growing boys.

Baseball is a game with life in it. It keeps one active every moment that one is engaged in play. At the bat, for instance, a combination of skill, agility and strength is required. When initiated into the science of running bases, one again finds that mental alertness is needed to make a quick

decision absolutely essential. In addition to that, one must be able to run rapidly, and, occasionally must quickly turn and return and reverse should one be caught between bases. All this requires mental and physical activity of a superior order. When a boy begins to play ball, if he does not possess these characteristics, if he becomes a capable player he is bound to develop them; as his body develops his mind im-

proves to a similar degree. It is not a game that develops muscular and vital strength alone—it is a powerful stimulant to mental development. A dullard could never become a baseball player. It requires mental alertness equal to that possessed by the shrewd lawyer or politician to really become an expert at this splendid game. In fact, many a baseball player who has made a reputation in his field of endeavor, if his abilities had been diverted to the law or to politics, would unquestionably have been equally successful.

One of the most



R. C. Hoblitzell, Cincinnati's first baseman, picking out a liner near first base, a play demanding quickness and skill.

commendable features of baseball as a sport is that not only does it provide wholesome



Manager Clark Griffith, of the Cincinnati "Reds," on the coaching line.

outdoor recreation for those who attend the thousands of exhibition contests played throughout the season, but that the game itself is played by innumerable players, who, although lacking the highly developed skill of the professional, nevertheless derive great pleasure and physical benefit from indulgence in the sport. In fact, of the total number of spectators in attendance upon a ball game, the percentage of those who have at some time participated in the game as actual players is in the great majority—and the proportion of those who even continue to play the game is by no means inconsiderable.

The widespread hold that baseball has upon the public of this country may be

attributed principally to the fact that there are few men who have not personally played the game at some period of their boyhood or youth. In this respect the game differs widely from other sports which, although quite popular from the spectator's point of view, nevertheless require considerable training and preparation, and in some instances more or less expensive equipment in order to enable the ordinary individual to indulge in them. It is this very adaptability of baseball, and the fact that the game can



Ralph Savidge, pitcher, putting one across the plate.



"Bunny" W. C. Pearce, catcher, unmasking for a high foul—a play that illustrates the mental alertness required at times in this strenuous game.

be played with pleasure and benefit by those who are not possessed of a high degree of skill, which renders it such a notable factor for good in the outdoor life of America.

In addition to the great national organizations, and the various interstate, state and local leagues, devoted to the

promotion of baseball for profit, there are vast numbers of teams which play the game for pleasure, pure and simple. Although these are less in the public eye, they are just as important in the creation of ball players, and in the degree of benefit resulting from the game. Many are the amateur games which occur between teams representing rival communities, commercial establishments, and the like. Even the *ad fresco* contests played by groups too small in number to afford the regulation complement for each team, provide pastime and exercise for their participants. It is from the vast field of players affiliated with the obscure teams that the minor leagues obtain their playing material, and it is from the minor leagues in turn that the more prominent organizations recruit the ranks of their players. This gradual process of the evolution of the ballplayer from the lad who is merely the most expert player of his own particular coterie, to the position of a local celebrity, thence to the station of the leading player of one of the minor leagues, and finally to the elevated rank of the acclaimed favorite of one of the great cities of the nation, may cover all of the years from early boyhood to mature manhood, but each of the upward steps is attended by a commensurate increase in compensation, and for those fortunate enough to attain success at the game it surely offers a career that should appeal vividly to the mind of the growing boy.

What matters it that the playing career of the national stars of baseball may be comparatively short? After they have reached the zenith of success in the greater leagues, their retrogression into the ranks of the non-playing public is usually gradual and serene. In those instances where they have not a sheet-anchor to windward, in the form of a profession or a business enterprise acquired through the proceeds of ball-playing, they still have left to them the opportunity of reverting to minor organizations, and of continuing to play the game until they no longer retain the favor of their managers or of the public.

There is no game or exercise that can

be more highly commended for growing boys. Running—an exercise continually required of the ball player—develops an all around ruggedness of physique which is especially desirable. Results of this kind are more especially noticeable when combined with a certain amount of active use of the muscles of the upper part of the body. The batting and throwing necessary in baseball, furnish this exercise in an ideal manner. Furthermore, baseball never becomes irksome—a player never loses interest in the game, especially when the success of it seems to depend upon his skill and activity.

Baseball players are in nearly all instances fine-looking men. The game seems to develop a symmetrical figure. It seems to harmonize one's physical development. The body is usually smooth and well-rounded, though no extraordinary development is noticed in any one part. The physical development exhibited by the seasoned ball-player is rather of the Apollo type. So many of the muscles are brought into active use, that the body is developed symmetrically in all parts. A good base-ball player must be an all-around athlete, in order to play the game properly.

One especial advantage of baseball is that it is played out of doors. In strenuous stages of the game the activity of the muscles must be exerted to the limit. This, of course, greatly stimulates the activity of the lungs and heart, and naturally gives the growing boy a chance to develop every atom of his attainable power. In adult life also this strenuous use of the body of course helps to maintain its vigor, though one can well understand that such violent exercise would naturally be dangerous to one not accustomed to using the muscular system in this manner.

For the physical culturist desirous of securing all the attainable power of the body, no better game can be found. Those able to do so should take every chance that comes their way to play baseball. After you are past the growing age, it will keep you young and supple and active. If you are still developing,

it will assist materially to bring about that perfection of the body, symmetry and strength so much desired by everyone.



Blaine Durban, pitcher, picking a high one out of the ozone, an instance where mind and body must work together with unusual rapidity.



Some of the raw breads that are made from the whole grain of the wheat. First dish to the left, raw flaked wheat; second, round cakes of raw bread; third, another form of raw bread; fourth, a variety of raw bread largely composed of bran, especially valuable for remedying sluggishness of the bowels.

Breads to Eat for Strength

By Bernarr Macfadden

BREADS WHICH ARE WHOLESOME AND NOURISHING AND WHICH CAN BE RELIED ON FOR BUILDING UP THE TISSUES OF THE BODY

THE problem of selecting wholesome and nourishing bread and at the same time gratifying one's particular taste is by no means unimportant. Bread is said to be the staff of life. It is looked upon as an important adjunct to a meal. Many persons cannot eat a meal without bread, no matter what they may be eating, bread forms part of the repast. For instance, bread and potatoes or bread and meat are eaten together, and if the meal is continued on to dessert and the appetite is not satiated, it is not at all unusual for one to eat bread even with the dessert. Under such circumstances, it is easy to understand the very great importance of selecting the right kind of bread.

The table of the average home, in most instances, is supplied with white bread made from the bolted white flour of wheat. When white bread is not used, hot biscuits or rolls made from the same flour, serve as a substitute. Now this bread is a delusion and a snare. It is nothing more or less than a pretense. It is supposed to be rich in nourishment and to be capable of supporting health and life, but this supposition is absolutely false. To be sure it contains a large amount of starch, much larger in proportion than whole wheat bread, but you must remember that there has been

removed from the flour used to make this bread the organized salts which really constitute the life of the food—one might call it the vital element. This is found largely in what is termed the germ of the wheat, and the germ of the wheat is removed with the bran in bolted white flour. It is cast aside as worthless for human food. In the bran that is removed from this bread there are also found elements that provide nourishment for the muscles and bones of the body.

Those who rely upon white flour as their principal article of diet, in nearly all cases have bad teeth, and have frequent need for the dentist. Their teeth have been actually starved. The blood is not supplied with the elements needed to properly nourish the teeth.

Of course, where one uses the products of white flour and mixes with them a large variety of other foods, the deficiencies of the white flour may not be especially noticed; but where the diet is chiefly confined to such food, the physical and mental effects upon growing children and upon adults are disastrous to an extreme degree. For instance, some of my readers may remember an experiment that was carried on several years ago, and described in detail in this publication, in which a young man at-

tempted to live on white flour products exclusively for two weeks. At the end of that time he was in what might be termed a frightful condition. This same young man on a former occasion had fasted for two weeks, and amazing as it may seem to the average individual, he lost more weight and more strength while eating the white flour products for two weeks than he lost on the occasion of his two weeks fast.

In other words, it is quite plain that white flour products, if used exclusively, are worse than no food at all. You will lose strength more rapidly if you eat these products alone than while fasting. I believe the cause of this result is largely due to the organized salts having been removed from the grain. With this vital element eliminated, the food is deficient to an alarming extent. It is almost like taking the life element out of the human body and expecting it to perform the same service that it would be capable of performing with its powers all intact. It is like depriving a dynamo of electricity and expecting it to do the same work that it would be capable of doing under normal conditions. Thus you can realize the terrible mistake that is now being made everywhere in the use of white flour products.

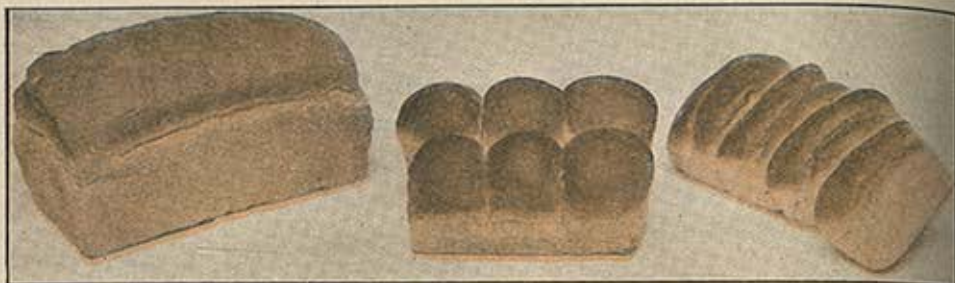
An ordinary meat diet is unquestionably ill-suited for one enjoying normal health. A non-meat diet will in practically every case serve to nourish the body in such a manner as to increase the endurance and general strength, but white flour products are unquestionably many times more harmful than meat could possibly be. This accounts largely for

the frail appearance of some vegetarians. They become interested in a non-meat diet for sentimental reasons; that is, they consider the killing of animals cruel and needless, and in following out their principles, they proceed to avoid meat entirely. When avoiding meat, however, and attempting to make white flour products take its place either partially or wholly, one will suffer severely. Not only do they fail to properly nourish the body, as heretofore explained, but at the same time they clog the alimentary canal. They are what might be termed the most important cause of constipation. The human alimentary canal requires a certain amount of waste products to assist in the proper digestion of the food. Whenever a highly concentrated food is used, especially if it is hurriedly masticated, it provides a source of danger. The peristaltic activity of the bowels requires a certain amount of coarse or fibrous material in order to secure proper digestion and assimilation. This is furnished very thoroughly by the bran or woody fibre, which is found in the covering of wheat and all other grains. When this has been removed, and the usual hurried process of mastication followed, there is defective digestion and assimilation, and slowly but surely functional defects develop which in practically every case finally result in some chronic disease more or less serious in nature.

My advice to those who are seeking a wholesome nourishing bread would be to avoid white flour products. If the meal is made up of a large number of different articles of food one or two slices of white



Examples of the delicious bread made from the whole meal of the wheat. Note its substantial appearance and rich brown color.



The light, airy bread made from bolted flour—the so-called staff of life that is used so liberally everywhere. This bread is responsible for starved tissues and consequent lack of resistance against disease.

bread or a similar quantity in rolls or biscuits, may not do serious harm, but at the same time you must remember that digestion would be facilitated if even this small amount of bread was replaced by more wholesome food. If you find you cannot secure anything else except white bread, then make up your meal without bread. Potatoes, for instance, or any ordinary vegetables, form what might be termed fairly wholesome food, and will thoroughly nourish the body without the addition of bread. They will also be more easily digested than if accompanied by white flour products of any nature.

Though the ordinary white bread is objectionable, the products of white flour that you find in the form of hot biscuits, pancakes or hot butter cakes, are still more harmful. Hot white bread usually forms a doughy mass in the stomach unless it has been very thoroughly masticated. Remember also that hot biscuits are not objectionable unless they are made from white flour. Hot bread made from whole meal of the wheat or from any of the other grains is wholesome in every case, especially so if thoroughly masticated. Graham gems, for instance, make a splendid article of food, wholesome and nourishing, and one could make an entire meal on them without being harmed to the slightest extent.

The question would naturally arise, how can one secure a wholesome bread? Everywhere you have put before you the products of the white flour in the form of bread or rolls. What is one searching for a wholesome bread to do? If you cannot secure white bread, as a rule you can find what is termed Graham bread, which

is made from a combination of bran and white flour. Even better than this, however, is the bread made from the whole wheat, that is, from wheat meal, the entire grain of the wheat having been ground into a meal and no part of the grain having been removed. This makes the best and the most wholesome bread, and can be relied on to nourish every part of the body. If you cannot secure this, then there is pumpnickel, which is made from whole rye and is a wholesome article of food in every way. The next choice would be in the nature of rye bread, that is, the rye bread commonly sold, which is usually made of a mixture of white and rye flour. This is, of course, much better than white bread, though it is far from being a perfect food.

Corn bread is a wholesome food, and can be depended upon for nourishing all parts of the body. Of course, it is an article of food that is difficult to secure unless made at home. Occasionally it is served at restaurants or can be bought at bakeries. Corn bread is also frequently made of a combination of white flour and cornmeal. It is much more tasty if made almost entirely with the cornmeal.

I realize there is a distinct prejudice among many people against dark-colored breads. It does not appeal to the eye, and I must admit it does not appeal to the taste of the individual who is continually surfeited with over-eating. For instance, bread made from the whole meal is usually compact and rich in nourishment. It is not light and frothy, as you will often find white bread. Therefore, if you do not have a distinct appetite, you do not enjoy eating bread

made from whole grains. If, however, you have what might be termed a good appetite, if you really need nourishment, then you will find that there will be a sweet, nutlike flavor to bread from whole-wheat that you could not possibly find in white bread. Bread becomes really and truly a staff of life when it is made from the whole grain of the wheat. One could live on it indefinitely if he were compelled to. I have known numerous instances where this one article of food has constituted the entire diet without other than beneficial results.

Beyond a doubt, many will inquire what one should do for pastry, pies, puddings, etc., if not able to use bolted white flour. You will find that the whole-meal of the wheat can be substituted for white flour in your recipes in practically every case, and that the results will please you. Splendid pies can be made from the whole meal of the wheat and they have a tastiness about them which you could not possibly secure in those made from white flour. For the hot rolls and hot biscuits that are so delectable to the ordinary appetite when permeated with quantities of melted butter, the whole-wheat meal can be substituted, and although the product resulting therefrom may not be so light, it will be even more delicious, if you have a genuine appetite. Of course, if you are catering to a false appetite—if you are satiated continually, then what you really need is at least a short dietetic rest of at least a meal or two. One who is in the habit of eating white bread and cannot properly enjoy bread made from the whole wheat, is either eating without appetite or his

antipathy to the other bread is due entirely to prejudice.

There are a number of recipes that can be recommended for making good whole-wheat bread. It should be constantly kept in mind that the less yeast used the better, though, of course, you cannot make bread light without the use of yeast. If the product is unfermented, it is impossible for it to attain the lightness evidenced in the products of white flour. The use of yeast in bread-making is inclined to give whole wheat bread a slightly bitter taste, and the less yeast you use, the less this particular taste will be noticeable. For instance, whole wheat bread made without the use of yeast, after it is masticated a short while, will have a sweet, nutty flavor, which will not be nearly so noticeable in the bread made otherwise.

I am presenting herewith one or two recipes that the reader can try, and I can assure you in advance that they will be found valuable. This subject deserves a great deal of consideration on the part of those who are endeavoring to secure the highest attainable degree of health and strength, and I have, therefore, arranged to publish two additional articles dealing with bread, one by a miller, who has had long experience, and another article by a physical culturist who will deal with the subject in a general way. No one should fail to become thoroughly conversant with the facts that have to do with the making of bread, for the average individual will find it difficult to make up a meal without bread of some character.

The following recipes for whole wheat bread, graham gems and graham wafers have been



Huge loaves of black "pumpernickel," photographed in a Russian-Jewish bakery, in New York City. The four larger loaves measure from eighteen to twenty inches in diameter, weighing eighteen to twenty pounds each.

quoted from the Physical Culture Cook Book:

Whole Wheat Bread.—Two quarts flour, one quart lukewarm milk, one-half cake compressed yeast, one-half cup molasses, one tablespoonful shortening, two teaspoonfuls salt.

Dissolve the yeast in a little of the warm water. Sift and warm the flour, work in the shortening, and add other ingredients. Mix well, either with a spoon or with the hands. The dough will be too soft to knead, but must be mixed or beaten. Let it rise over night. In the morning mix well again. Put into two greased breadpans, cover and set in a warm place to rise again for about one hour or until risen to the tops of the pans. Bake one and a quarter hours in a moderate oven.

Graham Gems.—One pint water, one pint milk, enough graham flour to make a batter which will drop from a spoon and not run. Stir very thoroughly, put in hot, well-greased gem pans and bake quickly in a hot oven. These gems are recommended as wholesome by several

authorities. Experience will help in the matter of the softness of the dough, etc.

Graham Wafers.—Two cups graham flour, one cup sweet milk, pinch of salt. Mix quickly and thoroughly, roll out as thin as possible. Prick and bake in a quick oven.

The recipe followed in making the excellent whole-wheat bread served by the Physical Culture Restaurants throughout the country is as follows:

Whole-Wheat Bread.—Take four quarts of lukewarm water, add three ounces of salt, two ounces of sugar, then dissolve one ounce of yeast in a little water, mix together thoroughly

so as to dissolve all ingredients, then sieve nine and one fourth pounds of whole wheat flour, and add this to the mixture. Knead the dough thoroughly, and let it rise once, then work it down, mould into loaves and put into pans. Let rise until pans are three fourths full, and bake in moderate oven.

It may take a few trials to get good results, but bread made in accordance with this recipe will prove delicious and satisfying.



A "family" loaf of Italian bread, thirty inches high. One may speculate on the size of the family. This particular size, however, is used for parties and celebrations.

CURING CONSTIPATION.

TO THE EDITOR:

I read with interest the articles on the cure of constipation in late numbers of PHYSICAL CULTURE. I read in a book of fruit being good for constipation, especially with the outside skin on and tried it that way and found that it is much more effective that way than with the skin off. Before, I would pare apples before eating, thinking they were easier to digest that way.

But the most effective food I have used for constipation is raisins. I can prevent this trouble, even while eating cooked food by using raisins.

Last summer I had a very bad case of constipation, but have cured myself by natural methods.

Millmont

J M G.



Valley Orange Grove. We eat \$5,000,000 worth of this luscious fruit every year.

The Value of Fruit as a Food

By Earle William Gage

PHOTOGRAPHS BY THE AUTHOR

THE American people are a fruit-eating nation. Nevertheless, they do not eat sufficient fruit, nor do they have a sufficient knowledge of the food-stuffs classed as "fruit" to be considered competent judges of the edible properties of fruit. To educate the reader along these very lines is the only excuse I can reasonably give for the writing of this article.

Edible fruits show great range in form, color, and appearance, and are found in almost countless varieties; yet from the botanist's standpoint all our fruits are the seed-bearing portion of the plant. The edible fruits of temperate regions fall into a few groups—stone fruits, like cherries and plums; pome fruits, like apples and pears; grapes; and berries, like strawberries, blackberries, and currants.

There are several products, such as muskmelons, cantaloupes, and watermelons, sometimes classed as fruits and sometimes as vegetables, which, of course would not belong to any one of these groups. Tropical fruits are not so easily classified, though the citrus family (oranges, lemons, etc.), includes many of the more common sorts.

There are a few vegetable products, which are not fruits in any botanical sense, but which by common consent are included in this class of food products, since their place in the diet is the same. The most common of these products is rhubarb, and there are few uses of fruit which the acid rhubarb stalk does not serve. Angelica stalks, which are candied and used for making cakes and confectionery, are much less common, though the total amount used is large.



Some rich clusters of ripening grapes. Grapes are a very healthful article of diet, and their product, grape-juice is deservedly popular.

It is certainly more natural to include preserved, candied, and crystallized ginger root with candied pineapple, candied cumquats and similar products than with any other class of food materials, and old-fashioned candied sweet flag root may also be mentioned in this connection.

As a country becomes more thickly settled, less and less reliance can be placed on the output of wild fruits, and the market gardener and fruit grower become of increasing importance. In the United States, strawberries, blackberries, and raspberries are examples of fruits which are still growing wild and are cultivated as well, and cranberries have

so recently come under cultivation that many persons still think of them as a wild fruit.

The commercial fruit grower, of course, desires a fruit of good appearance, having satisfactory shipping and keeping qualities, and too often the consumer is satisfied to accept a product in which such qualities predominate. Discriminating purchasers, however, will insist on good flavor, texture, and cooking qualities as well, and such demands should be more often urged in order that quality may replace appearance as a standard in cultivating fruit for market.

The fruit market has been very greatly modified and extended by improved methods of transportation and storage. A man need not be so very old to well remember the time when, at least in the Northern States, bananas were a comparative rarity outside the large cities, and oranges and lemons, though common commodities, were rather high in price. In the summer there was an abundance of the common garden fruits, but in winter apples were practically the only sort which was at all plentiful. A few years have witnessed a great change, and now there is hardly a village so small that bananas and other southern fruits cannot be purchased at reasonable prices. In Europe the situation is much the same.

Such great quantities of bananas are now taken to England and sold at reasonable rates that they are sometimes spoken of there as "the poor man's fruit." The exceedingly low cost of fruit is due to the great quantities grown to supply the demand of the poorer classes of all countries. At the present time there are a number of fruits, such as avocados, or "alligator pears," mangoes, and sapodillas, which are fairly well known in our large markets but seldom seen in smaller towns. The enormous development of the fruit-growing in-

dustry in California and Florida, which includes the products of both temperate and warm regions, as well as the possibilities of supplying the northern markets with tropical fruits from Porto Rico and Hawaii, make it probable that within a few years the avocado, the mango, and other tropical fruits will be as well known as the pomelo or the pineapple.

Improvements in transportation have also materially lengthened the season of many fruits, such as strawberries, which cannot be stored for any considerable period. Furthermore, improved methods of culture and transportation have extended the area planted to old and well-known varieties.

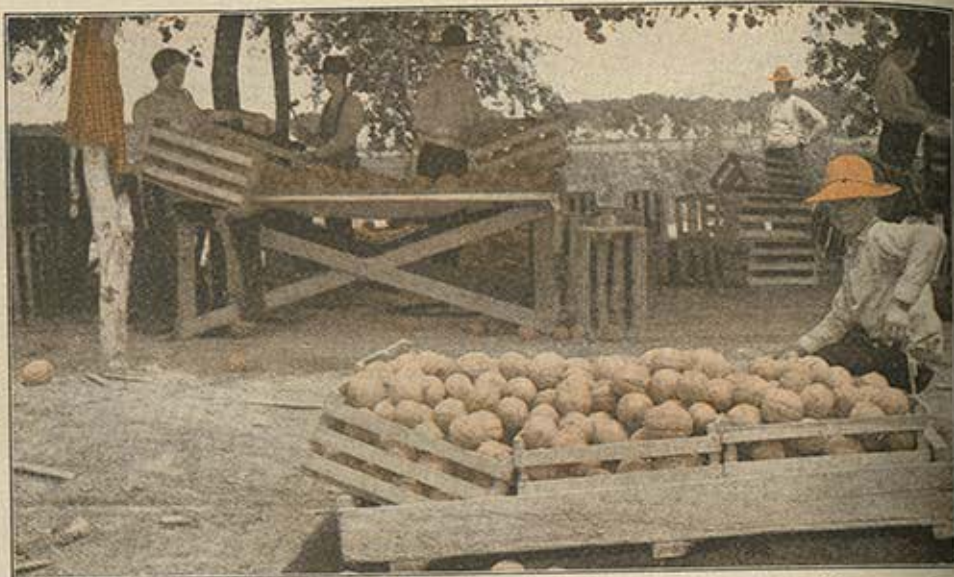
Attractive color has a decided effect on market value, and the public demand varies greatly in different regions. Thus, a yellow russet dessert apple is demanded in the French market, while in many parts of the United States the red apple holds supreme preference. A faded, dull color is often an indication of staleness; strawberries and raspberries which have been kept too long have little of the brilliant color of freshly gathered fruit. That fruit colors in general are not very permanent is shown by the way the color deteriorates on long-continued cooking and fades when canned and preserved fruits are exposed to the light.

In preparing such fruits as plums, peaches, etc., for the table, the skin may be readily removed, without injury to the flavor by first immersing them for a short time in boiling hot water. A silver knife should always be used for paring apples, pears, and other fruits. When a steel knife is used, the acid of the fruit acts on the iron of the knife and frequently causes a black discoloration, and there is also very commonly a noticeable metallic flavor. If pared or cut fruit is exposed to the air, it rapidly turns dark in color, owing to the action of oxydases (as some of the ferments normally present in fruits are called),

upon the more readily oxydizable bodies which are also normal fruit constituents.



Picking, packing and transporting oranges (or any other fruit) properly, is an important detail.



Packing cantaloupes in Arizona. Great care in packing is necessary to avoid bruising the product.

In the same way the brown color of the bruised spots in apples is caused by oxidation through the action of the oxydases present in the fruit of the tannin in the crushed shells. Such bruised portions contain a larger proportion of starch than the remainder of the apple, because the tannin hinders the transformation of starch into sugar.

Fruits owe their flavor in considerable degree to the sugars and the malic, citric, and other acids which they contain, but the flavor which is so characteristic of each different variety of fruit is almost entirely due to ethereal bodies. The amount present is often too small for determination by the usual chemical methods. However, in many cases these flavor-giving bodies have been studied and their chemical nature is known.

With the orange and other citrus fruits the oil found in the skin has a very characteristic odor and flavor, which are always associated in our minds with the flavor of the fruit. Obviously, the small amount of these bodies of pronounced odor and flavor can not materially modify the nutritive value of fruits, but they are of great importance in considering the place of fruit in the diet, as they are more or less responsible for its attractiveness and palatability. There is

no doubt that we all eat more readily the foods which please our palate than those which are of indifferent flavor, and there is every reason to believe that the foods which please are actually digested more easily than those which do not, since they stimulate a normal and abundant production of digestive juices.

Most fruits, like other classes of foods, contain more or less material, such as pits, skin, etc., which is inedible. When such portions are removed a larger or smaller part of the edible material is almost always of necessity removed also, and is considered "waste." Thus, of pears it constitutes on an average 10 per cent. of the total fruit, peaches, 18 per cent., apples and grapes, 25 per cent., and bananas, 35 per cent., while in the case of raspberries and blackberries there is no refuse and the whole fruit can be used.

In the majority of fruits and fruit-products the carbo-hydrates are the food constituents most abundantly represented. In seeds which are commonly eaten, such as the cereal grains, the beans, peas, and other legumes, the nitrogen pre-extract is quite largely made up of starches. In fruits, however, sugars and the so-called pectin bodies, with very often more or less starch, make up the

group. The principal sugars in fruit are cane sugar, grape sugar (glucose), and fruit sugar (levulose), the last two being usually present together in equal quantity and designated invert sugar or reducing sugar. The stage of growth and the degree of ripeness have a very marked effect on the kind and amount of sugar, and it is therefore difficult to give average figures for the quantities present which will be fairly representative.

A knowledge of the changes which accompany the growth, ripening and storage of fruits is very important commercially, as well as from the housekeeper's standpoint. For instance, in cider making it is desirable that the fruit should be used when the sugar content is high, as the quality of cider and vinegar is largely determined by the amount of sugar present.

As every housewife knows, under-ripe fruit—that is, fruit which still contains the so-called pectin bodies rather than the sugars and other carbo-hydrates characteristic of fully ripened fruit—is the most satisfactory for jelly making. In the case of bananas the under-ripe fruit, rich in starch, is best for cooking, and the very ripe fruit, in which the starch has been changed into sugar, for use uncooked. It is not unlikely that failure to recognize this distinction is responsible for the digestive disturbance which many persons experience when bananas are eaten, as the raw, under-ripe, starchy fruits are generally conceded to be difficult of digestion. The under-ripe bananas, when dried, sliced, and ground, yield a flour or meal rich in starch, while the riper fruit with the higher sugar content, sliced and dried, is very sweet and not unlike figs in flavor and composition.

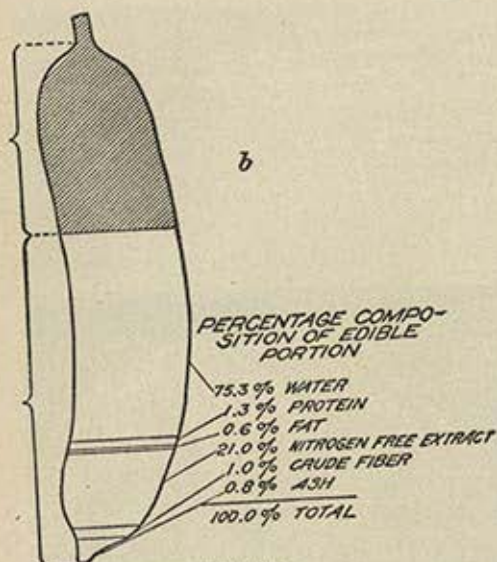
In most families fruits are commonly regarded as a food accessory, and are prized for their pleasant flavor or for supposed hygienic reasons, rather than for their food value; yet a study of available figures shows that they by no means constitute an unimportant part of the diet, since they supply, on the basis of recent statistics, made after severe tests by the Department of Agriculture, 4.4 per cent. of the total food and 3.7 per cent. of the total carbo-hydrates of the average American diet.

With a view to learning something more definite regarding the possibilities of fruits as sources of nutrients, the relative cost of nutrients supplied by fruits and other foods, the digestibility of a fruit diet as compared with an ordinary mixed diet, and related questions, extended investigations were undertaken at the California Agricultural Experiment Station, by Prof. M. E. Jaffa, the



Arizona cantaloupe "man's own fruit-food"

work as a whole being carried on in cooperation with the nutrition investigations of the office of Experiment Stations. In the first series reported, six dietary studies were made with fruitations—two women and four children, who had lived on a fruit and nut diet for several years. The dietary studies covered from twenty to twenty-eight days, and the daily food



Courtesy of Department of Agriculture.

The banana contains 65 per cent. nutritive elements and 35 per cent. refuse matter. The dark portion (b) represents waste product.

consisted of different combinations of fruit and nuts, of which the following day's ration may serve as a sample:

"Four hundred and seventy-five grams apples, 110 grams bananas, 850 grams oranges, 5 grams dates, 2 grams honey, 10 grams olive oil, 55 grams almonds, 70 grams pine nuts, and 50 grams walnuts."

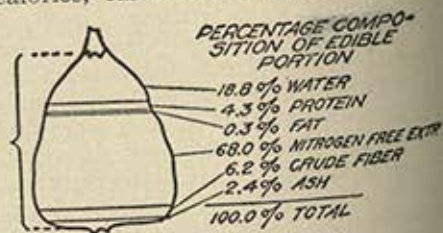
The later studies were made with one of the women and two of the children included in the first group, and in addition, with two elderly men, who had been vegetarians for years and had limited their diet almost exclusively to fruits and nuts, and with two young men, university students, who were accustomed to the ordinary diet, though one of them had experience with a vegetarian and fruitarian diet for some time. The students and one of the elderly men ate three meals per day at usual hours. The others ate but twice, the first meal being taken between 10 and 11 o'clock in the morning and the second between 5 and 6 o'clock in the afternoon.

As before, the diet included a large assortment of fresh fruits, with considerable quantities of dried fruits and nuts, and some honey and olive oil. In a few cases small quantities of other foods were also eaten.

Considering these studies as a whole, the diet of the woman and children furnished from 32 to 43 grams of protein and 1,190 to 1,430 calories of energy per day, the cost ranging from 1.57 to 27.5 cents. It is the usual custom to discuss dietary studies on the basis of the amounts eaten per man per day, and the results obtained with these women and children, when recalculated to this basis, showed a range of 47 to 80 grams of protein and 1,850 to 2,805 calories of energy, the cost of the daily food ranging from 21 to 55 cents per man per day.

In the studies with the young and the old men the protein supplied by the daily diet ranged from 40 to 85 grams and the energy from 1,712 to 3,305 calories, the average being 62 grams protein and 2,493 calories, the cost ranging from 18.1 to 47 cents per man per day. These amounts are considerably smaller than have been found on an average with families living in many different regions of the United States and under a variety of conditions, as is shown by the fact that with 52 families in comfortable circumstances the average protein in the daily diet was 103 grams and the average energy 3,500 calories.

On the other hand, in many of the dietary studies made under the auspices of the Office of Experiment Stations it was found that persons living on a mixed diet have obtained amounts directly comparable with those supplied by the fruitarian diet. Thus at the North Dakota Agricultural College some years ago a dietary study showed that the food consumed per man per day by a group of students furnished 64 grams protein and 2,579 calories, and at Lake Erie College, 48 grams protein and 2,610 calories, calculated on a uniform basis.



Courtesy of Department of Agriculture.

As illustrated above the fig contains no waste matter, and is made up of 100 per cent. nutritive elements.

per man per day. The average cost of the food used in these two college investigations was 13 to 18 cents per man per day.

Few studies seem to have been made to determine the ease or rapidity of digestion of different fruits in the stomach, but a comparison of available data indicates that fruits compare favorably with other common foods as regards stomach digestion. Apparently it is fair to concede that digestion is influenced by the nature of the fruit and its stage of ripeness.

Beaumont states that mellow sour apples eaten uncooked require two hours for digestion in the stomach and mellow apples 1.5 hours. Another observer notes that about 5 ounces of raw ripe apples require 3 hours and 10 minutes for digestion in the stomach, but states that if the fruit is unripe, and consequently contains a high proportion of cellulose, a much longer time may be required.

Little is definitely known regarding the relative digestion and absorption of fruits in the intestines, but experiments indicate that as a class ripe fruits are quite thoroughly digested, and it is evident that, generally speaking, fruits, like other foods, usually remain in the intestinal tract long enough for the body to absorb the nutritive material present, and that therefore the rate of intestinal digestion would not be a matter of special importance.

Over-ripe fruit is often injurious, very probably because of fermentation having begun, and stale or partially decayed fruit is obviously undesirable for food purposes. In addition to a deterioration in flavors there is always the possibility of digestive disturbance if such fruit is eaten raw.

It is almost universally believed that green fruit is unwholesome and causes serious digestive disturbances, yet those who have been bred in rural districts know that this if illness had always followed eating it, there would have been few well children in the community in the summer. Recognizing that green fruit may be a cause of illness at times and at other times apparently harmless, two German scientists have recently carried

on extensive studies to ascertain the truth of the matter. Chemical analysis were made of fruits of varying degrees of ripeness, and studies in which green fruit was eaten in considerable quantities and under varying conditions were carried on with both animals and men. It would appear from the results of these experiments that although unripe fruit is undoubtedly often harmful, particularly to children, the danger from such foods, especially green gooseberries, plums, pears and apples, when eaten raw, is less than is commonly thought, and the effects depend in marked degree upon individual peculiarities. The green fruit was found to contain the same chemical compounds as the ripened fruit, though in different proportions—that is, no chemical element was found in the green fruit which was foreign to the ripe fruit and which could be considered in itself a cause of illness.

The injurious effects of raw unripe fruit, therefore, it appears, do not depend upon chemical constituents, but rather on the unusual proportions in which the constituents occur, and especially the large percentage of hard cell tissues, which, if imperfectly masticated it will readily be seen, might be a source of digestive derangement. Possibly the excess of acid in the green fruit is also a cause of digestive disturbance. Cooked green fruit was found to be practically harmless, being especially palatable and wholesome when cooked with sugar.

Investigations have shown that fruit exposed to street dust and to other unfavorable conditions become covered with bacteria, which are always present in such dust-laden air, and may be possible sources of contagion. Flies and other insects are also known to be a source of dirt and contamination. Samples of fruit purchased in the street and examined by Ehrlich, the well-known investigator, showed tuberculosis bacteria and many other forms of microorganisms, the number present varying considerably with different sorts of fruit.

Realizing that fruit exposed to street dust and insects may be a means of spreading disease, measures have been taken in Vienna to prevent such conditions, and fruit offered for sale must be

covered with gauze or otherwise protected. In connection with the Vienna investigations microscopic examinations were made of the skins of plums and pears purchased at a much-patronized fruit shop. It was found that the main source of contamination was dust containing fragments of stone from the street pavement and bits of horse manure.

It is often urged that the washing of fruit destroys its flavor. On the other hand, skilful housewives maintain that if properly done the loss of flavor is inappreciable, and on the grounds of common sense and cleanliness it would seem best to sacrifice a little flavor, if necessary, for the sake of removing filth and possibly dangerous bodies, even if the amount of dirt present is too small to be offensive to sight or taste.

An idea of the amount of material removed by washing fresh fruits, such as the apple, which is protected by a firm skin, may be gathered from some French experiments made to study the effects of washing apples used in cider making. Each apple in a 45-pound lot was washed separately in distilled water. The wash water took on a dirty black color and also had a disagreeable odor, and analysis showed that per 1,000 pounds of apples it contained about 0.3 pound total dry matter, the greater portion of the dry matter being made up of sugar, with

smaller amounts of pectin bodies, malic acid, and ash. The juice of the washed and unwashed fruit was practically identical in composition. It is evident that the loss represented is too small to be of any practical account from the standpoint of economy, but even less than 0.3 pounds of dirt per thousand pounds of fruit is something which all would wish to avoid when attention has once been directed to it.

The extended use of fruit in our diet is certainly justified on the ground of palatability, food value, and esthetic considerations, but then are those who seek a further justification in the score of hygiene. It is commonly conceded that most fruits are laxative, and it seems probable that they owe this property to the considerable amount of water which they contain, to the salts in solution, or to the irritating crude fiber, small seeds, or other indigestible materials present, or to all these together. Man seems to crave and requires some acid in his diet, and the citric, malic, and other fruit acids are undoubtedly wholesome.

Fortunately there are so many other good reasons for using fruits that we have little need to base our use of them in quantity on supposed therapeutic virtues. Intelligently used, fruits are a valuable part of a well-balanced diet and may well be eaten in larger quantities than at present.

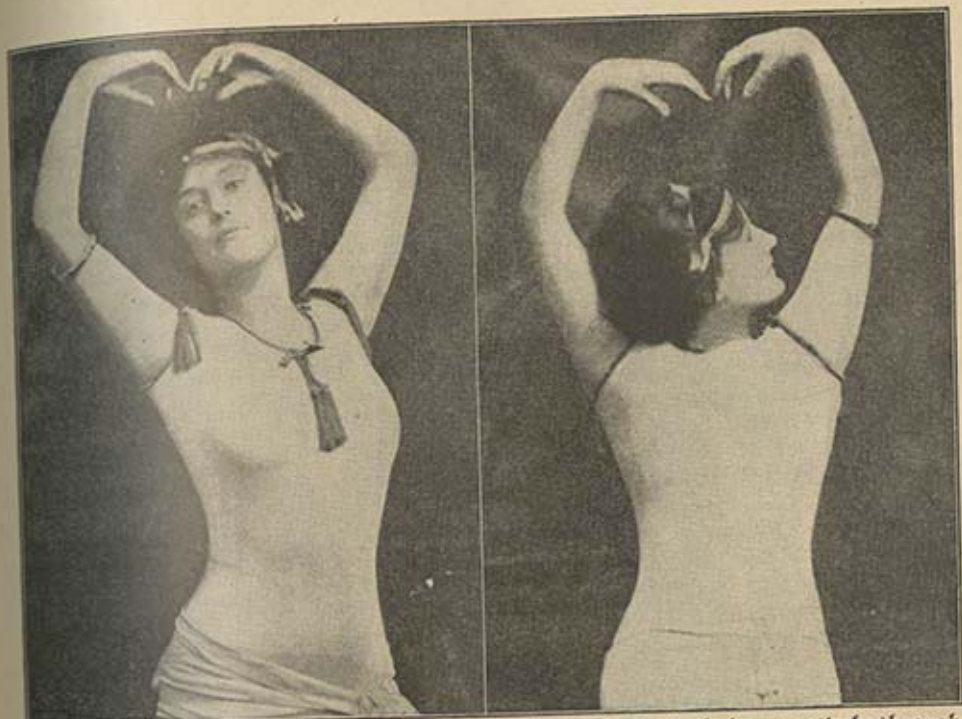
A Swimmer's Rugged Development.



John F. Conroy, Boston, Mass.

The photograph reproduced herewith shows the remarkable development of the arms, shoulders, and back of John F. Conroy, a swimming instructor, of Boston, Mass. Mr. Conroy is an excellent example of the muscular development acquired through swimming. This exercise offers wonderful possibilities to those who indulge in it in a proper manner.

Of course, few are so situated as to be able to indulge in swimming to an extent sufficient to produce the effect observed in Mr. Conroy, but even a moderate amount of swimming will increase the stamina, add greatly to the breathing capacity and lung power, as well as bring about a marked degree of general muscular improvement.



Showing the symmetrical development of Miss Kellerman, obtained almost entirely through swimming.

Prudery as an Obstacle to Swimming

THE CHAMPION FEMALE SWIMMER OF THE WORLD DEPLORES THAT PRIGGISH PURITANISM IS RESPONSIBLE FOR MANY DROWNING ACCIDENTS

By Annette Kellerman

Prudery is responsible for many tragic evils. Unquestionably the swimming costumes referred to by Miss Kellerman are objectionable. They must certainly interfere with the free movement of the body and very materially lessen the benefit and the enjoyment that one should secure from this splendid exercise. It is to be hoped that the day is not far distant when the crime of crimes, this mental nastiness called prudery, will be regarded as a thing of the far distant past.—Bernarr Macfadden.

THIS is the time of the year when normal young men and maidens instinctively turn to river, lake or ocean for exercise and recreation. For if they do *not* care for bathing or swimming, it is a pretty sure sign that there is something wrong with them, mentally or physically.

Perhaps a few words from me on the subject regarding which I believe I can properly claim some amount of knowledge, may be of interest to those readers

of this magazine—especially the feminine sex—who propose to learn how to swim, or want to improve their present familiarity with the art. In the case of the latter, I may be able to furnish some hints of a practical sort to the end of increasing their skill and endurance.

First of all let me speak of a matter which is of importance to all girls who want to become so expert in the water that they will not only reap enjoyment while in it, but, it may be, will be en-

abled to save their own or somebody's else life. Has it ever occurred to you that comparatively few women have mastered the natorial art? The majority of boys and youths can swim, more or less, but the same remark hardly applies to their sisters and sweethearts. This too, in a country which has thousands of miles of ocean front and innumerable lakes and streams. Now, why is this?

The answer is easy. Prudery, evil minded prudery, insists that members of my sex shall, when bathing, wear a costume that seems to have been invented for the express purpose of hindering the action of the limbs and the lungs, and stopping the progress of the would-be swimmer in the water! Think of the absurd and clumsy skirt, bloomers and waist in which priggish "decency" declares that a woman must array herself before she can enter the sea at any one of our popular beaches! This is saying nothing about the tights and shoes and all the rest of the ridiculous "rig." I need hardly speak of the result of these things on the wearers. The bloomers act as a drag on her, so does the floating skirt, and the waist as it fills with water is about as ingeni-

ous a device for preventing her from swimming as a sea-anchor would be. This is saying nothing about the skirt wrapping itself round her legs, or the "bands" and those of the bloomers interfering with the abdominal breathing that is so essential. I am not of a revengeful nature I hope, but as I have watched women at Coney Is-

land or Atlantic City, doing their best to overcome the handicap of their garments, I have often wished that I could make the idiotic male prudes who are responsible for these same garments, put them on and so clad, make them jump overboard. After one such experience, I fancy that they would change their views on the "propriety" of female dress as it now exists for bathing purposes.

The next time you go to a seaside resort, note how few girls there are who venture out to the limits of the life lines. Note, too, how many hundreds there are who put in the bathing hour in useless bobbing and ducking and squeaking, while the water is scarcely up to their waists. Meantime they hold on to the ropes as if they were afraid to let go of them, which indeed they are. So the time passes and the only good that the victims



Miss Kellerman the Australian girl who has won the swimming championship of her sex.

of the prudish bathing dress get, is from the fresh air and the comparative freedom from the fetters of ordinary garb. The bathing dress as it usually is, is in a way, all right for land wear, but the point I am making is, that it is totally unfitted for wear in the water.

You will probably ask me what I consider to be the ideal bathing dress. My reply is, the one-piece garment such as wear during my exhibitions on the stage. It is, as you probably know, tight fitting, nearly armless and extending from the neck to just above the knees. It is made of material which "gives" very readily to the efforts of the wearer and because it sits close to the body, it does not "bag" by water gathering inside of it.

In Australia, which is my home, practically every woman swims, and this one-piece garment is the rule there. Also male relatives and friends are our escorts and teachers. It is because of all of this that, as I have just intimated, the Australian girl who does not swim is the exception rather than the rule. Let me emphasize this point; I declare and most emphatically that sensible wear is the basis of swimming success for women, and where it is missing, a noble sport will continue to languish among the sex for which it is so fitted. I must confess that this question of bathing dress in America and on the Continent of Europe, as well as in Great Britain, makes me very weary. Just why women allow themselves to be harassed and hindered is more than I can understand. It seems to me, that steps should be taken to bring to the public the absurdity and mock modesty of the situation. A reform is clearly necessary in this respect and it should be inaugurated by the sex that will be chiefly benefited by it.

In England, a large percentage of the women swimmers have graduated from "pools," this for the reason, that "mixed bathing" is not permitted at the majority of the seaside resorts in that country. This is another exhibition of cheap prudery, which to my mind is simply disgusting. In France, the reverse is the case, but here again, the women bathers have to wear the encumbering garments of which I have spoken,

although not to that degree that they do on the other side of the Channel. The result is, that there are a fair number of women swimmers in France, although not as many as there should be. I am not so familiar with other parts of Europe as I am with those just named, but I am told that the rule is, that where there are no stupid restrictions regarding bathing dress for females, the number of the women swimmers shows a very definite increase. I look upon the matter as a serious one, because anything which discourages swimming among women, encourages danger to life, to say nothing about the incidental loss to health. Just how many girls and young women have been sacrificed to prudery from this cause, there are no statistics which tell. But it is certain that if it wasn't for this hampering dress, many more of my sex would learn to swim than now do, and therefore the deaths by drowning would be considerably less. So that a not inconsiderable portion of the "water mortality" must be attributed to the smug hypocrisy that says: "Thou shalt not" to the girl who attempts to clothe herself for swimming in a manner which is appropriate to the sport.

That which, from my standpoint, makes the matter so peculiarly exasperating is, that swimming is an exercise for which woman is peculiarly fitted by Nature. Her bones are small, and as a rule, she is better equipped with fleshy and fatty tissue than are men. All this is in her favor as far as flotation is concerned, which is an important matter be it known. Then too, her chest capacity is as a rule good, if she will only learn to breathe properly from the abdomen and not in the way that she is usually compelled to by reason of her corsets. Also, her powers of endurance are generally excellent, and, lastly, her physical conformation is such that when unencumbered, she goes through the water with ease and grace.

One of the many reasons why women should learn to become good swimmers is, that it is a sport which makes one healthy and beautiful at the same time. I do not mean by this that it induces a "pretty" face, but it goes far further than that, for it brings about a grace and loveliness

of form which, so I think, no other athletic exercise does. Did you ever see a crack swimmer of either sex who did not have a poise that was most attractive or muscles that were not long and smooth and a skin that was healthy in looks and texture. I never did. All this is saying nothing about the health and virility which go with these things. Then too, swimming, unlike most sports, exercises every muscle and exhilarates the action of every organ of the body. Then there is the tonic effect of the water on the skin, and the benefits derived from the sun-bath, which should form a part of every well regulated "dip." But alas! prudery calls a halt on much of this and nullifies the good which results from it. In Australia, the women who bathe, thanks to the sensible dress which they wear, enjoy the caress of the sun, the touch of the water and the massage of the wind on their skins, with but little to hinder. But here and in Europe! Well I suppose that I've said enough on that point, and if I begin again I shall not stop until I have used up all my available space.

I shall not attempt to do more than hint at some of the things that are essential for a novice to learn and remember. Editorial requirements will not allow of my doing more than this, much as I should like to talk at length in regard thereto. But this I would like to say; don't try to *teach yourself* to swim. If you do, you will be pretty sure to be clumsy and acquire certain bad habits, which you will find it difficult to rid yourself of. I speak more particularly of breathing and the movements of the legs. Let your first lesson be taken of a qualified teacher. Not everybody who says he can teach swimming can do so. Usually there is a tendency to "rush" the pupil—to try and make her learn too much in too short a time. To make haste slowly, is one of the first lessons of the art, and the teacher who forgets this, is liable to retard rather than urge the progress of the novice.

I strongly recommend a male instead of a female teacher. Not that I think that the former are as a rule better equipped or more clever than are the

latter, but for all that, a man begets a confidence in a girl where the water is concerned, that is not always in evidence in the case of a woman teacher. Don't go in for fancy swimming or fancy strokes of any kind until you have mastered the "breast-stroke." This stroke is the A B C of swimming and as useful to the girl who learns it, as the alphabet is to her in a literary sense. Once mastered, other strokes will follow. Yet before she tries to get the "hang of others," she should certainly learn to float and swim on her back, and to get the knack of the "flat-hand" or "shallow" dive. When she has conquered the mysteries of this trio of accomplishments, she will be prepared to tackle the other and more difficult "stunts," including the strokes which are known as the "under-arm-side; over-arm-side; double-over-arm, or trudgeon and so on. The higher mysteries of diving will also be in order as will the various feats that can be performed on the back in the water by the experienced swimmer.

Always swim in the open if possible. Yet the artificial "pool" is not to be despised where the season or the environments do not allow of a visit to the beach or river-side. Then too, the tank allows one to keep up one's practice all the year round, and best of all, it permits of that freedom of dress which is denied by the prudens and the Puritans to the girl who bathes in public.

If I had my way, I would have every school house equipped with "pools" and swimming should be made compulsory along with other studies; competent instructors being employed by the Boards of Education. Thus would the nation profit by a race of healthy youngsters of both sexes, swimming would be as common as walking and there would be a notable falling off in the number of those fatalities which we now call "drowning accidents" but which in reality are, to a very great extent, due to the fact that women especially are practically debarred from learning to swim by reason of the garb which they are compelled to wear and against which, I call on every reader of PHYSICAL CULTURE to emphatically protest.

Does the Heart Circulate the Blood?

A STARTLING VIEW AS TO THE POWER THAT CIRCULATES THE BLOOD THROUGHOUT THE BODY

By M. J. Rodermund, M. D.

Here is a very unique idea that readers will at least find interesting. Dr. Rodermund believes that the power that runs the human machinery is taken directly from the air we breathe, that it is the oxygen from the air which causes the blood to circulate in the body, and that the heart is nothing more than a pump which throws the blood into the arteries. With all our pretenses, many of the functional processes of the body are still a mystery. The theories advocated in this article, it appears to us, are worth careful investigation, and the doctor plainly indicates how experiments may be made with a view of proving whether or not his conclusions are accurate.

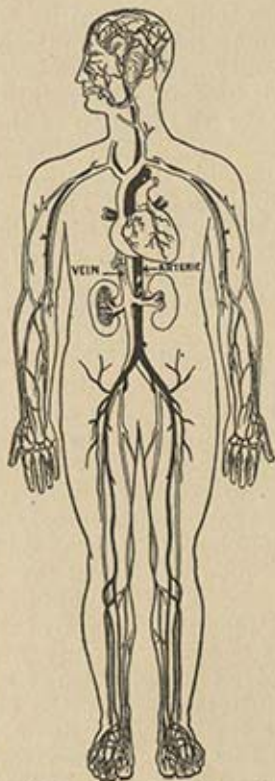
THE accepted doctrine that the heart is a pump and by its muscular contraction and of the arteries propels the blood throughout the body is erroneous, absurd and an absolute physical impossibility.

The human body has often been likened to a machine, but in reality it is a machine shop, full of machines, each one of these machines having a particular duty to perform. All of the machines in this human machine shop are kept in running order and linked together so as to run by one center, by one power or force.

To oppose a doctrine that has been one of the main pillars of physiology, one which has been advocated and promulgated by illustrious men for centuries past, may seem to be presumptuous, and theories so advanced have always been and, as medical history will show, have nearly always met strong opposition until the question of fact involved has been forced to be accepted by the medical profession by strong public sentiment. This is a lasting and disgraceful monument the profession have erected for themselves.

The function of the heart, of propelling the blood, is to regulate, so distribute it to

the arteries as demanded, and not to circulate the blood; otherwise, its functions would be chaos instead of performing its steady life work just as the regulator of an engine regulates its motion; although a careful engineer will keep an extra reserve of steam that he can turn on at will. The machine works with the same evenness, unless the steam gets below its needed amount, then the whole machinery begins to slacken. So with the human system; a good supply of reserve energy should be kept on hand which, if allowed to go below par or its actual need, will give a sluggish action to the human machine, when obstruction, or in other words, disease, will be apt to follow.



Main branches of venous and arterial circulation. The arteries carry the purified blood away from the heart and throughout the body, the veins return the blood that has become crowded with impurities back to the heart, from whence it is pumped through the lungs and purified.

Breathing is the source of all circulation, whether it be in animal life or vegetable life. In man and animals breathing is performed through the lungs, excepting fish, which breathe through the gills. All forms of vegetable life breathe through their leaves, the circulation fluid (sap) being carried from rootlet to bud with just as much certainty, and no doubt with much more force, than it takes to circulate the blood in a human being. But the plant has no heart. So are there

other fluids in the body that need more force to circulate them than the blood requires, yet they have no heart, as the lymphatic and glandular systems.

The experiments to prove that the oxygen from the air is the element which makes it possible for the blood to circulate are made in the following manner:

Take a large animal, weighing about three to seven hundred pounds, first giving the animal an anesthetic, then laying bare and open to examination the large blood vessels and their main branches leading from the heart to the end of the toes, hanging the animal up by the hind legs, then ligating both of the blood vessels that bring blood to and from the heart. This completely cuts off the heart from the circulation of the blood below the diaphragm, and the result is that immediately all of the arteries are empty, the blood flowing straight upwards for four or five feet through the fine network of capillaries.

This certainly would be impossible if the heart had the control, or anything to do with the circulation of the blood. This demonstration proves beyond a question of doubt that the heart does not circulate the blood, but it does not prove what does circulate the blood.

The animal is taken down and placed upon a table, the arteries being completely empty. I then proceed to transfer the blood from the veins, completely filling the arteries with this venous blood. The blood now fails to circulate, no matter how much force is used. This experiment demonstrates that the muscles of the arteries do not assist in circulating the blood, as is now claimed.

The fine network of the capillaries between the veins and arteries is very complicated, but under the microscope the blood corpuscles can be seen to pass in and out through these minute vessels. Yet these minute blood corpuscles seem to know their business and keep on nourishing the body, whether we understand their exact business methods or not. This process of the blood going on in the capillaries is a wonderful piece of nature's handiwork, and some day may be better understood. For practical purposes, however, it is of little importance; but that the blood cannot circulate in the

body without attractive or electrical force, is of great importance. By emptying the arteries of the venous blood with which I had filled them, and by removing my ligature near the heart, the arterial blood continues its normal flow from the lungs through the heart, and the circulation is again complete. When I compelled the animal to breathe impure air (artificially), the circulation of the blood would become less forcible and sluggish. It also became darker. This is due to impurities (carbon dioxide) retained in the blood, and the lack of sufficient oxygen.

Yet, I will prove to the reader that, when I explain what I deem a much more important discovery, that these impurities were not taken into the blood from the impure air, but that the breathing of impure air containing poor quality or quantity of oxygen causes the retention of the impurities in the blood that are eliminated by the lungs and other organs when breathing air of good quality.

These experiments positively refute the assumption made by physiologists that the heart and muscular contraction of the arteries cause the blood to circulate in the body. They also prove that the circulation of the blood is governed by the law of attraction, affinity, electricity, or call it what you will.

I will give a few inductive reasons, and show how nicely they harmonize with the above demonstration, but have hitherto been unexplainable. Take, for instance, the fetal circulation before any real heart exists, and especially the circulation from the placenta (afterbirth) to the child in *utero*. In fact, it was the observation of the fetal circulation which gave me my first thought, and it was the nucleus which formed for me the theory that the circulation was caused by an electric or attractive force.

Then we have the fluids circulating through the glandular and lymphatic systems without a heart.

Another example is the sap circulating in a tree which has no heart to pump it.

It proves why we feel so loggy and sluggish in muggy and hot weather, and immediately begin to feel brisk and exhilarating in a cool breeze. This is due to the difference between the quality and

the quantity of oxygen of the air per volume, the result of the expanding and contraction of the air by heat and cold.

The very size of the heart itself refutes the idea that it could accomplish such a heroic task as circulating the blood as, all other things equal, size is a measure of power. Think of a two hundred pound man sitting between board and bone, and you will readily see the impossibility of the blood being able to circulate if it had not a powerful attractive force.

The reader can plainly see that I have not presented a theory. I have simply explained what most any one with a little practice can demonstrate for himself upon a living animal.

A little reflection will make it appear plain that no machinery would stand the terrible strain that it would take by an organ to pump the blood throughout the body. Nature has provided a more rational means—one not so liable to degenerate, as well as not contradicted by every law of nature.

These facts just reverse our present opinions and beliefs as to the cause of disease. I will just give one little illustration. Our soldiers at Chickamauga Park during the war with Spain were composed of about fifty thousand of the physical cream of our young manhood, selected from all over the country. General Alger was given the blame of furnishing these soldiers with poor and adulterated foods, and to this, it was said all the blame for the terrible amount of sickness among those strong and healthy men was due. Yet, there would be no doubt that, if these very men were placed under similar conditions in Northern Wisconsin and given the same food, they would generally be healthy and flourish, for the identical same reason that feeding a stove or furnace with good fuel, but not receiving the necessary amount of oxygen to burn it up, the fire would be poor and produce much more smoke, ashes and clinkers. These soldiers being taken away from a colder climate to which their system was adapted and being placed in this sudden warm atmosphere, the sudden change would have about the same effect upon the human furnace as it would upon an artificial one.

Another point that demonstrates positively that the heart is not the real propelling power of the blood is the fact, known to the ancients, that after death the arteries are empty. It was from this phenomenon that the belief arose that the arteries contained no blood, but that they contained air, hence the name artery, which means air pipe. Now, if the heart were a pump, it would be impossible for the arteries to be empty after death, for when a pump ceases to do its work the fluid pumped would cease to flow, especially straight upwards, consequently the blood would remain in the arterial system.

To make it as clear as the noon day sun that the heart does not circulate the blood is an experiment made by taking a fluid, injecting it into the arteries after they have been allowed to empty themselves. You can use all of the force possible, yes, ten times as much as the heart can supply, and you can send the fluid only to the end of the arteries. Enough force can be used to rupture the arteries, but the fluid cannot be carried into the veins, but some will gradually pass through these minute blood vessels. There must be a positive and a negative; this is the law that governs universal nature, which includes the human body. To make it more clear, the veins contain venous or impure or negative blood, due to the oxygen consumed in combustion and nourishing process; and the arteries pure, arterial or positive blood, and these as well as the tissues have an attraction for each other which is the cause of the blood passing readily and quickly from the arteries into the veins. This experiment alone is all that would be necessary to forever brand the old theory as positively wrong.

Is not this problem plain as well as simple, that it is the oxygen from the air that we breathe that creates the proper conditions to circulate the blood and not the muscular contraction of the heart? And this force is not like dynamic pressure, which would strain or even burst the heart while the other works on a different principle—that of mutual antagonism and not of pressure.

To know the real power that propels the blood is of more value and import-

ance to all human beings and all those yet to be born than any physiological question brought out for centuries. It is of great importance to the physician in the information it gives in understanding the cause and in diagnosing and treating diseases. It tells him that the old theories are wrong and that he must look to the physical law of balance and proportion between the internal or bodily and external elements and forces for the cause of all diseases, such as typhoid fever, scarlet fever, small-pox, etc. It tells how typhoid fever and like conditions are often brought about by the person going around full of grief, down-hearted, letting his head hang, and seldom, if ever, taking a full breath to send the blood bounding through the capillaries and gradually choking up the fires of life. It is almost impossible to keep up the blues if you keep the normal blood bounding through the system by filling the lungs full at every breath with pure air. It also tells us why the people in hot climates (where heat expands the air, hence contains less oxygen per volume), get lazy and indolent. This well-known fact would indicate not only that every physiological fact goes to show that energy or nervous force is mainly created in the process of combustion and should depend almost entirely upon the blood being charged properly with pure air so as to keep up the functions of the body normally, which is health.

Everything in the universe is governed by what is differently called power, energy, force, electricity, affinity, attraction, etc. The earth, sun, moon, and stars are so accurate in their movements that time is entirely measured by them—each and every one is entirely dependent and related to one another. Man himself is dependent, related and united to them.

There is one thought that I would like to indelibly impress upon every human mind, and it is this, that there is nothing in all the Creator's laws but what is especially arranged for the pleasure, health, and happiness of every human being, and that it is our own fault, through our neglect and false education, that humanity is deteriorating in her constitution and that she is suffering and

afflicted with the untold misery in her midst. It is not due so much to the ignorance of the human being regarding these laws of nature; this truth is demonstrated by the fact that all animals, the savages and the Indians are afflicted with very little sickness in proportion to ourselves; but it is due to the false conditions created by themselves, through false ideas and notions created by our own intellect, while if we should follow our instinct like the animal we should suffer as little as they do.

There is no organ in the body and no element taken into the body that has as much influence, directly and indirectly, upon our health and upon the disease we are tortured with as the neglect or proper use of the lungs and air and the *taking of the proper kind of food and proper quantity*. Why is this so? We know that the system is continually burning used up tissues of the body, which must be carried off by the different organs; we also know that oxygen is the element that burns; when this element is furnished in less than the needed quantity this process of combustion or burning in the system cannot be good, just as the fire in your stove will not be good if you do not have oxygen enough in the air. You not only have a poor fire but you have more clinkers and ashes than if you had a good fire and the clinkers and ashes will soon clog up the stove so that you have a poor fire in spite of your efforts, good air or not. So with the system; if your lungs do not furnish plenty of this oxygen to burn up the fuel which is needed you have a poor fire and poor nourishment to the body, but causing more clinkers and ashes to accumulate in the system. You may think it is peculiar reasoning to compare the body with a stove; it is not only a fair comparison, but they are identically alike with this difference, that the fire burns the carbon in the wood and coal for heat and the remainder goes to smoke and ashes, while the human system burns up the carbon in the food to furnish the heat of the body and create energy; so far they are alike, but the food of man contains other elements which the body uses to nourish it; the rest is smoke and ashes and is carried off by the lungs, skin, kidneys, etc.

Some Facts About Walking

SOME INTERESTING AND INSTRUCTIVE HINTS
REGARDING THIS VITALITY BUILDING EXERCISE

By Alvin B. Kuhn

Walking is the best of all exercises. You cannot enjoy the highest degree of physical vigor without it. The writer of the following article has a few practical hints that will unquestionably be found of interest.—Bernarr Macfadden.

SO many and so undoubted are the benefits of walking that, as a form of exercise, it has won a secure and prominent place in all advanced systems of health culture. The physiologies have long declared it to be "the best of all exercises," and certainly it would be difficult to name another mode of bodily exercise that, for the maintenance and promotion of normal health, could seriously dispute its right to such high praise. But its advantages have been so well set forth in various articles in this magazine heretofore that an extended enumeration of them is not called for here. I have thought, however, that physical culturists might be interested in two or three phases of the subject that were brought to my notice during some recent observations of my own manner of walking—observations that grew out of an attempt to remedy a long-standing physical imperfection.

As a result mainly of some eight years' service at the typewriter, I had contracted a lesion of the spinal vertebrae between the shoulders, that always grew painful during an extended walk. The

circulation to the arms was then so restricted that, if the weather were at all cold, my fingers would in a very short time become icy and almost powerless. The lesion failed to mend under one or two methods of treatment, and my delight in pedestrianism, formerly quite keen, gave place to a growing dread of its invariable effects. But some time ago I began to study closely my gait and carriage, arguing that there must be some close connection, probably of cause and effect, between these and the attendant pain. It

was during this course of scrutiny and experimentation that the facts about which I wish to speak were brought to notice.

Formerly, whenever I chanced to think of it while walking, I had endeavored to carry my body erect. But on one occasion, happening to catch sight of my shadow while I was supposedly walking erect, I was surprised to note how stooped my posture still was. The conclusion forcibly pressed itself upon me, that the undue strain brought to bear upon the spinal muscles during a walk—the cause of the pain—must



Easy stride with body erect and chin drawn well down on chest. Nature's method of maintaining restful poise in walking.

be attributable to an unnatural, unbalanced poise of the head, shoulders and upper back. It seemed logical to my mind that, as I did not in walking actively use the muscles lying between the shoulders, there was no just reason why they should tire, unless subjected to some strain in maintaining an unbalanced posture. And with this verdict in mind, I turned again to scrutinize myself and was a second time surprised and shocked to note how under a tension I was carrying myself. I found that unwittingly, in the effort to keep my shoulders in proper position, I had been holding them strenuously back and *up*, instead of back and *down*, that my head had likewise been set in a rigid position which constantly involved no slight strain upon the muscles of the neck and shoulders, and that in reality I had not thrown any part of my upper body back far enough to enable it to rest its weight upon the pelvis or lower spine in perfect equilibrium. The result was that I had not only been expending the necessary amount of energy in mere propulsion, but was subjecting other whole sets of muscles that ought to have been relaxed and at rest to a severe energy-draining process.

Having found the trouble, I proceeded to remedy it. On my next walk, I first straightened myself to a posture that *was* erect, and then relaxed all those shoulder, neck and back muscles that I had formerly held so tense, adjusting my carriage until, as nearly as was possible after so long an abnormality, my whole upper frame sat restfully upon its natural basis. The grateful sense of ease and restfulness which ensued abundantly corroborated my judgment as to the former incorrectness of my attitude, and was in itself the indication and proof that my present one was right. It required almost ceaseless attention to keep from slipping back into the previous distortions; but



Approximate position of chin, neck and shoulders, at moment of planting foot forward.

constant practice has made it ever more habitual and easy. The body, long injured to wrong customs, does not so readily reassert its full native grace.

I paid some attention likewise to my stride, and found both that the speed could be increased and a certain rhythmic swing, that lent a zest to the exercise, imparted to the gait, by a slight alternate turning of the body from side to side at the hips, in such a way that at each step the pivot from which the leg swung as it reached forward would itself be advanced an inch or two, thus adding to the length of the step without entailing increased exertion. In fact, when in the swing of this movement, the legs seemed almost to stride along without any voluntary propulsion whatever, by a kind of harmonious automatism, and felt capable of an indefinite performance.

But I was yet to discover a most startling fact—startling both because, after I had become familiar with it, it seemed so natural and inevitable, and because, in common with the rest of the world, I had missed it for so long. It transpired when I had thrown back my head and shoulders into their natural restful poise and completely relaxed all their muscles. Keeping my chin well down and in, I no sooner fell into my new rhythmic swing than my head began to nod, or bob, as one might not inaptly term it, slightly up and down, like a horse's when not checkreined. Astonished by so singular a development, I yet caught on the instant a revelation of the truth that nature, if not perverted, tends to hold—almost to pull—the head splendidly erect, with the chin well under. For the movement was a sort of tugging at the neck, best described by likening it to a repeated effort which one might make to stretch the back of his neck and head upward. It seemed to be pulling one ever more and more erect.

It was not difficult to determine the reason for this unexpected outcome of my experimenting. Heretofore I had been holding my head in a false pose by a constant, if unconscious, tension, and of course it stayed where it was held. Now, released from all tension, it was for the first time able to permit nature to look after herself (which she is ever more ready to do than we are ready to believe). And my head-bobbing was simply nature's rhythmic method of maintaining the equilibrium of the body, rhythmically disturbed at each step. There was nothing odd or ungainly in the motion. In fact it was scarcely perceptible to others, or, if noticeable at all, it doubtless was merged so fittingly with the whole general movement of my walk that it was not felt to be a separate peculiarity. If this custom were universally practiced there would be no more oddity or unnaturalness about it than there now is about the same movement in the horse. As I continued to put the method into practice I realized more and more how large a portion it contributed to the sum of the benefit derived from walking. As a corrective of stooping I can conceive of no better instrumentality than this, of merely letting nature have the chance to do what she is endlessly eager to do—keep you straight!

I thought that with this discovery I had achieved the final triumph in mastering the art of walking. But there was one more step to be taken. And it might be stated here that the fact which next broke in upon my intelligence, as constituting the crowning and essentially vital element of it all, holds the same prime relation to all other forms of exercise—yes, to all forms of human activity. It was the mind's share of the exercise. I knew that walking ought to be enjoyed. So I set my mind in an attitude to receive whatever pleasurable sensations might proceed from the exertion, and was rewarded even more generously than I had anticipated. It was necessary to bring the mind to a pretty close attention to the bodily motion; to let it swing with the legs, so to speak; to think of and feel the sense of physical exertion—in a word, to infuse the mind thoroughly

into the process, before the happy result came. But when I had made the effort one sunny morning while trudging over a country road, there came a keen sensation of muscular delight thrilling through my entire system. I had struck the note that rendered walking a harmony, mind blending with muscle in the process. In this as in all else it was necessary to pour "the heart into the work." The thoughts dare not be too abstracted, too far withdrawn from the bodily action. And it is this fact that throws light upon the so frequent failure of busy city folk to derive either pleasure or profit from "walking for health." They do not rid their minds of the customary burden of business or other interests that engross them, and consequently are unable to enter with any spirit into the exercise. The mind must be care-free and keenly set to enjoy the exertion. From this phase of the subject walking gains another point of usefulness;—it becomes a valuable means of escaping from depressing states of mind, by absorbing the attention in healthful physical sensations.

It might be interesting, as a final point, to ascertain how far walking in common with all other bodily movements, is affected by, and becomes an index of, force of character. Purity of thought and act, high ideals, with sincere and steady effort to realize them, general earnestness and energy of right purpose in life, will, as part of their tonic exhilaration of the entire physical man, be found to make themselves manifest in the walk, in a vigorous decisive stride, erect carriage and a buoyant, elastic tread. It would be difficult to attribute these characteristics, even in imagination, to the walk of a culprit.

Since adopting these more natural methods, walking has become again the delightful exercise is used to be. Moreover, the lesion between my shoulders has practically ceased to annoy me even on my longest tramps. And branching forth from these main and immediate benefits, have come a score of other attendant or consequent good results, almost any one of which would have compensated for the pains necessary to effect the transformation.

The Crime of Coddling

THE RESULTS OF A HOTHOUSE MODE OF LIFE ARE WEAKNESS AND THE DEVITALIZATION OF BODY, BRAIN AND CHARACTER

By Harry G. Hedden

Love, so-called, has prematurely opened yawning graves for millions of human beings. Sympathy is all right in its place, but an affection which follows the policy of shielding one from every effort or possible unpleasantness is disastrous to the building of the hardy physique and force of character essential to the success and happiness for which every one is striving. The development of manhood and womanhood of the right sort can never be accomplished through coddling. In the article which follows, the author makes some noteworthy statements on this subject.—Bernarr Macfadden.



NE of the most pernicious products of perversion, one of the greatest curses of modern civilization, one of the manifest causes of degeneracy, is the crime of coddling. Yes, coddling is a crime; and coddling is a cause of crime.

Coddling tends to hinder the development of both body and mind, to weaken the will, to demoralize natural instincts and emotions, to destroy self-control, to create selfish and unworthy ambitions, to lead to monstrous excesses, and to produce deformity, disease, and degradation. Its blighting influences often begin at the hour of birth, and continue until the last breath of life.

Children are fondled and bundled, candied and coddled, and soaked with soothing syrup, until they are miserable creatures of appetite and impulse, of peevishness and perversion. They cannot tell whether they are hungry or sleepy, whether they need rest or exercise, whether they want to crow for condensed milk or cry for Castoria. They are not given a chance to live normally, a chance to grow as they ought to grow, a chance to develop naturally into strong, properly poised, intelligent and pure manhood and womanhood. With bodies weakened, with organs disordered, with normal appetites grossly perverted, with natural affections and impulses pampered and poisoned, these innocent offspring are surely deserving of pity. So are their ignorant parents.

A person who has been petted, pampered, and perverted by unrestrained indulgence of every appetite and passion finds but little true happiness in this world of wickedness and woe. He is constantly getting hurt. He is always in misery, eternally in trouble. Nobody appreciates him; everybody abuses him. His feelings are like an arm rendered painfully sensitive by vaccination; the slightest bump causes extreme agony. To the rest of humanity, too, such an unfortunate person is about as useful as is the helpless arm to the victim of vaccination.

Is it not a crime for a person thus to render himself unhappy and useless? Is it not a far greater crime for parents to bring a child into such a deplorable state of degeneracy?

Let us study some of the ways in which people thus grievously wrong man, grossly insult Nature, and sin against God. To be sure, a great many of these erring people mean well. It would be very unkind to accuse all of them of sinning intentionally; but it is not unkind, surely, to remind them that they are sinning, though sinning ignorantly. The mere fact that they mean well does not prevent the serious consequences of their sinning. Many of the most monstrous crimes of all the ages have been committed by people who meant well, and who meant well with intense earnestness and enthusiasm. It is both unfair and foolish to abuse a person for doing wrong when he thinks he is doing right; but it is both sensible and fair to point out to such a person that he is making the terrible mistake of doing just

the opposite of what he wants to do and of what he thinks he is doing.

The Prince of Pickledom advertises with intense enthusiasm his "fifty-seven varieties." The abnormal taste of the depraved public demands about fifty-seven thousand and fifty-seven varieties of the spice of perversion to pander its insatiable desire for stimulation.

No, I shall not attempt to discuss in this screed all the numerous and various forms of this evil of coddling. I fancy that the Editor would not wish to publish a lengthy installment of such an article in every issue of *PHYSICAL CULTURE* for the next year or two. Neither shall I endeavor even to mention all the kinds of coddling that are fashionable to-day. I shall, however, try to set forth in a suggestive way, several of the most commonplace forms of this pernicious practice, and to so present this terrible plague as to induce every reader to examine himself carefully in an earnest effort to determine whether or not he is infected.

People coddle themselves with excessive and extravagant clothing. They dress not for protection, for comfort, or for health, but for display, for style, and for pleasing sensations. This dressing for display affords a marvelous display of cerebral poverty. This dressing for style strongly suggests that sense is not stylish. This dressing for pleasing sensations tends to create sensations highly pleasing to Satan. Bundling tends to weaken the body's natural power to resist cold and to adjust itself to changes of temperature, to interfere with the normal working of the excretory function of the skin, and to produce general weakness and abnormal desires. Unnatural, unhealthful customs of dress are immoral and abominable.

The science of heating is a very interesting study; so is the senselessness of heating. Modern methods of heating are far less marvelous than the modern demand for excessive heating is monstrous. Many heating plants are praiseworthy products of engineering skill; many human house-plants are pity-worthy products of demoralizing nonsense. The power of these heating plants to generate heat is admirable; their tendency to de-

generate humanity is deplorable. Authorities upon hygiene tell us that it is wise to keep the temperature of a house between sixty-five and seventy degrees Fahrenheit. For your geraniumized individual, however, your tender plant of tropical habits, a far higher temperature is necessary. Dwellings, offices, stores, churches, and cars must all have a temperature higher than French heels, the price of pedigreed poodles, or the healing-power of Peruna. It is not strange that the doctrine of a hell of extreme heat is losing its terrors for those accustomed to the soothing and stupifying sensations of the temperature of the average aristocratic church.

Along with this fervent longing for weakening warmth is that foolish fear of fresh air. The coddler is more afraid of a draft than the Czar is of an anarchist. Windows and doors must be kept closed in winter as much as possible. Storm-doors and storm-windows must be put up. Some people even go so far as to stuff up all the crevices they can possibly discover by their highly developed sense of draft-detecting, and then further insure themselves against having their health burglarized by treacherous fresh air, by sleeping between two feather beds. It is too bad that they are not able to hibernate after the fashion of bears, woodchucks and snakes.

One of the worst forms and effects of coddling is muscular inactivity. This most nearly approaches infinity in our cities, where civilization is supposed to be brushing the fringe of the zenith. Carriages, cabs, cars, and automobiles are all contributing liberally toward the evolution of man out of the low stage of a walking animal and into that higher stage of a spiritual being floating in ether and cigar-smoke. Our modern business methods, too, are almost as destructive to the development of a healthy body and the use of strong muscles as they are to the development of strong character and the use of a clear conscience. To be sure, the gesticulating and vociferating necessary in certain lines of business (gambling on the Board of Trade, pulling political wool over the optics of the public, etc.), and in the performance of certain social duties established by the elite

(priming, bowing, displaying clothes, gossiping, gulping booze, giving toasts, getting divorces, cheering and sniffing at the theatre, swearing at servants, caressing canines, etc.), call forth considerable muscular activity of a spasmodic nature; and this activity tends to add to the life of the social whirler a few days of grace—or disgrace. The average person, however, who is not struggling with might of muscle to roll from the path of life the huge rocks of starvation, oppression, disease, and despair, does not take enough muscular exercise to call for a fourth of the food he eats.

A most dazzling gem in civilization's coronet of coddling is the ruby of gluttony. Many centuries ago, a pessimistic poet of glorious Greece recklessly philosophized thus: "Far more people die from over-eating than from lack of eating." That poet wrote those words years before the coming of Christ, whose life of self-denial church-going gluttons mock with self-indulgence. Even Solomon, whose wisdom perhaps consisted at least in part in ability to learn from both observation and experience, uttered powerful condemnations of gluttony. Still, in this glorious twentieth century, this wonderful age of enlightenment sublime, we seem to imagine that we have discovered something "new under the sun"—the fact that gluttony is a virtue, a saving grace, a mark of progress and of piety. Our sentimental sympathy prompts us to furnish free soup to the starving victim of deplorable social and industrial conditions; but our mind-muddling gormandizing prevents us from ceasing to support the pot-bellied politician, who is responsible for the monstrous oppression which makes it almost impossible for an honest man to live. Yes, we in whose tombs wisdom will be laid to rest have discovered that both the poet of Greece and the wise man of Israel were led astray by the winsome wiles of an entrancing imagination. Probably, nevertheless, if that philosophical poet of the once frugal and powerful Greece were living to-day, uncontaminated by our civilization of wealth, luxury, selfishness, and sensuality, he would be sufficiently reckless and pessimistic to write those same words. Per-

haps, too, if that wise and wealthy tyrant of the once hardy Israel were still living, with all the wealth and wisdom he then had and all he could have accumulated in these twenty-eight hundred years, he would call his stenographer to him in some moment of dyspeptic despondency, and dictate in a tone suggesting deep conviction, "The drunkard and the glutton shall come to poverty." The glutton is guided far more by belly than by brain. Gluttony is a monstrous foe of self-control; and self-control is one of the most vital elements of character.

This nonsensical practice of excessive and stupid eating is becoming such a prominent factor in social and even religious gatherings, that we must not be seriously surprised if we some day find pious followers of the decrees of fashion serving pork-sandwiches, pickles, and coffee at prayer meeting. A lunch is especially appropriate and helpful at a missionary meeting in the afternoon or evening. It tends greatly to increase our appreciation of the dire need the famine-stricken heathen are suffering for Christianity.

Among the fashionably foolish of the "fair sex," the Queen of Coddledom is the corset. This heavenly invention for the angelizing of woman surely must have come from inspiration. It is about as great a boon to the woman seeking physical beauty as is the philanthropic Mrs. Pinkham's pearly-gate preparation to the woman seeking physical strength. Yes, the corset is a wonderful blessing to womankind. It is an invention made necessary by the carelessness of the Creator, who didn't take time to consult a Parisian authority upon fashion before He made woman and established the laws governing the form and development of her body. The corset relieves woman of the responsibility of living naturally, and eliminates all need of anxiety concerning the care of the body and the development of a perfect form. The corset makes a woman supremely beautiful—almost as beautiful as the devil's dish-washer.

A philosophical Kansas farmer, who evidently has more natural appreciation of the truly beautiful than he has abnor-

mal admiration for the fashionably abominable, one time remarked to me, "Well, sir, I think it would be hard to tell which causes the most misery, whiskey or corsets." However that may be, there is abundant evidence that the corset, infernal instrument of deformity, ruiner of health, and destroyer of womanhood, is no more entitled to the condoning of Christian civilization than is the bust of Captain Kidd to a place in the Hall of Fame.

Prudery is another substitution for sense. Prudery is a drug which dulls the intellect and benumbs the conscience. It causes parents to shirk the sacred responsibility of teaching their children the most important truths of life, and to turn over to the devil of ignorance and perversion the innocent offspring entrusted to their care by a God of purity and wisdom. This reason-wrecking curse makes people imagine that God has given to mankind a power too vile to be discussed, studied, understood, or intelligently used. Prudery thus pictures God as a God of vice instead of a God of virtue. Prudery makes the human blood blush with shame for visiting all parts of that foul organism known as the human body. Prudery makes Nature shed bitter tears of repentance and remorse because of her terrible impurity. Prudery is a favorite tonic of those dispensers of (or with) justice who sentence a pure man to a term in the penitentiary for striving to uplift a sin-enslaved race. Yes, prudery is a powerful stimulant, a delightful soothing syrup for a crying conscience. It is a brand of dope approved by Mr. Anthony Comstock, the United States Post Office Department—and the Superintendent of Hell.

Another one of the expressions and effects of this abominable sin of coddling is immorality. Whether without or within the bonds of marriage, immorality is immorality—and immorality is one of the fruits fostered in the garden of self-indulgence. Immorality is one of the results of being driven by perverted passion and abnormal impulse instead of being led by natural instinct and intelligent thinking.

The American saloon, the pet institution of the Government of this glorious

land of liberty and enlightenment, is a grand monument of coddling. The pandering of the appetites of both the oppressed and the oppressors is one cause of the saloon. The power of the monstrous priests of the god of greed is another cause. However numerous the causes of the existence of the saloon, back of all these causes is the sin of self-fish indulgence.

Alcohol, tobacco, tea, coffee, and all sorts of drugs and narcotics are employed by the perverted as producers of pleasing sensations or as substitutes for natural and intelligent use of the physical powers with which Nature has endowed the human race. If this depending upon drugs to do the work of the organs God has given us is not a mark of degeneracy, what is?

This insane desire for stimulants, for substitutes for intelligent obedience to Nature's laws, has created a market for countless kinds of instruments of depravity. Is it any wonder that in the realms of literature, music, the drama, art, education, and politics, in the industrial, social, and religious worlds, we find the superficial, the stimulating, the perverting, the abnormal, the monstrous? Is it any wonder that we see everywhere weakness, crime, degeneracy?

What is the stage to-day? In the first place, it is an insult to civilization. In the second place, it is just what civilization—money-worshipping, sensation-seeking, drug-doping, lust-serving civilization—has made it. The stage is trying to help supply the demands of a pignep public for sensual swill. To be sure, there are a few playwrights and actors and theatre-managers who are earnestly striving to elevate the stage in order to help humanity to a higher level of life; but for every one of these there are a thousand who are striving solely to raise hell in order to make money. Whatever place the stage may ultimately have in the realm of religion, it is at present surely furnishing an abundance of evidence in favor of the doctrine of total depravity.

What is true of the drama is also very largely true of the novel and the newspaper and other instruments for the

development or the destruction of public morals. "Ye can not serve God and mammon." This is not any arbitrary command, "Ye shall not;" it is a plain, strong statement of truth, "Ye can not." No man who is a slave of money can faithfully serve his fellow-man.

How about the Church? Fortunately the Church is waking up in time to keep from smashing up. The Church is moving forward; it is growing more and more into an institution of universal blessing for humanity. Let us not be boastful, however, in our grateful praise. "Let him that thinketh he standeth take heed lest he fall." The Church is contaminated with coddling, also. Multitudes make religion a sort of sentimental spree, an emotional intoxication, a spiritual debauch. Others, not satisfied with owning nearly all the earth, but ambitious also to rule heaven, are striving to commercialize Christianity. Having succeeded in commercializing everything else, even honesty, virtue, love, marriage, and home, they would like to rule the Church with their scepter of coin.

There are perverts who look upon the churches as merely dispensaries for doctrinal dope for gouty gluttons, who will not work and for deceiving devils in angelic robes, and for spiritual soothing syrup for Satan-serving Pharisees, and upon preachers as oratorical druggists clad in ecclesiastical garb. If these mammon-worshipping monstrosities and these pious perverts had their way, the Church would soon be gliding hellward at a rate that would make the "Twentieth

Century Limited" look as if it were running backwards two hundred miles an hour. Let us thank God, however, that these enemies of progress and enlightenment and right living are not having everything their way, the way of destruction. Although Easter Sunday sometimes suggests to the cynical that the resurrection of Christ has caused more money to go to the milliners than to the missionaries, yet close touch with the loving lives and heroic sacrifices of those who care more for brains than for bonnets, more for souls than for styles, brings cheer to the sad heart of him who is tempted to surrender to doubt, discouragement, and despair. Yes, the Church of the living God, with its message of infinite love, is moving forward. Truth is gradually triumphing over error.

Sometime, perhaps, America will awake to the fact that manhood is more valuable than money. Sometime, perhaps, we shall learn that the laws of Nature, unlike the laws of man, cannot be violated with impunity, that Nature's courts are not corruptible. Sometime, perhaps, we shall recognize the crime of coddling, the "deceitfulness of riches," the perils of luxury, idleness, and ease, the worth of work, the glory of self-control, the righteousness of natural and right living, the power of purity, the sublimity of service.

Sometime, perhaps, a child born in free and enlightened, and Christian America will have a fair chance to grow naturally into a pure, strong, useful, happy man or woman.

A Minister Calls Physical Culture the "Gospel of Health"

TO THE EDITOR:

I want to bear my testimony to the gospel of health which you advocate and for which you are so much maligned by prudish and sensual men. Only to the pure are all things pure, and only him who has the altruistic spirit can appreciate the high ideal of your life. The same God who delivered Daniel from the lions shall stand by you in your great trial. I suppose you rejoice to be counted worthy to suffer for none other crime, but preaching salvation to wrecked humanity. There has been no great man of your type who has not suffered for doing good. We can recall no greater type,

except the great Redeemer, who was so much misunderstood.

I have been a reader of your magazine for some years, and also a recent subscriber. I always hail with delight the monthly issues, which I call the "gospel of health," for in it are the issues of life that now is. I have greatly improved in health and strength since last summer (when I became a regular subscriber), when I suffered greatly from malaria, after following up the exercises and advice as given in your literature.

Washington, D. C.

(REV.) J. C. VAN LOO.

The Cause and Cure of Wrinkles

HOW THESE UNBECOMING DEFECTS ARE PRODUCED—SOME BRIEF SUGGESTIONS AS TO METHODS THAT MAY BE USED FOR THEIR REMOVAL

By Charles Merrilles

FROM a study of the lines of one's hand the palmist will describe to you the various characteristics that are indicated by the nature and location of such lines. Strange as it may seem, these so-called "fortunes" in many cases prove to be peculiarly accurate. Certain indications found in the palm of the hand seem to accompany certain characteristics, and to a certain degree the same may be said of the features. The formation of the features is, to a great extent, affected by one's character. The visage of a rogue, as a rule, betrays his evil nature. Strong and weak characters have certain unerring signs that are easily interpreted by the student of character.

One might also say that the lines termed wrinkles, which are often observed in the face, are indicative of certain characteristics. The thought lines that are found in the forehead are usually evidence of studious habits. They indicate that one has kept the brain busily occupied. They are frequently found in those who possess powers of deep mental concentration. Then there are the crow's feet that are found near the corners of the eye, and there are the lines which are frequently observed beneath the eye. All these facial defects—if they may be so termed—are simply external manifestations of an internal mental condition. Worry, for instance, is perhaps the most frequent cause of a wrinkled countenance. As has previously been stated in this publication, worry is nothing more or less than a poison to the mind; it deteriorates nerve tissue, it devitalizes the blood, it is destructive to mind, body and soul. If you are in the habit of worrying, you will be merely wasting your time in attempting to eliminate wrinkles from your features. Even if you are able to remove these defects, they will soon reappear if

you are a slave to worry. Worry and fear are companions. Figuratively speaking they usually travel through life arm-in-arm. Where you find one, you usually find the other. Fear is a frightful handicap; it stands in your way and blocks your progress. It interferes with ambition, it blights and destroys enthusiasm. No matter what prospects life offers to some persons, they are held back by fear. They are fearful of taking up opportunities that come their way, and are constantly confronted by this "demon," that interferes with their happiness and success throughout their entire lives.

Self-pity and worry are also companions. Anyone who is habitually looking for cause for self-pity is nothing more than a poor human slave. "Seek and ye shall find." If you are continually searching for an excuse for self-pity throughout your life, you will find what you are searching for. Like the man who goes about looking for trouble, you will "get what is coming to you." If, on the other hand, you adopt opposite mental characteristics, if you search for the bright moments of life, you will find them. In other words, you can make your entire career a series of thanksgiving days. You will always be giving thanks for what you have received. Although there may have been a great deal of suffering in your life, if you were to compare your experience with that of others, no doubt you would be forced to conclude that the misfortune that you may have been compelled to endure is insignificant when you consider that which has visited the lives of thousands of others.

So much for the mental causes of wrinkles. In nearly all cases one will also find important physical causes. The lines found about the eyes indicate, in practically every instance, defective circulation. They are often associated with anemia and emaciation, but where they

are not associated with these complaints, poor circulation to a very large extent emphasizes and materially helps to produce them. Whenever you will find wrinkles, there in nearly all cases you will find defective circulation. The tissues do not possess the vitality which they should have in order to properly perform their functions. The tissues that form wrinkles might be termed partially dead, for as a rule they are harboring a large number of dead cells. These dead cells, instead of being carried away by the circulation, as is usual under normal circumstances, accumulate in the tissues and materially affect their vitality.

From the reasoning thus far presented, it must be quite plain to the reader that wrinkles have two prominent causes. They are brought about by mental conditions of various kinds, which are inclined to interfere with the serenity of the mind, and by general physical defects which lower the vitality and materially hinder the proper circulation of the blood in the features as well as in all other parts of the body.

Now, with these plain conclusions, the logical method to be followed by one who is searching for a cure for wrinkles would be two-fold in nature. It would be necessary for one to make strenuous efforts with a view of developing that mental calmness which is essential in order to avoid the worrying habit. Then it would also be necessary to make every endeavor to build up the general vitality with a view of remedying the defective circulation which results in this particular trouble. It would be impossible to enter into the detailed advice that is necessary in order to bring about results in an article of this limited scope; further more, it is needless, for the instructions for general constitutional upbuilding that appear in this publication, give advice which can be followed with a great deal of benefit. Diet is, of course, of very great importance. Diet should be carefully studied and one should master the science that has to do with the proper nourishment of the body. The diet should be so regulated as to insure proper activity of the bowels. No one can have a clear, smooth skin if the bowels are continually constipated.

Poisons are of course thrown into the circulation from the alimentary canal, under circumstances of this nature. These poisons must be eliminated, and though various other depurating functions help throw out these impurities, it is easy to understand that the pores of the skin are also compelled to assume some of the duties essential to this process. You cannot expect to have a clear smooth skin while the body is reeking with impurities resulting from defective bowel action.

With wrinkles comes the appearance of old age. They make one seem much older. With their removal, there is always a decided change. One appears younger and more vigorous, more alive and awake. Wrinkles and senility are very closely associated.

A great many persons are inclined to believe, when they find wrinkles beginning to appear, that the trouble is purely local, and they proceed to purchase all sorts of remedies and apply them with the thought that an outward application will quickly remove the defects. In practically every case they are doomed to disappointment. They find to their sorrow that they are simply an outward manifestation of an internal condition. To remove wrinkles from the face, one must first of all, in most cases, remove figurative wrinkles from the brain. One must take some of the "kinks" out of the muscles, and must begin to develop a supple, active and strong body. All this will mean better functioning, it will mean an improved quality of blood, and with this life-giving fluid more thoroughly impregnated with those elements that add health and strength to the tissues of the body, you will find a decided change for the better not only in the indications of age that are appearing in your features, but in the tissues of every part of the body.

All exercises that will add to the general vigor of the body are to be recommended for removing facial defects of this nature. Long walks, for instance, are splendid wrinkle eradicators. They will help to drive the cobwebs from your brain. They will help materially to purify the blood through adding vigor to the entire functional system. They will

accelerate the activities of the circulatory system. They will bring added color to your cheeks, thus indicating that more blood is being circulated through the arteries and veins that underlie the face. More vigorous exercise than walking, however, will, of course, bring about quicker results. Some very active use of the muscles, that will very materially increase the heart action and will require you to breathe fully and frequently, will increase the circulation of the blood in the face to such an extent as to give you a flushed, heated appearance. Exercise of this nature, if taken at frequent intervals, will in every case very materially assist in the eradication of wrinkles. Wrinkles, as previously stated, are a sign of age. They are associated with the inactivity, the stiffness and the half-alive condition of the tissues that accompany age. If you immediately go into the business of driving old age out of your body by eliminating dead cells through the active use of all parts of the body, then this will be strongly evidenced by your features. If you so desire, you can accompany these efforts with the use of facial massage, or by a mask that can be worn at night, or even by a mild face bleach, though please note that none of these are absolutely essential to bring about the results desired.

Wrinkles can be smoothed out, but what can be gained by this momentary smoothing process if the blood that feeds the tissues under these wrinkles does not contain the virile elements necessary to thoroughly nourish every cell therein? You must be made to realize that wrinkles mean impaired blood and defective circulation. You must purify the blood by all the various methods suggested therein. You must accelerate the circulation, and if these suggestions are followed, you will really and truly be amazed at the results. To eliminate wrinkles, you must remedy all the other results of old age. As one gains strength and suppleness you will find signs of this change slowly but surely appearing in your countenance.

There are, of course, other causes for wrinkles, but in reality they are incidental. For instance, the use of strong soaps, containing large quantities of

alkali, will be inclined to absorb the natural oils of the skin and very materially help to produce wrinkles. The frequent use of soap on the face is not advised, in fact, the complexion will be in a far better condition if no soap at all is used. Of course, under such circumstances the query will naturally be, how can the face be kept clean? As a rule, the face can be washed in ordinary cold water without soap. Where dirt has accumulated and the face actually needs a thorough cleansing, some good grade of cold cream may be used, or what is better still, olive oil with the color removed. As this publication has previously stated the color can be removed from olive oil by placing it in the rays of the sun for several days. If this greenish color is not removed from the oil, it will be inclined to give the skin a similar color. When the color, however, is removed from the oil it will appear as white and colorless as water.

Many are inclined to wonder at the clear complexions that are possessed by actors and actresses. This is an especial cause of wonder when it is considered that they are compelled to put up with all sorts of discomforts and are often victims of dietetic evils of all kinds. To a large extent their superior complexions are maintained by their habit of using cold cream on the skin before "making up" each day. After they are through with their performance, they remove what is termed the "make-up," and then the cold cream. Some actors and actresses never use soap of any kind on their faces on any occasion. This to a large extent accounts for the smoothness of their skin and the superior complexions that many are able to maintain, even to advanced age. Remember also that these results are maintained in spite of the dissipation that many of them indulge in habitually.

Sanford Bennett, who is now nearly sixty-five years of age and who looks but little beyond thirty, has been able practically to eradicate wrinkles from his features by recovering the youth of the body. He has also used a metal face mask which he claims is of considerable value.

However, he believes at the same time

in building up the tissues by a superior quality of blood.

To recapitulate, my general suggestions, therefore, to those who are desirous of removing wrinkles or rejuvenating the features, would be, first of all, eliminate mental worry; second, increase the general vitality of the body through various means advocated by physical culture; third, never use soap of any kind on the face, but use instead cold cream or olive oil. This should be used at least

once a day, and thoroughly removed from the face after having been thoroughly rubbed in, with either a soft towel or a chamois skin. Massage, a face mask, or any mild mechanical means that will help to remove the furrows from the skin can be recommended. Face powder should be avoided, as it is nothing more than white dirt, and dirt of any kind, white or black is disastrous to the maintenance of a clean, smooth skin.

A Family of Physical Culturists



Mr. Bert F. Norcross and family.

TO THE EDITOR:

I have been a steady reader of *PHYSICAL CULTURE* for eight years. When I began to read it, I was in very poor health, and myself and family have been greatly benefited. My wife says the housework is only half of what it was the old way, and the cost is considerably less. Mr. Macfadden is a great public benefactor, and should be exempted from imprisonment and fine. I believe him innocent of breaking any law of the country.

John B. Gough, in a speech, on "What is Minority," delivered at Tremont Temple some years ago, made the following statement: "The chosen heroes of the earth have been in a minority. There is not a social, political or religious privilege that you enjoy to-day that was not bought for you by the blood and tears and patient suffering of the minority. It has been the minority that has vindicated humanity in every struggle. It has been the members of the minority that have come out as iconoclasts to beat down the dragons, their fathers have worshipped, the old abuses of society. It is the minority that has stood in the van

of every moral conflict and achieved all that is noble in the history of the world. You will find that each generation has been busy gathering up scattered ashes of martyred heroes of the past to deposit them in the golden urn of a nation's history."

Though Mr. Macfadden may be forced by the majority into prison, I believe the readers of *PHYSICAL CULTURE* will multiply faster than they ever have before, and there will be a greater awakening to the study and practice of this science; and there also will be a great monument raised to his memory for being persecuted in this manner. Many thousands more will be interested in the physical as well as the mental training of children. The human forces will then work in harmony, and young people will be enabled to avoid falling into vices which destroy body and mind. The parents of children of this nature and the world need to teach their children purity of body and mind and to obey the laws of Nature, that crime may diminish from year to year.

BERT F. NORCROSS.

23 Weston street, Walton, Mass.

The Salt Habit

The question as to whether or not salt is a wholesome article of diet has been given a vast deal of attention. Though it seems necessary to make cooked food appetizing, it is certainly not required for uncooked articles of diet. The author of the following presents some interesting conclusions.—Bernarr Macfadden.

By Gurdon O. Furey

MAN is a creature of habit—the habits of his own and of his ancestors. So far as I know there is no habit older than the salt habit—that is, no bad or useless habit. In fact the habit is so old that its age leads us to revere it as we do other aged institutions, which we feel we must respect.

Just how, when, where and why the salt habit originated I cannot say, and not until quite recently have the beneficial results of salt-eating been brought into question. Time was when men underwent great hardships and made long trips to obtain this luxury. My great-grandfather, in the early days of Ohio, made long pilgrimages to the "licks" for the family supply of salt. All sorts of dread diseases were predicted for the family whose salt gourd hung too long empty. Away back in Bible times, and, no doubt, still earlier, salt was used as a condiment along with Oriental spices and aromatic herbs. And so the salt habit grew along with the spice habit, and brave indeed must have been the man who first dared to raise voice or wield pen against it—as brave even, dietetically as Luther was morally I dare say.

And what an upheaval he has caused! Since that day the health magazines have been full of salt discussions pro and con. If ever the Scriptural injunction, "Season your speech with salt," were literally obeyed it is at this time. The salt eaters come up with reasons for their eating and the small minority of those who eat it not protest its inutility as a food and pile up facts to uphold them in their beliefs.

Without going so deeply into chemistry as to enmesh the average reader, I wish to make clear, if that be possible, the relation of salt to the body and its physical functions. Do not understand me to refer here to any salt or salts, but

ordinary every-day table salt—the kind you buy at the grocer's in ten-cent sacks and shake over your potatoes and meat and nearly everything you eat. That is *mineral* or "*inorganic salt*" and, by the way, is the only article from the mineral kingdom which we attempt to take habitually as food. "*Organic salts*," chemically so-called, are, on the other hand, constituents of vegetable and plant life and are not to be confused with table salt any more than a potato is to be confused with a stone. That is about the relation the *organic salts* bear to the *inorganic*. By "*organic*" we mean "fit to be appropriated by the organs of the body—*organized*." Mineral elements are very necessary in the building of bone and teeth and even of brain, nerve and muscle and are prepared for this by Nature in the form of "*organic salts*." These are stored in many foods, but particularly in the rind of fruits, the peel of vegetables and the outer layers of grains. These salts thus prepared and stored are "*organic salts*," and are in a form to be appropriated to bodily needs. These same elements in mineral form not changed through the agency of plant and vegetable life are "*inorganic*," and not in a form to be appropriated to body building; of these the most common is table salt.

Taken originally as a condiment along with spices and aromatic herbs, salt has come to be considered an essential article of diet. By its use in white flour products, over peeled vegetables, and with all of his impoverished foods man has fooled himself into believing that he is getting organic salts, and goes on growing decayed teeth, gray and faded hair, soft muscles, weak bones and unresponsive brains, taking cathartics and kidney pills in place of Nature's eliminators, the organic salts.

To prove that table salt is a necessity we are referred to the fact that it is found in the blood and in all the bodily excretions. To me this proves only that Nature is eliminating it as rapidly as possible through all her avenues of elimination. Table salt is found in the blood, the urine, the feces, the perspiration in precisely the same form in which it is taken into the body and this alone should show that it is not appropriated and *cannot* be. No other article of food passes through thus unchanged. The digestive juices have no further effect upon salt than has water. If salt be necessary because found in the blood then the thousand and one impurities and poisons found there are also essential foods.

Now let us see what is its work in passing through the digestive apparatus. In the mouth, salt excites a greater flow of saliva, which is, of course, of itself an aid to digestion. In the stomach too it excites a freer flow of the digestive juices and this is also of itself good. Here, so far as I can see, the good offices of salt come to an end and, so far, its beneficial effects are more than counterbalanced by many evil effects. No one can deny that if salt stimulates thus the flow of the juices it therefore stimulates the appetite also, encouraging one to eat more than he otherwise would, and we are coming to know that overeating is all too common even when no "appetizer" is used. Moreover many foods actually repulsive in their natural state are made inviting by heavy salting—notably flesh foods. Then again salt causes an abnormal drinking of liquid and this too must be thrown off along with the salt. Every saloon-keeper knows the thirst creating power of salt; if you don't believe it go and eat some of his free lunch.

Again by the salt eaters we are told that animals, both wild and domestic crave salt and that salt-hunger is, therefore, a natural hunger in both man and beast. My dear friends, we might thus find excuse for many of our bad habits. The python gorges himself into days of lethargy, but should we? Few animals there are that will not over-eat—foundered horses are common; hogs eat until so fat that locomotion is well-nigh

impossible; the locoed range horse goes mad *for loco* and dies *from* it. I fear we cannot be guided by any unreasoning animal even in the matter of salt-eating. Many animals must live entirely without salt, for in many parts of the world and over vast areas none is found!

Going over to my friend the M.D., I adduce another strong proof of the uselessness of table salt as a food. He tells me that mineral or inorganic iron when introduced as a medicine into the system is not assimilated—every particle of it is excreted as soon as Nature can accomplish the task. As it is with mineral iron so it is with mineral salt, and I am glad to be able to draw thus from our medical friends for a physical culture article.

One more point, and that is that salt taken in quantities acts as a cathartic and is therefore an irritant and a poison, or Nature would not so quickly and violently throw it off.

You who hold table salt as essential try eating the skins of all vegetables and fruits and the whole cereals and see if your craving for salt does not grow less as you persevere. Vegetables cooked "in the jackets" do not call for salt—the organic salts are in the jackets. There is the iron to make red blood and rosy cheeks even as it makes red the cheeks of the apple; there is the enamel to protect the teeth even as the tender meat of the fruit is protected; there are the bone and brain builders in correct proportion and available form.

I recommend also that the liquid in which vegetables are boiled be not wasted for there lie in solution some of the organic salts. An article of food particularly rich in organic salts is the ripe olive. See to it that nursing mothers and growing children have less table salt and more and *more* of the organic salts and a race of sound-toothed, strong boned, clean-blooded, clear-brained men and women shall spring up.

And finally, for those who would look at the salt habit metaphysically there is the question of vibration. The low rate of vibration in the mineral kingdom cannot be raised to the high rate of the animal kingdom save through the intermediation of vegetable agents.

The Japanese-American Question as Viewed by a Chinaman

AN EDUCATED ORIENTAL EXPRESSES SOME INTERESTING VIEWS ON
THE POSSIBILITY OF HOSTILITIES BETWEEN THIS COUNTRY AND JAPAN

By Sun Wing Foo

The author of this article is one of the best-known and wealthiest Chinese in this country. He is an importer of Oriental goods, has a chain of stores in New York City and throughout the United States, the East Indies and the islands of the Pacific. During the St. Louis Exposition he was appointed one of the commercial representatives of the Chinese Government to this country. He has also written for American publications on educational, mercantile and political subjects and achieved a reputation as an after dinner speaker.—Bernarr Macfadden.



DESPITE the fact that I am a native of China, my many years of residence in this country and the centering here of my domestic and business interests, have naturally resulted in my becoming an American in thought and sentiment. This being so, I feel that I not only have the right to praise the virtues of the American public, but to criticize its failings also. Exercising the latter part of this privilege, then, I venture to assert that our public is somewhat given to concentrate itself with feverish intensity on the topic of the moment, and to suddenly and thoroughly forget all about it when the next new thing puts in an appearance. This is not commendable. If there be a matter which is of import to a nation, it should not be lost sight of until its usefulness is established, or its danger proven. To do otherwise, is to invite national weakness—even national disaster. Let us apply this dictum to recent events.

The discussion of the relations of the United States and Japan last fall, took up a good deal of the time and space of our newspapers. Just now, the press ignores the question altogether, or devotes small and sporadic attention to it. Why? Simply because the novelty and zest of an American-Japanese war has worn off. The public has become

satiated with the idea. It has palled on our palates. Our editors (who are supposed to think for the community), find that the prospective war is no longer "news." So instead, they follow in the pursuit of other and later fads, and meantime, events are developing in the East which no Western nation—especially America—can afford to overlook or ignore.

When, last year, PHYSICAL CULTURE gave prominence to the possibility of the Pacific Coast on both sides, being the scene of hostilities, the attitude of Japan warranted the assumption. She was bellicose, impatient of rebuke, unduly assertive of her dignity and what she believed to be her rights. Her cry of "Asia for the Asiatics," was but a thinly veiled "Asia for the Japanese." She carried that which you call "a chip on her shoulder!"

Then came a sudden and remarkable change in her tone and actions. She began to coo like a dove. She disavowed, with much and fervent language, any belligerent intentions. She came to the quick conclusion that her interests and the interests of the United States were identical, as far as the East was concerned. Also, that her love for this country was unbounded and that war between her and America was the last thing in her thoughts.

What was, or rather is, the meaning of this change on the part of Nippon? The visit of the American fleet to the Pacific? No. The apparent readiness of the American nation to defend its rights in the East or elsewhere? No. The current financial condition of Japan? No.

What then? Simply this; that recent events have impressed on the Japanese the fact that China with her trained and growing army of fine fighters and her young, but modern navy, will shortly insist on the flag of the Mikado being hauled down on all Chinese territory over which it now waves. Also, that if ever the United States finds it necessary to draw the sword or point the cannon in the Pacific, it is known, that as matters now stand, she will find a staunch ally in China.

Lest it be thought that my patriotism as a Chinese is running away with my common sense, I would refer the reader to the personal letter recently sent to President Taft by the Regent of the Chinese Empire. In that letter it is plainly set forth that China expects Japan to withdraw from Manchuria at an early date, and the Regent expresses his gratitude to the United States for the interest taken by it in Manchurian affairs. The communication also suggests that "the *lasting peace* of the East depends on the return of the Japanese to their own country not only from Manchuria, but from Korea also." That this is a bold assertion, goes without saying, but it is significant of the intentions of the Chinese authorities, nevertheless. Japan will hardly yield Korea without a struggle. Neither will she release her grip on Manchuria without an appeal to arms. But the remarkably frank tone of the letter in question, indicated that the Chinese Government not only appreciates, but is willing to face and combat

the situation. Besides all this, I believe that the United States will, willingly or unwillingly, find that she is involved in the contest, for reasons which I need not recite.

Finally, I quote from an authority on the subject: "The Chinese must prepare to present a strong front to their ambitious island neighbors, for the purpose of self preservation. There is no reason in the world why China should not become as efficient and self-reliant as Japan did before her. China resents Japan's footing on the mainland in spite of the fact that such footing was obtained under the terms of the Treaty of Portsmouth. The Middle Kingdom is awakening to a sense of its rights and resources and latent powers. That she will not allow any nation, especially Japan, to trespass on her territory or trample on her national dignity, is a foregone conclusion. The old China has passed or is passing away. China as she now is and will be, is to be reckoned with when it comes to depriving her of any of the rights which are hers by the grace of Nature and international law."

So there you are. "Do the present conditions make for peace or war," is a question which I have been often asked of late. To my mind, war is more possible and even nearer than ever. China is getting ready to protest—and strike, if needs be. Japan will fight back. The United States with her many and involved interests in the Pacific can hardly escape being drawn into the conflict. An alarmist, you say? Well, we shall see.

Doctor Wouldn't Insure His Life for Fifty Cents.

TO THE EDITOR:

In leaving a doctor's office in Wheeling, W. Va., in 1899, passing along the street, I caught sight of PHYSICAL CULTURE for the first time. I purchased it, and it was the turning-point in my life, as the doctor told me that he would not insure my life for fifty cents; I might live two weeks at the outside.

Thanks to your teaching, at thirty-seven years young I am getting stronger and better mentally than I ever was.

A few things that physical culture has done

for me is that after fifteen years of tobacco-using I am an abstainer, now in my fourth year. I discontinued all intoxicating liquors; I eat but two meals a day, which plan I have followed over ten years. I eat no meat, subsisting entirely on vegetables, nuts, etc. I cured myself of varicocele without drugs. I have proven to myself by practical experience in many kinds of work that physical culture methods are the right and only way by which to live.

J. A. TOWNSEND.

Box 21, Pasadena, Cal.

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A Pious Hypocrite

THE PRETENDED vs. THE REAL CHRISTIAN—THE CLOAK OF RELIGION USED TO SERVE MATERIAL PURPOSES

By S. Wardlow Marsden

SYNOPSIS.—Samuel Jonathan Walker, is a self-satisfied individual, aldermanic in his proportions and firmly imbued with the wisdom of his opinions, who has for years received a comfortable income as the chief official of the Society for Moral Promotion. At the opening of this story he has been much offended by an entertainment at the local Y. M. C. A., at which Charles Warner, a splendidly developed young man, has greatly pleased the audience by an exhibition of his skill as a gymnast, and the grace and symmetry of his form. Mr. Walker's daughter, Emily, attends the entertainment, and when she later meets Charles Warner, at a church festival, the young people become much interested in each other. This causes much dissatisfaction to Horace Horton, a young man to whom Emily has become affianced, at the behest of her parents, but in whom she finds little to admire. The meeting with Charles also comes to the ears of her father, who forbids her to acknowledge the acquaintance of the young man, on the ground that Charles has proven himself low and vulgar by his exhibition at the Y. M. C. A. gymnasium. Emily Walker is persuaded to visit the Warner home with other lady-members of her church. She becomes acquainted with Mrs. Warner, and strikes a warm friendship with little Edna, Charles Warner's crippled sister. A coolness gradually occurs between Emily and Horace Horton, her regard for him becomes even less friendly than formerly, and his attentions grow distasteful to her. She visits the Y. M. C. A. on Ladies Day, and Charles requests the privilege of calling upon her. This she declines, and her failure to explain her action mystifies Charles. At a meeting of the deacons of the church attended by the Walkers, an application for membership in the church is received from Charles. Mr. Walker objects strenuously to his admission, but is overruled by the vote of three fellow-deacons, no one voting in his favor except Mr. Horton, at whose house the meeting was held. His resentment and hatred toward Charles Warner aggravated by his failure to prevent Charles from joining the church, Mr. Walker determines to injure the young man's reputation. Emily Walker overhears her father declare this intention to her mother, and also hears them voice their fears that she will not comply with their desires and become the wife of Horace Horton. A man calling himself Dr. Jordan introduces himself to the Walkers as a specialist, and promises to cure little Edna's lameness. Emily Walker is extremely anxious to warn Charles Warner of her father's intention to ruin his reputation, but finds herself unable to accomplish this end. Charles and his mother suddenly discover that Dr. Jordan's pretended treatment of little Edna is merely a pretext to enable him to obtain information concerning the past history of the Warner family. Mr. Walker is greatly pleased with the information supplied him regarding the Warner's by Detective Binwell, who had been masquerading in the Warner home as Dr. Jordan. The detective reports to Mr. Walker and Horace Horton that a visit to the former home of the Warners has resulted in an exposure of Charles Warner's alleged breach of faith with the young woman whom he had promised to marry, and whom he had refused to make his wife at the eleventh hour, declining to give any excuse for his action. Mr. Walker determines to use this information as a means of causing Charles to lose his position with the Y. M. C. A. The Secretary, however, declines to consider Mr. Walker's request, and learns that Charles was justified in refusing to wed the young woman to whom he had been engaged, because of her faithlessness. At the behest of Horace Horton, Binwell causes a pugilistic champion named Murphy to join the Y. M. C. A. Gymnasium for the purpose of besting Charles Warner physically. At an athletic exhibition held by the Y. M. C. A., Murphy the pugilist, in the guise of an amateur boxer, and under an assumed name, attempts to lower Charles' colors in a boxing bout, and is soundly trounced for his pains. Charles becomes more popular than ever with the members of the Y. M. C. A. While walking to his home one evening Charles Warner encounters two men who have attacked Horace Horton and Emily Walker, and from whom Horace Horton has fled in fear and terror. Charles fells one of the highwaymen with well directed blows, despite the fact that he is slightly wounded by a revolver shot one of the footpads fires at him. The fallen miscreant's companion takes to his heels. The second highwayman is also enabled to escape through Charles' inability to leave Emily in her terrified state. After expressing her gratitude to Charles for his gallant conduct Emily consents to meet him, despite even the objections of her parents. Charles conducts Emily to a point near her home, but leaves her before reaching her door.

SIXTH INSTALLMENT.

CHAPTER XI.

THE events of the evening had been so startling that Emily felt a trifle confused as she hurried towards home. Charles had appeared to her that evening in a new light. She had already idealized him to a certain extent, but now he seemed indeed a real hero. She had placed him on a pedestal, and, in her imagination he was all that was good and true and noble, but now she had actual proof of his manliness, and courage, and her every nerve was thrilled with indefinable, pleasurable sensations. Surely he was in love with her. She felt it, she knew it. Although no words had been spoken to indicate his affection for her the expression of his eyes, his deferential manner, clearly portrayed his feelings. Previously Charles had been merely an

imaginary hero to Emily. He had not seemed near at hand, but now, he was brought close to her. He was a reality, and she was pleased with the knowledge that he seemed to be within easy reach. She felt that she had it in her power to possess him if she so desired. The question came to her over and over again, what should be her attitude? Somehow, under the circumstances she could not refuse him the privilege of meeting her. Had he not saved her life? Had he not done more? Had he not, in fact, saved her from dishonor? She felt that she owed him a debt of gratitude that she could never repay, and whatever may have been her feelings towards Charles previous to the experiences of that night, there was no doubt that he had now become very near and very dear to her.

These thoughts flashed through her mind rapidly as she moved quickly towards the gate leading to her home. Now and then she glanced over her shoulder at Charles, who stood under the electric light, noting the dim outlines of her fast-disappearing figure. And Horace Horton—the very thought of his cowardly conduct was unbearable. To think that she had wasted her time on such a miserable snivelling semblance of a man! She really felt ashamed of herself. The mere thought that her father and mother desired her to marry such a creature was revolting.

Because of the strong influence of her parents, Emily may have occasionally felt undecided as to accepting Horace Horton's attention, but now the question was settled forever. Under no earthly circumstances could she be made to again consider a marriage with Horace. The persuasion of father and mother, or of every known or unknown power could never force her to consider such an alliance. A certain determination unusual to her was reflected in her features as these thoughts flashed through her mind. In the past there had been moments when she was weak and wavering, but there would be none of this in the future. As she approached her home, she noted that the lower floor was brilliantly lighted, an unusual occurrence, except when company was being entertained. Had they already learned of the affray? Had Horace Horton returned direct to the house? These questions were answered as she looked into the window while passing up the walk into her own yard. There stood Horace Horton, gesticulating wildly. There were four officers and her father and mother, apparently listening intently to him. What was he talking about—was he giving his version of the attack? were the questions that flashed through her mind in an instant. An impelling desire came over her to hear what he had to say. How could he possibly find an excuse for his cowardly attitude?

She stepped from the walk to the soft sod and hurried noiselessly around to a side entrance. Here she knew she could enter without being seen. She had determined to hear whatever explanation

Horace had to offer, and she slowly opened the door, and entered the house. She tip-toed through the halls, and through the partially open door she heard the excited tones of Horace Horton's rasping voice.

"Yes, they all attacked me."

"But how many were there and where are they now?" asked Mr. Walker in an excited voice.

"I don't know. I ran for an officer, I couldn't find one. I armed myself with a club and went back to search for the highwaymen, but they were gone. Emily had disappeared with them."

"But, Horace, you didn't run off and leave her?" interrupted Mrs. Walker, her voice trembling with suppressed sobs, while tears followed one another down her wrinkled cheeks.

"How could I help it, Mrs. Walker? I tried to save her. They were armed with revolvers and knives. I had nothing. I saw the best thing to do was to run for help."

"What! You ran away and left Emily?" her anger arising in spite of her grief.

"Why, Mrs. Walker, that was my only salvation. Had I remained, I should have been killed."

"Horace no doubt did the best he could, Martha. Now quiet yourself. Let's get out quickly and see if we cannot find some trace of these robbers," said Mr. Walker.

"Yes, yes. That's right, Mr. Walker. Let's get to work, but be sure you are well armed. Remember there were at least six of these men in the gang. They all attacked me at one time, and I hadn't a single earthly chance of coping with them, and —"

"Horace Horton, you're a liar," rang out in sharp, stern tones.

With amazement clearly depicted on their features, they all turned towards the open door. There stood Emily. Even the father and mother hardly recognized her. There was a grim, set expression upon her features that was new to them. Was this determined woman their daughter? was the thought that momentarily flashed through the minds of both Mr. and Mrs. Walker.

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almost screamed Mrs. Walker, rushing towards her, overjoyed at seeing her alive.

"Stay away," cried Emily, raising her hand with a warning gesture. "I want to have this out now and here, with this man. He said there were six men attacked him. He is—"

"Now, Emily, how can you be so cruel?" interrupted Horace, in a quivering voice, tears beginning to well in his eyes. "You know I did the best I could," moving nearer to her.

"You did the best you could!" She rejoined with fine scorn, as she pointed a finger toward him.

"Emily! Emily! How can you talk so?" he cried in passionate, quivering tones, moving swiftly towards her in spite of the restraining hand of Mrs. Walker. He looked into her relentless features. A great wave of remorse and misery swept over him. As she waved him away, he knelt at her feet and looking up, the tears streaming from his eyes, he pleaded like a whipped cur for mercy.

"Forgive me, forgive me. How could I fight all those men?" his voice weak and trembling from the emotion that momentarily encompassed him. She stood there gazing down at the miserable being before her. There was no sympathy in her features. This was the first time she had ever seen any real feeling expressed by Horace. Was it the awakening of his manhood? Was there something within his shallow brain that might lead to higher and better things? These thoughts occurred to her as she stood there like an avenging angel. Suddenly her expression relaxed, there were signs of returning human sympathy.

"Get up, Horace, I have nothing to forgive. You probably did the best you could with your shallow character and your pitifully weak and dissipated body." She took one of his outstretched hands and assisted him to his feet, then turned without a word and swiftly mounted the stairs while the confused and amazed auditors gazed after her.

"What can all this mean, Horace?" said Mr. Walker as he came to himself.

"Oh, nothing, Mr. Walker," as he sunk heavily into a chair, his trembling limbs almost refusing to support him. "Emily

probably thought I should have remained and defended her."

"And perhaps you should have," said Mrs. Walker in short, shrill tones, apparently noting evidences of guilt in Horace's attitude.

"Now, you keep quiet, Martha;" broke in Mr. Walker, and then turning to the policemen who had been silent and wondering auditors of the recent scene, "Officers, you had better go out and do the best you can to locate these men."

"All right, Mr. Walker," was their reply as they hurried away.

"Now, Horace, let us have the truth about this matter," said Mr. Walker. "How many men were there in the attacking party and did you really acquit yourself manfully, or were you excited and confused and perhaps terror-stricken for the time being?"

"Mr. Walker, I'm not a strong man, as you know. The odds were against me. I'll admit that I was badly scared, and no doubt confused as to what was best to do, but I don't see how Emily could have expected any more from me. I really did go back and search for her after my failure to find a policeman, and—"

"But you ran away," interrupted Mrs. Walker. "Ran away from Emily when she was being attacked by thugs. I pity such a man as you," in scornful tones.

"Martha, what do you mean? Can't you keep quiet? Have you no consideration for Horace? I don't believe he is a coward."

"Well, have your way, Samuel, but I have some affection for my daughter, even if you have lost all of yours."

"Woman, will you keep quiet? Can't you see how you are distressing Horace?"

"He ought to be more than distressed," turning and hurrying from the room, as Mr. Walker came towards her with the evident intention of enforcing his command.

Mrs. Walker hurried up to her daughter's apartment. She felt instinctively that she would find her there. She was not disappointed. Emily was kneeling at her bed and sobbing softly as her mother noiselessly entered.

"Don't cry, Emily. Your mother loves you," said Mrs. Walker, resting her hand upon the girl's shoulder.

"I know, mother, but it's too much."

"Why, what is too much, daughter?" kneeling down by her side and placing her arm around her.

"Why, the way you and father are forcing this man upon me," her voice trembling as she endeavored to control herself.

"Well, dear, we won't do it any more. At least, I won't."

"Yes, I know you won't; but how about father? I know him too well. He's a mean, selfish man," sobbing bitterly at the thoughts presented.

"Now, Emily, don't say that. You don't mean it. You're angry. I know your father has his faults, but he is ambitious for your sake. He wants you to be well off."

"Does he want me to be well off, or is he ambitious simply for his own benefit?"

"Don't you bother about it any more, now, Emily. I'll be on your side. I won't let your father trouble you again."

"Oh, mother, if you will only keep your promise, I'll love you just as I did long ago."

"Emily, dear, you can depend upon me. I'll keep it." As they knelt there folded in each other's arms, they sent up a prayer to the Great Power above for light and knowledge that would help them over the troublous seas that seemed to threaten them.

For the time being, the motherly instinct of Mrs. Walker had assumed the ascendancy. Her mother-love for her child had submerged everything. She forgot her ambitions for social aggrandizement, she threw aside momentarily the desires with which her husband had so strongly impressed her, and she saw Horace Horton in his true light. Ah, if we could only be ourselves at all times!

Mrs. Walker was not a bad woman. Her instincts had been warped by the selfishness and the ambitions of the man she had selected as a life partner, and as she made the promise to her daughter, she knew but little of the malignant power that had entered into and become a controlling part of her married life.

In the excitement and confusion connected with Emily's return, Mrs. Walker had really forgotten to ask for complete

details of Emily's experience. Mr. Walker, however, intended to know the truth. He realized that Horace had been guilty of conduct that apparently seemed unpardonable to his daughter, and his one desire was to find some means of inducing harmony. The idea of a quarrel between Horace and his daughter was simply unbearable to him. To have his life-long ambition thus interfered with was a terrible blow. Through all the difficulties that he had encountered in his endeavors to marry Emily to Horace Horton, he had never doubted the ultimate outcome. There was but one possible result, and that was a marriage between the two. When Horace had recovered sufficiently to go to his home, Mr. Walker naturally sought out his daughter. He was anxious to know the truth that he might ascertain just how seriously Horace might have been at fault. He found his wife and Emily apparently in a very pleasant frame of mind. Their excitement had been replaced by a satisfying calm.

"Now, Emily, I do not know what excuse you may have had for the theatricals in which you indulged when you first came in to-night, but I think you are unfair to Horace."

"I don't think you can form a fair opinion until you know the truth," was Emily's reply.

"Well, tell me the truth, I sought you out for that purpose. Horace told me his version, but I would be glad to hear yours."

"Yes, I heard a few of Horace's statements," in cynical tones. "The story can be easily and quickly told. We were attacked by two robbers. They apparently had but one revolver. Horace played the part of a coward throughout the entire affair. The two men suddenly came upon us out of some bushes near the path. They ordered him to hold up his hands. He immediately complied. They took his watch, rings and diamond pin. They gave him a shove and told him to 'git,' and the amazing alacrity with which he followed their instructions showed how much manhood he possessed. At this point I was almost terror-stricken with fear when I saw a man running towards us down the path, and he

proved himself to be a man in every sense of the word. The robber leveled his revolver at him and ordered him to halt, but he did not stop—he was not that kind. The robber fired, at the same time he was struck a blow that sent him senseless to the ground, and as I realized that I was saved I nearly fainted dead away."

These details were gone over again and again as Mr. Walker plied her with questions. She had evaded the queries made as to the identity of her rescuer.

"But who was this man?" he finally asked abruptly. "He should be suitably rewarded. He is certainly a brave fellow," said Mr. Walker in admiration, as he realized his daughter's narrow escape. "There is no question about his bravery, father."

"Why didn't you bring him in with you so we could have thanked him?" said Mrs. Walker.

"I hardly think you would have wanted him."

"Why, what makes you say that, daughter?"

"Well," hesitating, "I have seen him before. I have known him for some time."

"So much the better, but why did you not bring him in?" inquired Mrs. Walker.

"Because you have stated that you would not allow him in the house."

"What! Not allow him in the house? Now, Emily, who is he?"

"Charles Warner," gazing intently at her father.

"Charles Warner! And he was the man who saved you from the ruffians? What! Charles Warner?" An excited and stern expression came on his features, as he rose from his chair. "Charles Warner saved you?" stopping as he paced back and forth and looking down at his daughter.

"Yes, he it was."

"Well, I will be——" he exploded, stopping suddenly as he tried to recover his composure. As he continued to pace back and forth, however, his demeanor became more excited.

"Daughter, now you are surely mistaken," stopping again before Emily.

"Do you mean to say now that he fought these robbers and he brought you back here to your home to-night?"

"That's what I mean to say, father."

"Now I suppose he will want to come here and see you."

"Yes, he will," replied Emily.

"Well, he shan't, I tell you he shan't," turning and stamping his foot as his face grew scarlet with rising rage. "He is a low, vulgar parasite."

"Father, what do you mean? He saved my life, and I will never allow you to say a single word against this man in my presence," Emily cried, rising and facing her father with resolution written on her set features.

Mr. Walker gazed at her in amazement. He never saw his daughter in a mood like this before. To him she had always been a little girl, willing and obedient, but now he realized that he had a determined woman to deal with, and for the moment he was cowed.

"Well, Emily, maybe you're right. I see no necessity for discussing the subject. I know what this man is, but I will promise you not to say anything further against him until I have proof. But I warn you to be careful. In your gratitude, do not go too far. I do not know why, but somehow I feel that this man has designs on you. I am not in a position to give you any exact information, but I'll tell you this much. My detectives are now following out a clue that promises to shed some light on his character and that of his family; but I'll say to you now and here that it will forever turn you against him, no matter how much you think of him personally."

"Father, will you never stop? Are you so revengeful that you are determined to hound this man on to the very end of time?"

"Hound him? Now Emily, you are going too far. I want to see you married to an honored and respectable man. What I have seen of Warner has prejudiced me against him. I am satisfied that in his past record you will find evidence of his need of character, and though I'll admit that there is much in your description of his actions to-night that would make me feel more kindly towards him, still the information that I have at hand now is far from being to his credit."

"You can bring to me anything against

him that you may have, but you will have to furnish proof, father. I'll not take mere rumor."

"It will be something more than rumor, I can assure you, in case my detectives find the evidence that they are now searching for."

As the conversation continued for some time in this strain Mr. Walker acquired a respect for his daughter that he had never previously possessed. She had suddenly developed into a woman with a character and an individuality of her own, it was evident that she could not be swayed in accordance with the dictates of his will.

CHAPTER XII.

As Charles Warner made his way homeward after his experience with Emily, he was imbued with a feeling of contentment and happiness that he had never previously experienced. The difficulties which he had encountered in his endeavor to meet Emily were all swept aside at one blow. To be sure, he would not be received at her home, but she was indebted to him in an unusual manner. He somehow felt that any favor that he might ask with a view of extending their acquaintance or of cementing their friendship would be readily granted. In fact, he felt as though he might be taking advantage of her in asking for favors under the circumstances, as she could hardly refuse, no matter what her views as to propriety might be.

Emily had promised to meet him the next day, and she kept her promise. She gave him the details of Horace Horton's description of their experiences with the robbers. Charles could hardly contain himself as she dwelt with especial emphasis on his version of the fight he had had with the robbers.

"What a wonderful imagination he must have," said Charles.

"Yes, he is bountifully supplied with it," replied Emily joining heartily in his enjoyment of her narrative.

Emily seemed especially happy. There was a sparkling brightness in her eyes, and her features broke into a winning smile at frequent intervals. They spent considerable time moving about the se-

cluded walks of the park that bordered Emily's home. When they parted that day there was an indefinable something within the eyes of each as they gazed into the eyes of the other, that seemed to make each one feel that there was a tie binding them together. Nothing was said to warrant either in thinking that there was an understanding existing between them, and yet it was there, nevertheless. Each day thereafter they spent an hour or two in each other's company. As they grew to know each other better, the attraction of each for the other increased. Two or three weeks went by. Occasionally there was a day when they were unable to see each other. At such times life seemed hollow and empty to Charles.

It was about three weeks after the incident that brought Charles and Emily together. They had met at their usual trysting place. They had found a quiet nook, at a considerable distance from the much traveled paths, surrounded by green shrubbery, and free from prying eyes. Emily was seated on a settee as he came into the enclosure. She arose and extended her hand with the smile that held so much charm for him. He took her hand and held it for a moment.

"Emily, you look happy to-day," gazing at her with eyes that completely told their story.

"Yes, I am happy, Charles. Why shouldn't I be?" with an expression that seemed to convey her feelings more accurately than words ever could.

They stood there silently for a few brief moments. No words were spoken, none were needed. He turned his eyes from her with a deep sigh. The spell was broken. He led her to the settee that she had just vacated.

"Emily, I wish I were a wealthy man," gazing away into the far distance.

"Yes? Why, Charles?"

"Wealthy men can buy everything, they can have palaces to live in, if they so desire. They can have servants and magnificent costumes, in fact, everything that the heart can wish for."

"No, Charles, not everything."

"Why not? Money can buy anything."

"No, money cannot buy happiness."

"You think not?" turning and gazing questioningly into her trustful eyes.

"I certainly do. Money is such a small thing. It can only buy food and clothing and shelter. Beyond that, it is powerless. Some of the most luxurious homes harbor the most misery. It is in them that one most often finds family skeletons."

"Do you believe that, Emily?"

"Yes, I know it; I've seen it. I've actually witnessed it in many of the rich homes that I've visited."

"Then you don't care so much for riches?"

"No," smiling at him as she saw the questioning light in his eyes.

"You could learn to——" firmly pressing the hand that lay nearest him. Emily's smile deepened as he hesitated.

"Now you are laughing at me?" he exclaimed, his expression momentarily changing as he saw her apparently jesting mood.

"No, Charles. How could I laugh at you?" in serious tones.

"Well, you know what I mean. What's the use of my telling you?"

"How should I know?" still gazing into his eyes while her features softened as her smile faded away.

"Ah, Emily you know that I love you. There is no need of my telling you in mere words," he said in a voice that was tense and passionate.

He saw a flood of color flash over her face. Her glorious eyes reflected back the love light that shone in his own.

She did not reply, but she moved closer to him, every fibre of her being thrilled with the joy of a new found happiness.

* * * * *

They remained there for some time blissfully oblivious of their surrounding. The joy of hopes fulfilled was reflected in their features. Life was a splendidly beautiful experience to them at that time. It was not until they realized that the night was fast approaching that they awakened to the voice of reality.

A question flashed into the mind of each simultaneously. Charles was the first to speak.

"What will your father say?"

"I am very much afraid that he will

say a great many things," replied Emily.

"Suppose he refuses to consent?"

"Well, I'm of age and I've promised to marry you, and I'll keep my promise."

"Would you suggest that I see him, or do you think that he will even deign to honor me with an interview," Charles asked smilingly.

"Perhaps he won't, Charles, I'll tell you what we had better do. I'll see him and try to bring up the subject in a round about way and thus get an expression of opinion from him. We can then adjust our future actions as we think best. If he refuses to give his consent, I'll run away," she declared as a winsome smile came over her features.

It was later than usual that evening when they parted. Emily secured the opportunity of speaking to her father that night. She went to him in the library, apparently for the purpose of discussing a different subject from that in which she was especially interested. Horace Horton had not visited the house since the night of his humiliation. After the conversation continued for some time Mr. Walker remarked that he had seen Horace Horton that day and that he had asked the privilege of calling.

"He can call if he so desires, father. You are master here. You can invite whom you choose, but I positively refuse to have anything to do with him."

"Now, daughter, why are you so silly?"

"I am not silly. My experience with this man is sufficient. I secured a complete insight into his character, and would not associate with him if he possessed all the wealth of the world."

"I sincerely hope as you grow older you will learn more. You do not understand the value and power of wealth."

"Yes, I do. I understand it all too well."

"When you possess vast wealth, you have a power placed in your hands with which you can do untold good."

"Yes, but why obtain wealth by sacrificing all self-respect?"

"There is no need of that. There is no need of sacrificing anything."

"Now, father, I might just as well talk plain. I positively will not marry

Horace Horton. Therefore, what is the use of my seeing him, and furthermore, suppose I should want to marry someone else?"

"Someone else! What do you mean, Emily?"

"I mean just what I say. I am old enough to have a mind of my own. Would you object if I should make a choice?"

"Now, Emily, do not talk foolishly. You can look the world over and you will not find a better man than Horace Horton. To be sure, he is not gifted with a large supply of physical strength, and I will even admit that he may not be very brave, but he is honest and is possessed of an immense fortune."

"Father, I refuse to listen. You've gone over these matters with me before. Anyway, I have already made a selection."

"What, you are engaged to someone?"

"Yes, I am engaged."

"To whom?" asked Mr. Walker, his voice quivering with emotion.

"To Charles Warner," she replied as she rose from her seat and her features assumed that set, determined expression that he had seen there on a former occasion.

"I refuse to believe it," said Mr. Walker in hard, harsh tones.

"It is nevertheless a fact." Emily repeated.

"Then I will tell you something," said

Mr. Walker also rising. "I have a letter before me to-day from my detectives, who have been investigating his whole life."

"I don't want to hear the report."

"You have got to hear it." Mr. Walker rejoined as he turned and locked the library door and put the key into his pocket.

"I will make you hear it, whether you want to or not," he said, as he turned and faced Emily. "My detectives have found," he went on in slow, emphatic tones, "that there is a convict in the Warner family,—that there was at one time a tragedy and that the chief actor in this tragedy was the father of Charles Warner. You have never heard the matter spoken of, no doubt. Now I know where the father is. He is alive. He is serving time in the penitentiary. He is a murderer, serving a life sentence, and you have come to me and have told me that you are engaged to the son of a murderer, to the son of a convict. Now I will open the door." He turned away from the staring eyes of his daughter and unlocking the library door.

As he faced her again, Emily was still standing there, staring vacantly in his direction. He went up to her and grasped her by the arm and shook her harshly. It seemed to awake her from a stupor. She almost fell into a nearby chair and broke out into a torrent of agonized sobs.

(To be continued.)

Appendicitis

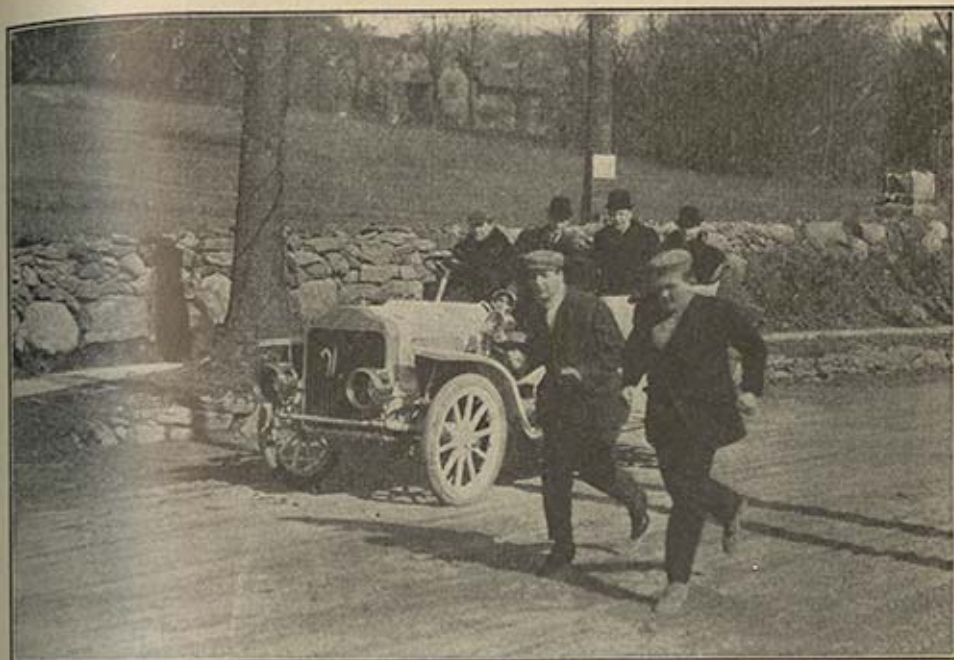
By Catharine F. Little

What God has made, for good must be
And for my life I can not see
Why men should think by man's poor art
They must with their appendix-part

Because they can not understand
The use for which it has been planned
Is this a proper reason why
So many men for it must die?

If toes are sore they do not say
There is for us no other way
But just to take the toes away.

Then why for every stomach ache
Must they our poor appendix take?



James J. Jeffries doing some road work. His burly, muscular figure can easily be identified at the right.

Mental and Moral Training Through Boxing

THE CHARACTERISTICS DEVELOPED BY THIS SPLENDID EXERCISE A FOE TO BULLYING AND DISSIPATION OF ALL KINDS

By James J. Jeffries

The statements made by the world's most famous pugilist in this article will no doubt put boxing in an entirely new light to many of our readers. It is a fact, however, that I have personally seen demonstrated on many occasions, that the exercise of boxing will strengthen the character as well as the body. It is inclined to develop manly men, and to eliminate cowards and the bullies, and the views of Mr. Jeffries on this subject are certainly worthy of attention.—Bernarr Macfadden.

MAN is and always will be, a fighting animal. From the times when he used a stone axe and flint-pointed arrows, right up to the present with its smokeless powder and long range guns, the history of the world may be summed up in the one word—"scrap." And when mankind was not employing the fists which Nature gave it, or the weapons which it invented, it was fighting with its brains, seeking to overcome the difficulties which lay in the way of its progress, or trying to get the best of the obstacles which hindered its development. So that the better fighter

a nation was, the more quickly did it become civilized, because it tackled and downed the things which bound it to savagery more speedily than did its less aggressive neighbors. If we take the trouble to trace the history of any community, we shall find that whatever advantage it enjoys; whatever place it holds among the nations, are alike the outcome of its fighting propensities and the exercise of these in the past. Perhaps you may think that, because I am a pugilist, I am in favor of the scrapping game. This is not so, but I believe I am right all the same, and a reference to the

history of the Roman Empire or of Great Britain or of this country will bear me out in this.

Now what is the moral of all this? Simply that a youngster's education should include sports and exercises which will not only keep alive his "combative instincts," as the scientific sharpshooters call them, but also teach him to properly use them.

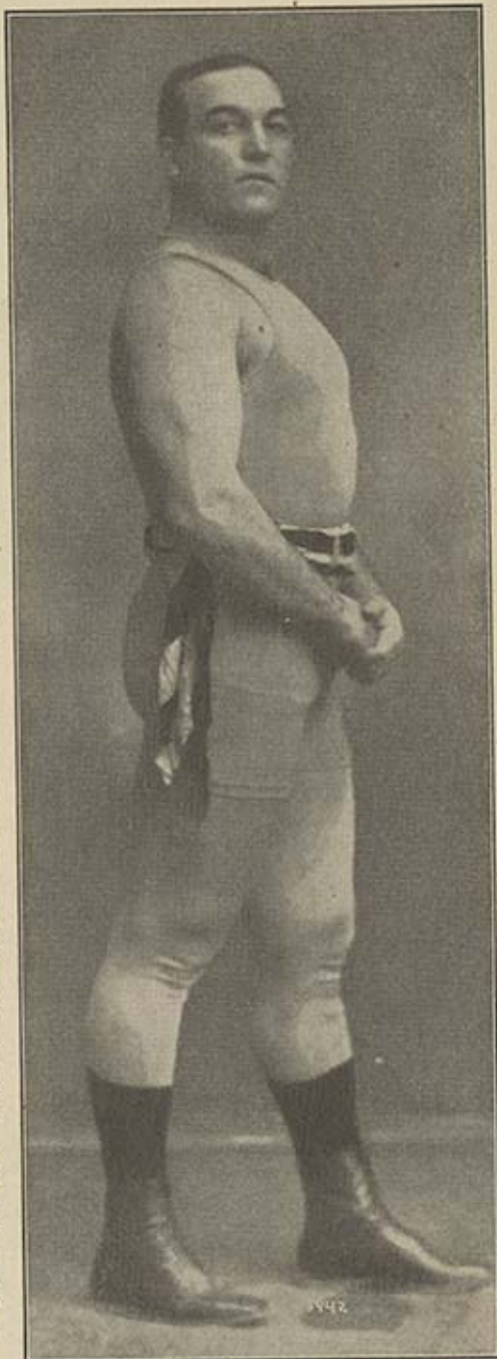
As in other affairs of life, training is needed in order that you may get the greatest benefit out of your fighting instincts. The nations that conquered in the past, were those that had learned the advantages of scientific over non-scientific fighting. What stood good then in this respect, stands equally good now and it applies especially to the boy who aims to be an expert boxer. He must make up his mind from the first that he will be taught and that he will follow the directions of his teachers. Only by so doing will he get the knack of being handy with his fists. This statement opens up the question of how boxing affects a boy morally, mentally and physically. Let us take the points in the order named.

Now, I'm not going to try to preach a

sermon on the moral good that arises from boxing, but I do say, that the boy

who determines to become an expert with the gloves finds out pretty quickly that he has to avoid bad habits in order to attain his ambitions. He must be as clean inwardly as he should be outwardly. I am sorry to say that a good many men of my profession go wrong in a moral sense. But these who do so, never amount to anything. Usually they are fourth-raters, mixed-up fighters, fakers, four-flushers, and quitters. Or sometimes they go to the bad after winning the star honors of the ring. They can't stand prosperity—spend their money foolishly, get into bad company and in a few years, are down and out.

But a boxer of repute whether he is an amateur or a professional simply *has* to be a good man in a moral sense. I know that a large part of the public will doubt this statement, but it's true all the same. He has to keep in condition and to do this, he cannot afford to tamper with his constitution by indulging in any of the harmful habits or the vices that are only too common among average men. And



A splendid view of the magnificent physique of James J. Jeffries.

what is true of the "grown-up" in this respect, is equally true of the youngster. Boxing calls for "staying" powers above all else, and the lad who is a victim to any habit which hurts his body, will never have the needed endurance. So remember, boys, that if you smoke cigarettes; drink alcohol in any form; have bad ways of any kind, or pride yourself on being "sports" you will never learn the proper use of the gloves. Loafers and mashers never yet made good boxers. One of the first things that a man does when he begins training is to cut out smoking and drink, and any other evil habits. You cannot get into condition if you do not do so. Boxing will teach you, that in order to become a crack at it, you must cultivate rules of life that will make your body strong, and drop habits that will make it weak. In other words, that you must be moral, so that you may be manly and so be able to excel in the manly art.

As to the mental training of boxing there is much to be said in its favor, although time and space will not allow me to say all that I'd like to on this point. I believe though, that the "mitts" have an educational value that should not be overlooked. You may be rather surprised to hear me say this, but I hold that education includes everything that develops and strengthens the mind and the body. If I am right, then the value of the manly exercise should certainly be recognized by our educators, for it has a marked effect on the mentality. Let me try and show you just what I mean.

There are a good many athletic sports which exercise the muscles or a portion of them only. Such sports do not call for any effort on the part of the mental powers. Most gymnasium stunts are of this one-sided kind, and are simply intended to develop this or that portion of the body. The other class of sports, boxing in particular, brings into use all or the greater portion of the muscular system and at the same time, the brain is called on to take an active part in the efforts of the body.

Let me try to make this very clear. When you face your gloved antagonist, you have to learn to "size him up;" to find out just what he can or cannot do:

to forecast what he proposes doing and to take advantage of the information thus given you by your instinct. Besides this, you will learn, in the flash of an eye, to decide how or when you must block, lead, duck, side-step, feint, counter and all the rest of it. I do not mean that you will learn to do all this during the first two, three or dozen lessons. But learn you will, if you will only stick to it, and you'll be the better boy for so doing. You will later find, that a whole lot of things that are taught you by the gloves will be of help to you outside of the gymnasium. For instance, the ability to read a man and his intentions, to which I have just alluded, will be of great service to you when you get out into the great battle ring of the business world. So too, will be the power of quick decision which the gloves will give you.

The confidence in yourself, the self-reliance—which a good boxer always feels, will help you out of many a tight place in real life.

Boxing will also teach you how to keep your temper under the most trying conditions. This is a great thing, boys, as you will find out when you go out into the world. The boxer who can't keep his temper is sure to be beaten. So your teacher will or ought to, show you how to smile and feel good natured under a stinging shower of jabs, jolts, straights, hooks and so on. It may be pretty hard work at first, but it will come to you sure enough. And when you have learned to smile and "jolly" through a bout in which you were outweighed and out-fought, you have learned something of benefit, I tell you.

Then again, a clever boxer is never a bully. The most peaceable men in the world are pugilists. It is always the man who isn't sure of himself that blusters and brags and tries to impose on a weaker person. Because boxing is the manly sport which it is, it teaches you to become manly in mind as well as body and this includes the idea that you will never be a bully.

There can be no question as to the healthful nature of boxing. Like walking and swimming, it exercises every muscle of the body from the tips of the toes to the nape of the neck. If you are

not used to the gloves, you will probably find that, after the first few lessons, you are stiff and maybe a bit sore. This is because you have been working a lot of muscles that usually, are never exercised at all. And the soreness—which will gradually wear off—is really a sort of testimonial to the value of boxing as an all-round developer. Then again, the rapid movements which you have to make and the variety of positions which you have to assume when boxing, keep your organs in fine fettle. Let me tell you boys, that the first thing that a trainer does when getting a man in condition for an athletic event of any kind, is to take steps to get his inward "machinery" that is to say, his bodily organs, in good order. The lungs, the heart, the digestive system—all receive special attention, and while dieting is sometimes used for this purpose, yet exercising of various kinds are the main standby. And it has been found that even where the athlete is not preparing for a "go" in the ring, but for some other kind of contest, bouts with the gloves are a most valuable and important portion of training for the reason just given.

Be careful of your diet; avoid pastry and rich foods, use tea and coffee seldom, never drink at meals. Chew slowly. I never knew a successful boxer who gobbled his food. The quick lunch is the cemetery of physical perfection. Go to bed early and rise early. Every boy ought to have lots of sleep. A word here to parents. My advice to every father is—teach or let your boy be taught to box. You will never regret it and the youngster will grow up to be a better man in every way by reason of it. The ability to protect himself and others ought to be taught to every boy.

I need hardly say that rough and tumble fighting is one thing, and clever clean-cut work with the gloves or, if needs be with the bare knuckles, is another. If a boy has mastered the fistic art as far as an amateur can, he will always get the better of the mere "slugger" even if the physical advantages of the latter are in his favor. This by the way, is just as true of a regular ring battle as it is of the struggle which may follow on a street insult or an attempted hold-up. For I

would here remark, that not every man who enters the ring can truthfully claim to be a boxer. But this is "professional opinion," and I forget that I am talking to readers of *PHYSICAL CULTURE*.

All youngsters have a lot of animal spirits which they must let off somehow or other. If they don't do so in a legitimate way, they are apt to do so in a manner which will bring trouble to themselves or their parents. And my belief is, that boxing of all sports, furnishes the needed outlet.

On the subject of teachers, I want to say right here that if you wish to become a really clever boxer, be careful to whom you go to take your first lessons. Such lessons are likely to make or mar you according to the skill or want of it, possessed by the instructor. I am sorry to say that too many so-called boxing schools are conducted by "casts-offs," of the ring—men with very little or no reputation in a fistic sense, and sometimes of poor repute in other ways. Parents should be careful that their sons do not patronize these persons, not only because they know next to nothing of the science, but for other reasons which I have hinted at. However, there are plenty of capable instructors, with good records on the "squared circle," and of good morals also. It is these and these only, that should be given the job of directing the boy, towards manliness, via the glove route.

If you were to ask me how to best go about learning to box scientifically I would answer that a large city usually has gymnasiums of good reputation to which a parent may safely send his son. Drop a note to the editor of the sporting page of one of your local newspapers and ask him to give you his opinion of the professional status of the boxing instructor of the gymnasium you have selected. In some Y. M. C. A. gymnasiums, boxing is barred: in others it is permitted. I can strongly recommend these latter institutions to would-be boxers for moral and other reasons.

Where these facilities are not on hand, I would suggest that a dozen or so of you boys get together and form a club of your own. Let the members be as nearly the same age and weight as possible.

Then hire a well-lighted, well-ventilated room for rainy or cold weather and, if possible a piece of ground adjoining, on which you can do your boxing in the open-air, whenever possible. For the sport calls for fresh air and lots of it, and hence, whenever you can indulge in the open, do so, in preference to being behind walls. In fact, I cannot urge this on you too strongly; boxing demands sound lungs, and these in turn, demand a free supply of oxygen. Then too, the turf is easier to fall on than are boards. In real training quarters, the boxing room is so well ventilated as to be practically in the open air, and in some "camps" that I know of, the gloves are invariably used outside the walls.

As to your choice of instructor, there is usually some local individual whose knowledge of the game is sufficient to enable him to teach you its rudiments, or better still, write to the boxing instructor of one of the recognized gymnasiums of the nearest big towns asking him for advice on the matter. In nine cases out of ten, he will send you the name of some coming young pugilist, who will be glad to give you youngsters the needed lessons in return for a very modest fee.

One of the advantages of boxing is its economy. After you have paid for the hire of your room, some few needed alterations, a locker or two, say three pairs of gloves and your individual gymnasium shoes, your expenses will be limited to the fee for the instructor and light. I would advise a dirt floor whenever possible, or failing that, a board

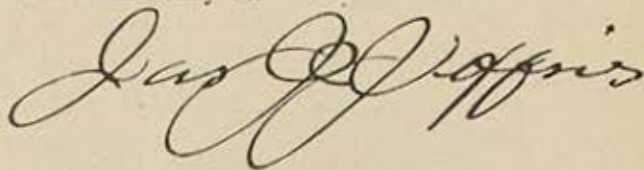
floor sprinkled with earth, or a layer of sawdust or tan-bark.

I have not tried to do anything more than give general advice in this article, first, because of space limits, and then again, on the score of the fact that you cannot teach boxing by written instructions. But I want to say something about boys who will make good boxers and those who won't.

Ask any trainer who has a "stable" of young boxers, as to his most promising pupils and he will tell you that they are those who take to the work easiest, obey orders most readily and don't "funk" or grumble when the pace cut out for them gets hot and tiresome. Boxing of the right kind teaches the valuable lesson that to best the other fellow, you must first of all learn to get the *best* of yourself. I mean by this that no matter what your wishes or tastes may be, you must obey your teacher or trainer and deny yourself those things which he thinks are not good for your health. Bernarr Macfadden's rules of living are capital in this connection.

In other words, you must learn self-discipline, which is one of the most valuable of gifts.

Now I do not want you who read this, to think that I desire every lad to be a prize fighter. Quite the contrary. But I do hold that boxing is an asset to any boy, no matter what his calling or disposition may be.



National Purity Congress.

The National Purity Federation, an association formed by the leaders in purity reform throughout America, will hold a National Congress, at Burlington, Iowa, October 18-22, 1909. A general invitation is heartily extended to all organizations laboring to promote purity or eradicate vice, and in sympathy with the purpose of this Congress, to send delegates and unite with the Federation in its work. All individuals actively intereste

d in the work, are strongly urged to do so. The National Purity Federation aims to secure the co-operation, in a National sense, of all those who are striving to promote purity in the life of the individual and in social relations, and in the organization of such an aggressive united movement as shall arouse the conscience of the people to the fearful effects of the vice and social impurity on the nation's manhood and womanhood.

Menus and Recipes for Three Days

These menus are selected from the daily bills-of-fare served at the Bernarr Macfadden Sanatorium, at Battle Creek, Mich. As from 250 to 400 people are served at each meal at this famous Mecca for Physical Culturists, it will be realized that the menus cover a wide scope of health building foods. The dishes included in these menus have all been thoroughly tested, and the accompanying recipes can be depended upon to produce satisfactory results.—Bernarr Macfadden.

FIRST DAY.

Breakfast.

Bananas	Oranges	Apples	Peaches
	Nut Porridge, Cream		
Raw Wheat Flakes			Raw Oat Flakes
Figs	Dates	Pecans	Brazils
			Raisins
			Rice Soup
Radishes			Laxo Biscuits
			Eggs
			Cottage Cheese
Buttered Peas			Escalloped Corn
			Shredded Cabbage
	Entire Wheat Bread		Creamery Butter
	Unfired Bread		Nut Butter
Egg Salad		Boiled Dressing	Wafers
			Cheese
	Sliced Oranges and Bananas with Pitted Dates		
Cocoa	Milk	Sumik	Apple Juice
			Grape Juice
			Date Coffee

Dinner.

							Cream of Pea Soup
							Laxo Biscuits
							Eggs
							Ripe Olives
							Spinach with Egg
							Unfired Bread, Nut Butter
							American Cheese
							Ice Cream
							Fairy Cake
							Dates
							Figs
							Raisins
							Brazils
							Pecans
							Almonds
							Peanuts
							English Walnuts
							Apples
							Bananas
							Oranges
							Peaches
							Plums
							Milk
							Sumik
							Fruit Juice
							Prune Coffee

SECOND DAY

Breakfast.

Bananas	Oranges	Apples	Apricots
Cream of Wheat		Raw Oat Flakes	Cream
Dates	Figs	Raisins	Pecans
			Brazils
			English Walnuts
			Cream of Asparagus Soup
Radishes			Wafers
			Ripe Olives
Eggs			Baked Mashed Potatoes
			Buttered String Beans
Entire Wheat Bread, Creamery Butter			Unfired Bread, Nut Butter
			Cheese
			Beet Salad
			Wafers
			Watermelon
Milk	Sumik	Cocoa	Grape Juice
			Date Coffee

SECOND DAY.

Dinner.

Green Onions	Green Bean Soup	Laxo Biscuits	Ripe Olives
		Eggs	
Escalloped Corn	Spinach with Cheese	Sliced Tomatoes	
Entire Wheat Bread, Creamery Butter		Unfired Bread, Nut Butter	
	Cold Slaw, Egg Dressing	American Cheese	
	Raspberries and Cream		
Bananas	Apples	Peaches	Dates
	Brazils	English Walnuts	Filberts
Cocoa	Milk	Sumik	Apple Juice
			Date Coffee

THIRD DAY.

Breakfast.

Oranges	Apples	Bananas	Plums
Wheat Porridge	Raw Wheat Flakes		Cream
Filberts	Almonds	Brazils	Raisins
Tomato Bisque	Celery	Laxo Biscuit	Figs
	Eggs	Cottage Cheese	Dates
Baked Carrots	Creamed Onions	Lettuce with Lemon	Ripe Olives
Entire Wheat Bread, Creamery Butter		Unfired Bread, Peanut Butter	
	Strawberries with Cream		
Cocoa	Milk	Sumik	Grape Juice

Dinner

	Cream of Potato Soup		
Celery	Green Onions	Laxo Biscuit	Ripe Olives
	Eggs	Bean Loaf	Creamed Tomatoes
Graham Bread, Creamery Butter		Unfired Bread, Nut Butter	
Nut Apple Salad, Cream Dressing		American Cheese	Wafers
	Crushed Pineapple	Sunshine Cake	
Figs Dates	English Walnuts	Pecans	Raisins
	Plums	Oranges	Brazils
Prune Coffee	Cocoa	Sumik	Apricots
			Milk
			Fruit Juice

Rice Soup.

Take one cup of rice; wash thoroughly. Heat one and one half pints of strained tomatoes to boiling point in inner vessel of double boiler. Sprinkle rice into the tomatoes. Place in the outer vessel and cook for one half hour, or until rice is tender; then add salt to taste; piece of butter size of walnut, two tablespoonfuls of grated onion, and enough thin cream to make soup the proper consistency. Reheat and serve.

Cucumber Salad.

Take two large fresh cucumbers. Crisp in ice water; peel and cut in small

cubes; add one cup of chopped cabbage; one half cup of grated carrots; use one half cup of French dressing or more if desired. Serve on lettuce and garnish with shredded nuts.

Tomato Bisque.

Take one pint of strained tomatoes; bring to boiling point; add one pint of cream, a dash of celery salt and salt to taste. Reheat and serve.

Baked Carrots.

Take nice fresh carrots, pare the required amount, and to each quart of sliced carrots, add one half cup of olive

oil, or butter; one heaping teaspoonful of sugar, and one even teaspoonful of salt. Place in covered baking dish and bake until tender. Then add one half pint of cream and bake ten minutes longer.

Sunshine Cake.

Take 6 fresh eggs, $1\frac{1}{4}$ cups of granulated cane sugar, 1 cup of pastry flour, 2 even teaspoonfuls of lemon juice, 1 even teaspoonful of salt, 1 teaspoonful of extract. Separate the whites from the yolks. Whip the whites until stiff, then add lemon juice and continue whipping until they will stand. Sift sugar once; add to whites and fold in until thoroughly dissolved. Add salt to yolks and beat stiff with an egg-beater. Add yolks to whites and fold in thoroughly. Sift flour five times, measure; add to batter and fold in lightly; fold just enough to make batter smooth. Add extract just before adding flour. Put in ungreased mold, place in moderately warm

oven (not hot), to raise; it will raise in thirty or thirty-five minutes, then increase the heat slightly and bake for twenty-five minutes. Bake in a medium sized loaf cake pan; use a pan from which bottom can be removed. Any child can bake this cake if directions are followed. It is indeed delicious and is not to be classed with the rich, heavy, soggy, indigestible cakes one usually finds on the table. You will notice that it contains no raising material aside from lemon.

French Salad Dressing.

Take one cup olive oil, one half cup lemon juice, one even teaspoonful of salt. Place lemon juice in quart measure; add salt and dissolve; then add olive oil gradually and beat rapidly with an egg beater. When it is beaten enough it will be thick and creamy. This salad dressing has no equal, speaking from the hygienic standpoint.



Mrs. Harry Listman, Sioux Falls, S. D.

A Physical Culture Mother

HERE is an example of the value of physical culture in the home, which shows the difference between a weak and anemic wife and one who is gifted with abounding vigor. Mrs. Listman is to be congratulated on the splendid vigor she has attained through following our methods. She states that her development was gained through the hints contained in our publication and that she has been a subscriber for several years. She is married and the mother of two children, who are being brought up in accordance with the methods advocated by us. Her exercises consist largely of bag puaching and various exercises with light dumb-bells, weighing three pounds and also one heavy bell, weighing twenty-five pounds, which she uses for strengthening the back. She is five feet, three and a half inches in height and weighs one hundred and thirty-eight pounds. It will be noted that her measurements almost exactly approximate the standard which has been advanced by a few celebrated sculptors and artists that the flexed arm and neck and calves should measure exactly the same. In her case the only divergence from this is the calf, which appears to be a half inch larger. Her measurements are as follows:

Height, 5 feet, $3\frac{1}{2}$ inches; weight, 138 pounds; neck, 13 inches; chest, contracted, 32 inches; chest, expanded, 36 inches; biceps, natural, 12 inches; biceps, flexed, 13 inches; waist, 26 inches; hips, 39 inches; thigh, 23 inches; calf, $13\frac{1}{2}$ inches; age, 28 years.

Fig 1

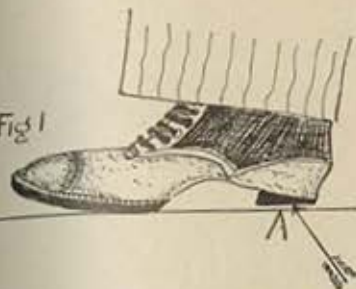
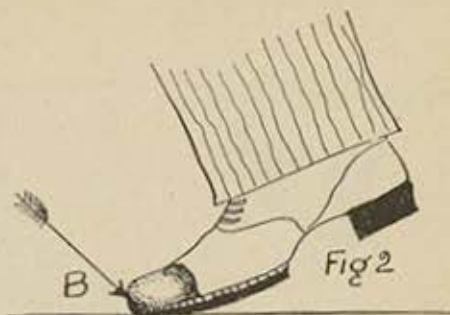


Fig 2



How the Feet are Distorted

THE MALTREATING AND CRUSHING OF HUMAN FEET
THROUGH THE INFLUENCE OF STYLE AND IGNORANCE

By George Mellier

There are favored fashions of dressing the feet as well as the hair, and many follow the conventional. But many individuals make life miserable by crowding their feet into shoes that are literally squeezing them into a shapeless mass. The writer of the following article calls our attention to a few mistakes that can be comparatively easily remedied.—Bernarr Macfadden.



UNDENIABLY a great many unnecessary missteps are made by the feet in ordinary walking. While the average person puts his foot down very nearly correctly, there are many who wobble, make miscalculations of their stride, turn the sole, trip the toe, depress the heel too much, and

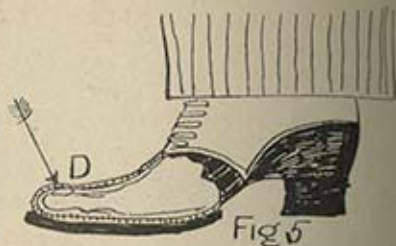
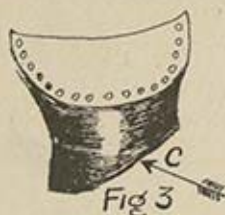
who jogs along with lack of grace and unsteady motion. There will be the slow-moving old lady and the maiden tripping lightly over the pavement. You will see shoes maintained at a perfect perpendicular and shoes on feet which seem to be bent half over. There will be positions of feet that are fearful and wonderful. You will see the bow-legged effects of some shoes and the web-footed condition of others. There will be persons toeing in, and persons with the heels ablock. The accompanying illustrations will render an idea of the nature of some of the defects noticed by the writer.

otherwise cause the shoe to wear unevenly and the foot to become distorted. The writer has made a number of observations of persons walking the pavements of a city. A very good way to notice defects in walking is to view passers-by from some basement, where you may see many feet passing along the walk. Your attention will not be attracted by other objects. You will observe an endless variety of shoes passing steadily along, hour after hour.

There will be the flat-footed person,

You will observe that the rear of the heel is gone from the shoe in Figure 1. The arrow *A* denotes the worn place. I saw many shoes of this order. The tendency is for the person to bear backward.

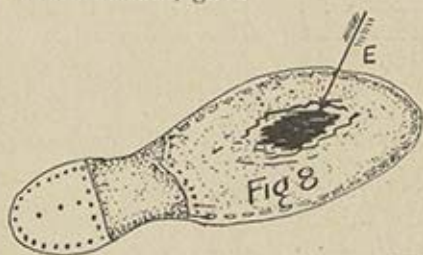
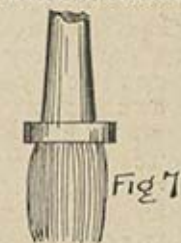
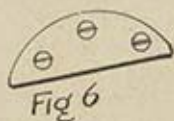
The other extreme is shown in Figure 2, at *B*. Here is an example of wear and tear on the toe. Some people destroy the forward end of the toe sole in a few weeks. They go shuffling along without elevating the toe sufficiently to clear the surface. Or they bend too far over on the instep and get the tip of the sole on



the walk. Other people have a tendency to rise on the toes in walking. This soon destroys the order of the shoe. Again we recommend practice to overcome this defect. You should bear in mind the action of correct walking for a few months, if you are wearing off the shoe leather excessively in one place. You can have metal tips put on the toes and these will assist somewhat.

Persons inclined to be at all bow-legged make the outer heel bottom wear off as at *C*, Figure 3. The shoemaker will put a plate on your heel as in Figure 4. Still you will turn over the heel unless you strive to overcome the habit. I have seen men go through a course of training to do away with the heel turning. There is no need of this, if you will keep in mind the necessity of walking with the foot free from the inclining motion whenever you are walking. You can practice as you walk, if you keep your mind on the positions.

I noticed that many persons whose feet were planted correctly on the sidewalk, gave



indications of a limp, as in pain. Of course, tight shoes will cause this. On the other hand it may be that the toe is forced too snugly into the shoe as at *D*. Plenty of toe room is urged. Figure 6 is a plate which is useful to screw to the side of the heel or sole which is subjected to excessive wear. Figure 7 is a handy brush for clearing out the interior of a shoe. Figure 8 shows how the man who twirls his foot in walking wears off the sole in the middle. There are people who have a habit of giving the foot a twitch while the sole is on the ground. This results in wearing off the sole as at *E*. If you let the toe nails get long and ragged as at *F*, Figure 9, you can feel assured that not only will your socks be worn, but the hard, sharp nail may wear off the leather of the shoe and make a hole. Numerous evidences of corns and bunions occur as at *G* Figure 10.

In purchasing footgear always buy a shoe of ample size. Keep a stretcher at hand and if the shoes get wet and misshapen, put them on a form and expand the tight places.

The Results of Muscular Inactivity

Impaired appetite, indigestion, sleeplessness, nervous irritability, not to mention the many forms of liver and kidney diseases, indeed half the ills that flesh is

heir to, lie in wait for the man who, from carelessness or indolence, fails to make use of the bodily powers with which he has been endowed.—*Professor Hoffmann.*

Mind and Muscles

By Howard Eichholz

The author, whose photograph appears with this article, states that he was in poor physical condition some three years ago, and is to-day but an ordinary example of the results attained by regular participation in the systematic drills given in the Young Men's Christian Association gymnasiums, in conjunction with a proper regard to hours for sleep and the exercise of a little dietary discipline.—Bernarr Macfadden.

FEW people realize the wonderful, almost phenomenal, effect produced by the mind or will upon the muscles when exercising.

You think of running. Immediately the muscles affected by the act are charged with an extra amount of blood. Take for another instance the person who is hungry. He thinks of a favorite dish. The thoughts are directed to the parts of the body primarily used. The saliva begins to flow in the mouth, and even the gastric juices of the stomach begin to prepare themselves in this organ for the reception of the imaginary meal.

And so it is with the muscular system. The next time you are exercising don't go through the movements with your mind full of foreign matters, such as business, social affairs, or a hundred and one other things. Forget about them. They can and should have their proper time and place for consideration; and this certainly ought not be on a gymnasium. You have certain hours for business; you devote a certain portion of your time to social duties; and you should set apart a



Albert H. Eichholz, Brooklyn, N. Y. A Specimen of Manhood Developed by Y. M. C. A. Gymnasiums.

certain period of each day to be devoted absolutely and entirely to the consideration, care and exercise of the body. How very few of us realize the tremendous importance of good health, mentally and physically, and its bearing on our lives! It is one of the best things on earth; for associated with this condition you will usually find happiness, and always the ability to perform our work well. How many people have had to leave their position or business, to the improving and upbuilding of which they have probably devoted the best years of their lives, have even had to depart from their homes and families, all they held dear, and go to other parts in search of health? They give their most intense interest, their best consideration and care to the business, and continue day in and day out to neglect and ill-treat their physical beings, when a few moments of systematic exercise and care each day would do away with half the ills which beset so many business men to-day.

"A thing worth doing at all is worth doing well." It is not sufficient that you merely get into your gymnasium outfit

and attend the drill. In order to get the fullest possible amount of pleasure and benefit from the exercises you must put the mind in the proper attitude for the work done. Be cheerful and happy. Cultivate a pleasing and sunny disposition. Jump 'round as if you were once more a youngster. Act "foolish." Surely you can do this occasionally, or at least on the gymnasium "floor." And when you begin your exercises, just picture in your mind some magnificent and beautiful specimen of manhood you have seen, and make up your mind that you want to be as near like that fellow as possible. That's auto-suggestion—and there's a lot in it. Concentrate your mind upon each muscle affected by the exercise you are doing; and although you may not be aware of the fact, you will receive much more benefit and good from the work than otherwise.

A muscle alone is, of course, capable of executing a certain amount of work; but it is a fact that that same muscle, with the will strongly concentrated upon it, can be made and forced to perform a great deal harder task, by reason of the increased supply of blood carried to it and occasioned by the concentration of the mind. I am quite certain it was the renowned Sandow, who once said that his muscles alone were not capable of per-

forming certain feats, were it not for the strong concentration of mind he brought to bear on them.

The writer has known some remarkable muscular changes which were brought about by the practice and cultivation of this idea. On the other hand, however, it must be remembered that the thing must not be overdone. Too much continual thinking about one's self is not conducive to good. Carry out the idea whenever you exercise, but don't have the subjects germane to your physical condition, etc., in mind while at business, or during the performance of other work.

Remember also the mind itself. In order to reach the highest efficiency this most wonderful organ requires exercise as well as the body. Try hard to keep your thoughts always pure and noble. Maintain your mind on a high and cultured pedestal. It can be educated to this standard. How? In these days of numerous free public libraries no one has an excuse for not obtaining the best literature. Read it. If possible see good wholesome plays, those that have an elevating moral. Choose companions of character. Create for yourself an ideal—and live up to it. You can do it. Get a grip on yourself, and begin with confidence. "*Ut sit mens sana in corpore sano.*"

Lung Capacity Required for Endurance in High Altitudes

TO THE EDITOR:

I read with some interest the account of the ascent of Pike's Peak, by H. Blaine Syler, in a recent issue. I have been over that little jaunt myself some years ago, and reading the article recalls the familiar landmarks. I cannot, however, agree with his conclusions, that his success in making the climb was in any way due to the fact that he was a physical culturist. I started with a party of sixteen at ten thirty in the morning from Manitou and the climb eliminated all but five; the foremost, myself and a young man from Idaho, led the procession and reached the top at four o'clock. I began the ascent after a few minute's rest and reached Manitou at seven o'clock. I have never made any pretense of being a physical culturist and never took any exercise in my life that I did not get in the routine of my regular occupation; running a weekly newspaper. In my opinion the matter of endurance in high altitudes is lung capacity and the muscles play only a secondary part in the program. It is no great feat to walk nine miles up even a

sixteen per cent. grade, and still we see the strongest men physically overcome while the apparent weakling goes on to the top.

Regarding sexual science I believe you are doing a great work. The ignorance of the upper world as to what the under world is doing is appalling. Our inheritance is in so many cases disease and death that we begin to wonder if this is really an age of enlightenment. Mankind is naturally perverse in its heart, no matter what appearances indicate and this fact ought to be properly considered.

There is one thing that I think, is the crime of the century and I have never seen a line of mention or reference to it in your writings, although you are peculiarly fitted to take up the fight. I mean the practices used by women to prevent conception. So widespread is this practice that child-bearing is being left more and more to the ignorant, the corrupt and the unfit. Wives have changed liberty to license and our daughters are unchaste under its baneful influence.

Pittsburg, Kansas.

J. M. BURWELL.

A Remarkable Mother

A PROFESSIONAL GYMNAST WHO DOES NOT SCORN THE DUTIES OF MOTHERHOOD

THE Sandwinas are two remarkable gymnasts. Mme. Sandwina weighs two hundred pounds. Her husband weighs about forty pounds less. They came from Berlin to this country about a year ago. In their athletic performance Mme. Sandwina picks up her husband and handles him as if he was a mere toy. She is an extraordinarily powerful specimen of womanhood. She is practically as strong as many powerful men of her weight. She was born in Muenchen, Germany, and is twenty-four years of age. She was married to Mr. Sandwina six years ago. She has never known a sick day in her life, as she works at her profession steadily. Each morning she goes to the theatre and spends two hours in practicing, besides performing twice daily. It is quite evident the two hundred pounds which she carries is not made up of fatty tissue, when one learns that she is six foot tall.

Recently this pair of athletes were filling an engagement in the Orpheum Theatre at Portland. They went through their performance twice daily as is their usual custom. Notwithstanding the fact that Mme. Sandwina dresses in tights for the performance, there was no evidence that she was soon to assume the responsibilities of a mother. Every day throughout the entire period which to the ordinary wo-

man is often filled with pain and discomfort, she performed wonderful feats of strength. But the most remarkable fact in connection with her experience was her performance of these marvelous physical efforts up to within a few hours of the birth of her child. In fact, she went through her regular performance only twenty hours before her child was born.

Her husband writes that four days after the birth of the child she felt well enough to be up and about, but was compelled by the doctor to remain in the house until about the eighth day. If she had been a reader of this magazine she would probably have known better than to have followed this advice. On the eighth day she took her first stroll with the baby in the open air and she states that the youngster enjoyed it as much as

she did. On the fifteenth day after the birth of her child Mme. Sandwina was at the theatre for practice, and on the nineteenth day thereafter she again started back to work as before, three times a day, and has been working steadily ever since. This is remarkable proof that, after all, the responsibilities of motherhood need not interfere with the most strenuous profession, for the feats of strength performed by Mme. Sandwina would be difficult for some of our best athletes to duplicate.



Mme. Sandwina, the remarkable gymnast who continued the performance of her astounding feats twice daily until only twenty hours previous to the birth of her child.

Both of the Sandwinas are of German parentage, and they know little or nothing about physical culture as advocated in this publication. The father and mother of Mme. Sandwina were professional strong man and woman, and Mme. Sandwina says that she is one out of sixteen children. Mme. Sandwina says that American women are lazy, that they sleep too much, and that too much sleep leads to laziness. According to her ideas they should never sleep over six or seven hours. She believes also that they eat too much, especially candy. They should learn to eat less, and to use food that is of more nutritive value. Meat they should not indulge in. She states that she only eats meat now and then. Fruit and vegetables are her principal food, though as she is of German parentage it is not surprising that she enjoys beer now and then. She states she has drunk beer since she was two years of age.

Women, she states, should above all things be regular in habits. The quick lunch is a curse to this country. "We have been in the United States ten weeks, and at first we went to the



Max Sandwina, who assists his wonderful wife and in many instances takes the part of a human dumb-bell in their remarkable performance.

quick lunch places to watch the people gobble. It was really a comedy to us. Gum chewing is another bad American habit. When an American woman finds it necessary to go to a doctor in Germany one of his first orders will be to throw away her gum. American men use too much coffee and tobacco. A woman should never drink coffee, for it is bad for the nerves."

While the endurance and recuperative powers manifested by Mrs. Sandwina are to be ascribed to her strenuous profession, and while women in the ordinary walks of life could hardly be expected to assume the duties of motherhood so easily, there is a lesson to be gained from her case. That lesson is, that if the average woman were to devote a moderate degree of attention to rational preparation for motherhood, through diet and exercises adapted to her needs, the experience would no longer be looked forward to, as it is in most instances, as an arduous ordeal, but would be regarded as a natural func-

tion, with far less painful and dangerous effects than at times attend it under the present conditions.

Wholesome Soups.

Dried peas, white beans, or lima beans make good wholesome soups. Allow them to soak over night in warm water, then put them on in cold salted water and let them boil slowly until nearly done. Now add a few potatoes, cut in dice, and one large onion, minced fine. Do not pour off the water, but allow to boil down pretty well. When quite done add

a tablespoonful of olive oil, or good butter, and pepper and salt to taste. Pour in milk or water to make the desired quantity. This can be thickened, if desired, with a tablespoon of white flour, mixed with cold water. The olive oil or butter takes the place of meat, and is far more tasty and wholesome.

Curing Disease---Gaining Weight and Strength

METHODS ADVOCATED BY THIS PUBLICATION,
WHICH CONSTITUTE THE SCIENCE OF PHYSICULTO-
PATHY, ATTAINING ASTOUNDING CURATIVE RESULTS

By Bernarr Macfadden

THE comparison photographs on the front cover of this issue, and the various portraits we have reproduced in this article, present astounding evidence of the remarkable value of the methods advocated by this publication. Physcultopathy is a real science of healing—there is no guesswork about it. In the science of health- and strength-building, the body is actually regarded as a machine. When you are suffering from disease of any kind, some part of the human machine is out of order. The defects, whatever they may be, must be remedied, and then the body will slowly but surely go about the work of repairing and up-building, which insures a definite and permanent cure. Physcultopathy, as has been previously explained in this magazine, looks upon the nerves as the controlling power of the body. Weak nerves mean poor functioning and a weak body; strong nerves mean superior functional vigor and a vigorous body. Therefore, when weakness exists, the first effort that must be made in order to secure proper results is the stimulation of the nerve centers through various

means furnished by exercise, manipulation, fomentation, etc. Then the next feature of importance to be considered is the blood supply. The organs that are responsible for making the blood must be made to properly perform their office. With the body purified through physical culture methods, and with a new supply of rich blood to further the building-up process, the cure of disease—even when chronic in nature and serious in character—and the building of a strong body, is a comparatively simple matter. We

have proved this over and over again in thousands of cases. We have presented testimonials and pictures of results that cannot be duplicated by any other method of healing or strength-building.

If results are important, then physcultopathy is the greatest of all sciences, for health and strength are of more importance to the individual and to the nation than anything else, regardless of what it may be, for you should remember that physical vigor represents the foundation. You cannot build a house without a foundation. You cannot expect to round out and perfect your career without the



Miss Frances E. Bolton, of Battle Creek, Mich., cured of Auto Intoxication, Disordered Nerves and Headaches.



Mrs. H. Zander, of 302 Mohawk St., Chicago, cured of Retroversion and Prolapsus of Uterus.

physical strength that is necessary to "run" the human machine. A normal body requires the strength necessary to carry on the functional processes. Without this strength the body is but little better than a sort of huge jellyfish.

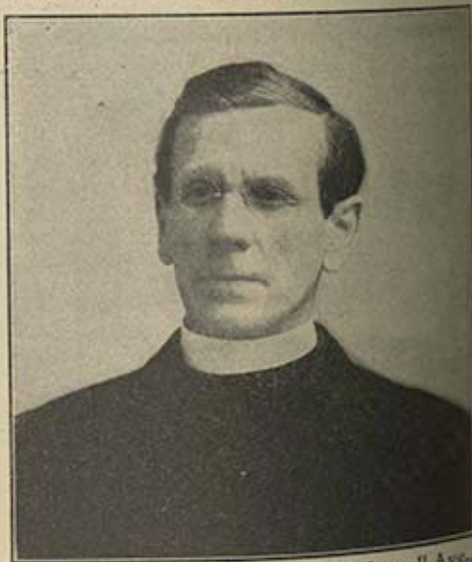
Physcultopathy, it should be remembered, includes in its propaganda every drugless natural method for increasing strength. There is nothing narrow or complicated about this science. It is the healing art simplified, brought down to the "level" of the ordinary reasoning mind. You do not have to be a scientist to understand Physcultopathy. All you need is the common, ordinary reasoning

power that are demanded in everyday life. That is why its popularity is so assured, that is why it accomplishes such astounding results. If you were to ask us what propaganda this publication has been advocating since its inception, we could answer in one word, physcultopathy, the science of healing simplified, purified and made accurate in every detail. In our January issue attention was directed to the remedial agencies that we especially depend upon, and those who are especially interested in pursuing a study of this science of the healing art are referred to that number. In future issues we will publish various articles that will set forth in minute detail the fundamental theories upon which this new science of healing is based.

In order to prove to our readers the astounding value of this science of healing, I am presenting herewith comparison and other photographs, together with extracts from the letters and statements of those who have been cured or greatly benefited by these methods.

NERVOUS HEADACHES AND AUTO-INTOXICATION CURED

I was one of those unfortunate children who are brought up with the idea that it is not proper for a girl to practice outdoor physical



Rev. D. Wesley Wise, of 2600 Lowell Ave., Irving Park, Chicago, a former sufferer from what he termed "a terrible case of stomach trouble."



Homer B. Terrill, of Iola, Kans., cured of despondency and great weakness. He gained 28 lbs. in weight. The first photo shows him as he was when he first tried physcultopathy and the second as he is now.

exercise. I was told to stay in the house, and to act like a lady; consequently, I grew up without proper physical development, and have always been somewhat of a weakling.

My taste led me into literary and editorial work, and as I did not know the value of physical exercise, I overworked my brain and nerves, and became an invalid. I had some hard experiences, mentally and emotionally, and have gone through disappointments, griefs and Gethsemanes. I became subject to terrible nervous headaches, and the victim of auto-intoxication.

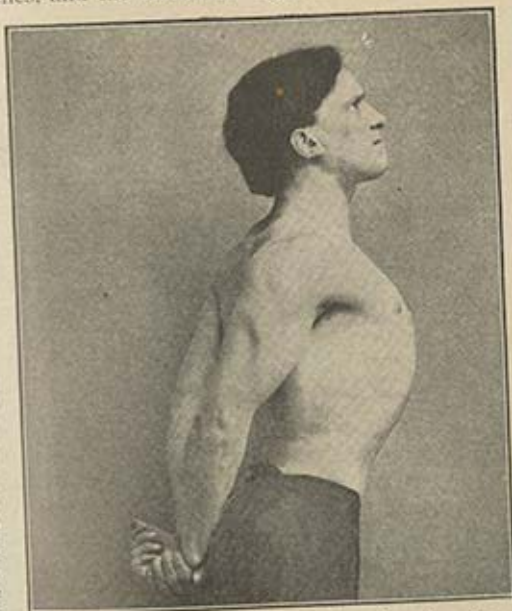
Disordered nerves caused intense suffering, and I wish that those who have no sympathy for nervous people could have a taste of my experience, in order to make them more compassionate to the neurasthenic.

Before I adopted your methods in earnest, I had read many copies of your publication, but did not have sense enough to put your theories to the test. I was finally compelled to adopt your methods. I kept putting off the proposed change in my habits until Dame Nature, who is a friend of mine, called me down and laid me on a sick bed. I had been worrying and overworking. It seemed to me I was going to have paralysis or something

dreadful. Not long before, I had been at a Sanitarium suffering from a frightful nervous headache attack. Hot and cold treatments were of no value, and I was finally given headache powders and hypodermics. When I at last adopted your methods I felt as though I might as well die as live. I was discouraged and disheartened, and it seemed to me deathly ill. After following your methods for a few weeks I was able to engage in active physical work, taking three hours daily exercise in the gymnasium. I am now acquiring the physical

development I failed to secure in childhood and youth.

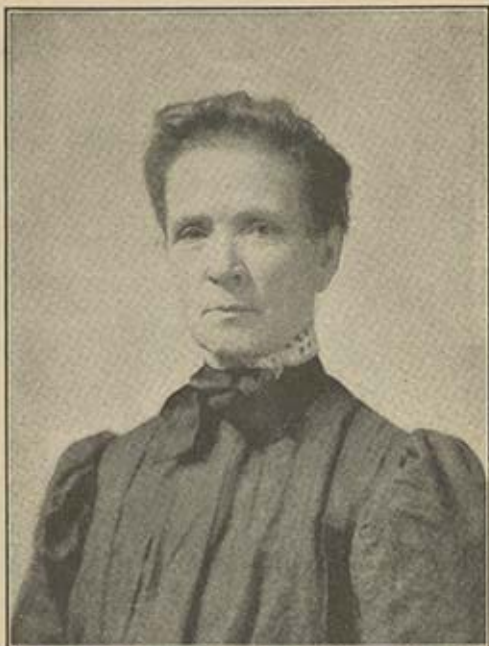
(Miss) FRANCES E. BOLTON.
Battle Creek, Mich.



J. E. Carlson, of Stockholm, Sweden, formerly an emaciated weakling, suffering from a constitutional disease considered incurable, now built like an athlete and strong as an ox, as will be noted from his photograph.

CURED OF PROLAPSUS OF THE UTERUS, LIVER TROUBLES AND CONSTIPATION

I had been told that I had an extraordinary case of constipation and liver trouble, also was afflicted with retroversion and prolapsus of the uterus. Half a dozen prominent Chicago doctors tried to cure me in the last ten years, and they all seemed to know the nature of the troubles, but were not able to remedy them. I was subject also to neuralgia and had catarrh in its worst form. For the latter I



Mrs. L. Emery, of Battle Creek, Mich., was, a short time ago, hardly able to walk and now her friends can hardly understand the remarkable change in her condition.

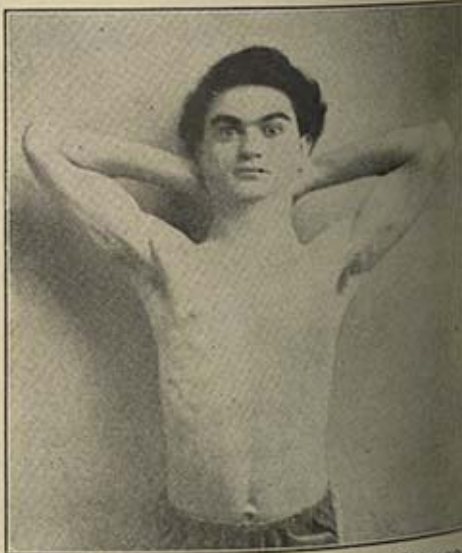
underwent several operations by Chicago specialists whose names I can give if desired. After trying the methods advocated in this publication for two months, my maladies have all been cured. I wish I could spread the knowledge of the theories and practice I have learned to the whole world. I attribute my wonderful improvement to physcultopathic methods. I am satisfied that I would not have lived much longer in my former condition. I had practically lost all hope and ambition. I am sure my friends will testify to the truth of the surprising benefits that I have received. My healthy appearance now will also testify.

(Mrs.) H. ZANDER,
302 Mohawk street, Chicago, Ill.

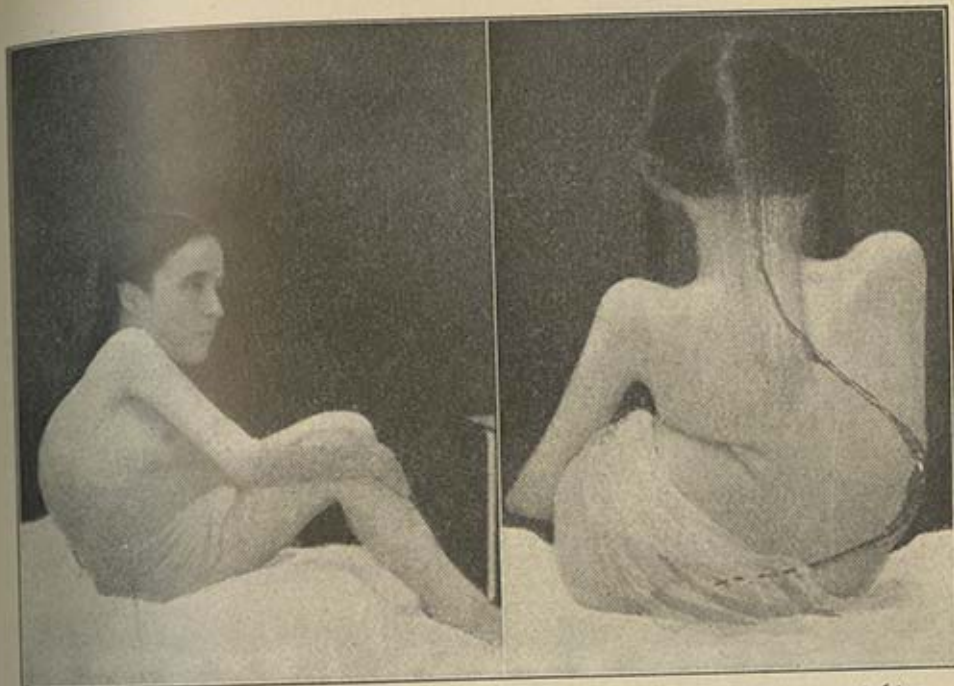
TERRIBLE CASE OF STOMACH TROUBLE CURED

I feel it is a duty I owe to suffering humanity to spread as widely as possible my remarkable experience in regaining my health. Those who formerly knew me say my recuperation is nothing short of a miracle. For many years I have suffered from indigestion due to the fact that I have eaten indiscriminately and recklessly. Because of my intense suffering I used all the various advertised digesters, and one by one they lost their power to help me, and I became a hopeless sufferer. A year ago I had an acute attack of gastritis accompanied by nervous prostration. I had a number of at-

tacks of nervous prostration lasting from days into weeks, finally becoming continued prostration. There were times when life seemed undesirable and I prayed to be delivered from it. As a last resort I concluded to try another sanitarium. I said to my wife, "Goodbye, dear. If I can't come back to you cured, I hope I shall come back in my coffin." I had to give up my parish. With six children what sort of a condition can you conceive a man to be in to talk that way to a faithful wife? At this particular institution, I was told that I had auto-intoxication, prolapsed stomach and bowels and was a nervous wreck. If I would follow the prescribed treatment I might hope to be considerably better in five years. Imagine how encouraging that was! I had previously been to two sanitariums and been under treatment by two specialists. I exhausted all ordinary methods, had tried osteopathy and dietetics. In extreme nervous exhaustion and mental depression, so weak and emaciated I could hardly creep around. I finally decided to give the methods you advocate a trial. I was so hopeless that I even contemplated suicide. I knew I would not be guilty of such a deed in a sane moment, but I actually feared I should become unbalanced and commit self-murder. A few days preceding the adoption of your methods was the blackest time of my whole experience, though there is nothing that I would accept in lieu of the benefit that I received even from the first few days of bodily purification advocated in the science of Physcultopathy. I had followed your methods only seven days when I was able to walk three miles with ease. After sixteen days I was strong enough to take a half hour's



E. L. Fishback, 429 W. Polk St., Chicago. A chronic sufferer of torturing boils and the poisoned blood that produces them. Cured in five weeks.



Two photographs of Pearl McGown of Johnson City, Tennessee, upon taking up our treatment. The dark line in the back view shows the location of the spinal column when she first began treatment. It is now nearly straight. Partially paralyzed arms and legs almost cured.

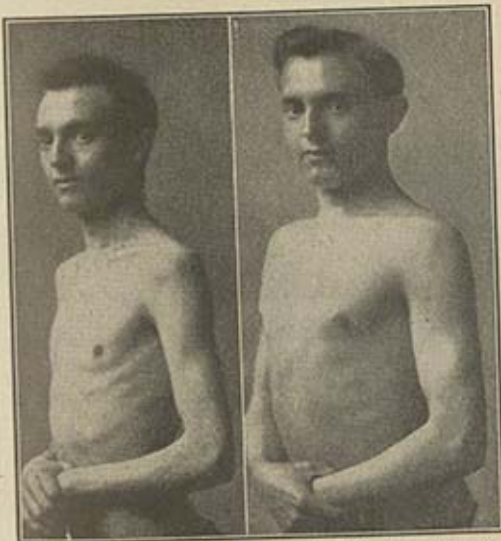
exercise in the gymnasium, and thereafter walk seven miles in an hour and twenty minutes, feeling so invigorated that I could have walked miles more. I had been adhering to the Physcultopathic régime but three weeks when I assumed the duties of an official chaplain at a large institution. My weight has increased thirty pounds, my circulation is better than it has been for five years past. I am capable of more physical exercise and more mental effort than for years, and life instead of looking forbidding and gloomy looks inviting and rosy. I believe I still have before me the best and most efficient years of my life.

(REV.) D. WELLESLEY WISE,
2600 Lowell Ave., Irving Park, Chicago, Ill.

DESPONDENT EMACIATED WEAKLING NOW AN ATHLETE

My experience with physical culture, has been a very interesting and most valuable one. A little over a year ago I was an emaciated weakling, despondent, and suffering from a complication of troubles. As a boy I had always been slight and not very strong. Having never fully realized the need of physical training, and living among people who paid little or no attention to such matters, I missed the very thing that one in my condition most needed. Matters went from bad to worse, and I found myself at last quite desperate—unable to sleep restfully, and tired on slight exertion.

Several physicians were consulted and I



C. S. Schonter before and after treatment, showing a marvelous gain in weight, health and strength.

was told by one that I had regurgitation of the heart, and vigorous or violent exercise might be the cause of my death. Having read something of the **PHYSICAL CULTURE** magazine, I determined to diet, lead a more active life and improve my condition. But my friends held the conventional ideas about such a régime, and were quite determined to oppose me, thinking I would injure myself. While I slept, my windows were closed at night for fear I should catch cold, and exercise and diet were looked upon as simply fads. As I knew the first thing a man must have is good, wholesome, health and strength before he can do anything in life, I finally adopted the methods in detail as advocated in *Physcultopathy* in your publication, and after a few months my health and strength improved wonderfully and I increased my weight from 112 to 140 pounds. I have found the scientific diet productive of remarkable results. After following your methods a few months, I gained enough strength to take a fourteen-mile slow run, and was not even sore the next day. My mind is clear and vigorous, and I feel fine in every way. In view of the great change in my case, from



Walter Wyss, of 5904 Superior St., Crescent Terrace, Cleveland, O., gained 40 pounds, cured of stomach trouble, nervousness and despondency.

weakness to robust health, I desire to express my grateful appreciation.

Iola, Kansas.

HOMER B. TERRILL.

CONSTITUTIONAL DISEASE REMEDIED

I feel it my duty to state what your methods have done for me. I suffered four years from a constitutional disease. I was run down, very weak and emaciated. I consulted eight doctors and medical authorities of different schools. It seemed that there was no hope for me. They did their worst for me, or at least it looked that way. I lost my faith in their power to cure disease, and tried experimentation on my own account, but did not obtain any good results. I finally began to practice the theories advocated in this publication, and in two or three months the world began to look very different to me. My health gradually returned and in three years' time I consider myself a healthy, strong man. Previous to my restoration my hair fell out, and my eyes were so affected that I had to use a pair of very strong glasses. I have been able to

discard these glasses, and I thoroughly believe *Physical Culture* and the theories advocated by its editor were the only remedy that could have cured me. I have proof of this in my own experience.

Stockholm, Sweden.

J. E. CARLSON.

TRAVELING SALESMAN RECEIVES DOLLARS FOR PENNIES

It is now three months since I began to give the methods you advocate a trial, and I could say that my health is perfectly restored and I feel like a new man. I now fully realize that I was in a wretched condition for more than two years before I began following your suggestions. And let me add that every penny I spent has been worth dollars, owing to my ability to attend to my business.

A. A. JOHNSON.

Quincy House, Boston, Mass.

BENEFITED MORE THAN WORDS CAN TELL

The benefit that I have derived from following *Physcultopathic* methods are more than



words can tell. The health, strength and knowledge which are so important in life have come to me at last in a small part, just enough to know that without it man's life is a blur, as my past life has been, and as I go on will see more and more the great mistakes I have made in trying to live as I thought was right.

Lancaster, N. Y.

JOHN R. TRUDLE.

CURED OF TUMORS. RETROVERSION AND PROLAPSUS FAST BEING REMEDIED

When I began your methods I was suffering from tumors of the breast, retroversion and prolapsus of the uterus. There was also a chronic catarrh of this organ. The only relief held out for me by the doctors was an operation. They were sure I could never expect to enjoy good health in any other way, but I have been butchered so much that I rebelled. I wish I knew how to express the extraordinary satisfaction that has come to me from the knowledge that the tumors from which I have been suffering have disappeared. There are so

many women suffering from troubles of this nature that I want to plead with them to try these natural methods before resorting to those terrible operations. I know of so many women whose lives have been wrecked because of female troubles, and there is not a single doubt but that the methods advocated in this publication would cure them, or at least start them on the royal road to health. No wonder physical culturists are sometimes called cranks. They have reason to be called cranks when health and strength can be secured so easily, even when suffering from such a serious disease.

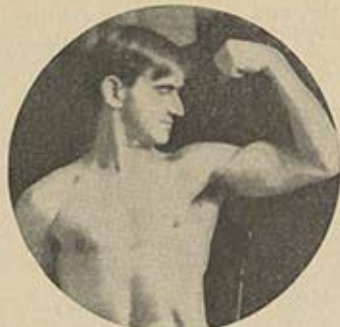
Dallas, Oregon. (Mrs.) ANNA WILSON.

CURING A TERRIBLE CASE OF DEFORMITY. REMEDYING PARTIAL PARALYSIS OF ONE ARM AND BOTH LEGS

The accompanying photographs show the deplorable condition of Miss Pearl McCown, of Johnson City, Tennessee, when she first began our methods. The crooked pencil line shown in the back view indicates the exact form of the lateral curvature of the spine when she first began to follow physcultopathic methods. She had not been able to walk for several years. She is not by any means entirely cured, but in a few months the paralyzed arm has been completely cured, the paralysis of the legs has been remedied, and she is fast recovering her normal strength and has been able to take a few steps. The most remarkable change, however, has been in her spine. The cur-



Ernest C. Melberg, weighed 148 pounds when he began to follow a physical culture regime. He is now almost a giant in strength, and weighs 178 pounds, an increase of 30 pounds in good solid muscular tissue.



Lewis Ochs, Meadville, Pennsylvania, weighed but 145 pounds when he took up physical culture theories. He now weighs 160 pounds, a gain of 15 pounds, and has greatly increased his strength.

bring about the astounding change that has already been accomplished in this particular case?

CURED OF NEURASTHENIA AND GENERAL DEBILITY

Having been suffering from neurasthenia with a coterie of various symptoms for many years, I resorted to the orthodox methods of treatment, but with no result. I was finally taken down with a serious fever and confined in a hospital, but apparently recovered and resumed my work. About this time I became interested in physical culture methods, and the results therefrom have meant to me more than words can express. Adherence to your methods for a few short months has attained for me a degree of health that I never before enjoyed. The improvement has been remarkable, as will be seen from the accompanying comparison photographs, that portray results more clearly than could be described. After following a strict régime for awhile for bodily purification, I began a purifying diet and while on this diet I gained thirty-three pounds in weight, though the difference in the comparison photographs is only fifteen pounds. My endurance and general capability have increased wonderfully. The suffering I previously endured I could not



J. N. Daugherty, Austin, Minnesota, weighed 128 pounds when he first became actively interested in building up a superior physique. He now weighs 156 pounds, showing a gain of 28 pounds.



Roe Stripe, Van Wert, Ohio, weighed 130 pounds when he first started to follow the methods advocated in this publication. He now weighs 168 pounds, a gain of 38 pounds of solid muscle.

vature has gradually changed, the spine has moved inward towards the center until it is very nearly normal, and there is little doubt but that this young woman will ultimately recover her full powers.

Where is there any method of healing which will take such a terribly deformed body and slowly but surely

definitely describe, and my present condition of health and happiness I hope to maintain.

C. S. SCHONTER.

1324 Stiles street, Philadelphia, Penn.

CURED OF ASTHMA

I am cured of asthma, my cough has entirely left me, I can lie down and sleep well. I am better in every respect than I have been for years. — All my friends and acquaintances thought I was past all help and they have not yet recovered from their astonishment at seeing me on the street.

Battle Creek, Mich. (Mrs.) L. EMERY.

A JUDGE RECOVERING FROM PARTIAL PARALYSIS AND INDIGESTION

I have suffered from partial paralysis and indigestion for several years. I consulted many doctors, but received no material benefit. As a last resort I concluded to give your methods a trial, and found more relief in a short time than from all the doctors I had before, and am of the opinion that if I follow

your methods strictly I will ultimately regain my health.

Paris, Idaho.

(JUDGE) D. C. KUNZ.

GAINED FORTY POUNDS. CURED OF STOMACH TROUBLE, NERVOUSNESS AND DESPONDENCY

The accompanying photographs show in but a limited way the marvelous improvement made while following the theories advocated in your publication. The first photograph in no way gives a clear idea of my deplorable condition when I first began, as it was taken three months after I started to follow a proper régime. On beginning I was in such a miserable physical condition that I was afraid to face the camera. The first photograph shows a gain of fifteen pounds in my weight when I began to follow Physcultophatic methods, and the second photograph shows a gain of forty pounds. It also shows my present physical condition, after having been cured absolutely of stomach trouble, nervousness, despondency and emaciation.

Cleveland, Ohio.

WALTER WYSS.

Snapshot of a Perilous Feat.



A glorious view can be had from the summit of the Charlottenburg, Germany, Town Hall, which is eighty-four meters high, looking over Charlottenburg and Berlin. Recently the citizens were horrified at the action of a man who climbed upon the railing of the highest gallery and imperilled his life by balancing himself on his head.

The feat was the result of a wager between the noted equilibrist, Baptiste Grondell, and another well-known performer, which was easily won by Grondell. The picture shows Grondell in the act of balancing himself on the railing of the Town Hall tower. His feat gives ample proof that he possesses nerves like steel.

The Greatest Sin

IT is gratifying to note that the editors of many religious publications are beginning to give some attention to the most monumental evil of our time—sexual impurity. Thousands of well-meaning sufferers from evils of sex have turned away, either temporarily or permanently, from the church because they were unable to secure therein the help they so badly needed. It is indeed pleasing to see this vastly needed knowledge being gradually disseminated by clergymen and Christian workers throughout the entire country. May the time soon come when every follower of Christ will realize that the presentation of this knowledge is a sacred duty. The following is an excerpt from an article by the editor of the *Sunday School Journal and Bible Students' Magazine*:

"What is known as David's great sin is, perhaps, the generic sin of humanity—lust. Read history, read fiction—which is the reflection and interpretation of history—read the current record of crime, in proof. This is the trail of the loathsome serpent that has dragged itself across the long ages, soiling and damning human life. Following back this trail, we see the ghastly skeletons of the dead, the piled and confused wreckage of hopes and happiness, the ruins of kingdoms, the melancholy monuments of innumerable and appalling tragedies, lonely graves where genius came to untimely and dishonored burial, the cold ashes of thousands of homes consumed by evil flames, the scattered bones of little children sacrificed on infernal altars, blood-rusted daggers of assassins, the crumbling walls of prisons and the clanking chains of gibbets, mounds covered with noxious weeds under which wretched suicides lie—the Via Dolorosa of history, the way of tears, and blood, and crime, and shame, down which more madness, and jealousy, and hate, and misery, and cruelty, and dishonor, and sorrow, and remorse, and despair have passed than over any other path of life. Lust is the insanity of the senses. It is the unclean demon imprisoned

under the foundations of the fairest palaces of life, imprisoned but of giant strength, and liable at any moment to force the restraining bars and break with polluting feet into the most sacred and beautiful chambers of the soul. Excited to a certain degree it is a madness which requires the full strength of the strongest will for its restraint and control. It is not amenable to reason, it is impatient at resistance of delay, it is insatiable in its desires, it is inexorable in its demands. Lust is love prostituted; it is a fallen angel; and the depth of its degradation corresponds to the heights from which it has fallen. It is the carnal nature at its lowest, as love is the spiritual nature at its highest. It holds possibilities of tremendous assaults of temptation. It may burst like a sudden tempest upon any hour of fancied moral security, like an overwhelming flood upon a smiling valley, like an unheralded volcanic eruption pouring devouring fire down a vine-clad mountain side. It is a temptation that springs out of the elemental depth of human nature, the heritage of the tiger and the ape in man, harking back to æons of brutality and savagery. There is no saintliness that may not be dragged down by it into the mire and filth; there is no culture so refined that may not debase itself to the level of its gross seductions; there are no eminences of honor which are beyond its defiling reach; there are no ties of friendship which it may not break; there are no confidences or affections which it may not trample upon; there is no self-respect so princely that it may not humble in the dust. By lust David fell from the heights of his God-established throne; under its malign influence he who was naturally so true and generous first betrayed and then took the life of one of the bravest and most loyal of his subjects. His name had been the synonym for honor and who was wont to look the world in the face without apology or fear, was so fallen that he abhorred his own soul."

A Peculiar Water Sport

TILTING TOURNAMENTS ON THE WATER FURNISH INTENSELY INTERESTING CONTESTS IN MANY SECTIONS OF FRANCE

By Marie J. Blakely

EVERY country may be said to have its own particular sport. In Japan wrestling seems to be the national game, if it may be so termed; in England it is cricket, in America it is base ball, but among the many sports that furnish interesting contests, water tilting as practiced in France is perhaps the most unique. It is the sort of a contest that tries the nerve and skill of the athletes who attempt it to the utmost limit. The accompanying photo-

tively small shield at the end. The active contestants each stand on a small platform at the end of the boats engaged in the contest.

The opposing boats take their positions, and the rowers, with their short paddles in the air, await the signal for the start. When the signal is given, they move off as speedily as possible towards each



They are off! The signal has just been given, and the crew is getting up speed!

The captain and his crew waiting for the signal to start.

other. Their object is now to get up as much speed as possible in order to enable their captain to deliver a

graphs illustrate in detail the nature of the sport.

This particular amusement has been very popular at Lyons, France, for many years. Every Sunday crowds throng the banks of the Rhone and Saone to witness these interesting and somewhat dangerous contests of skill and strength. The opposing boats—which in appearance are not unlike an English punt, or a Canadian bateau—take up their positions about a hundred feet apart. They are manned by eight oarsmen and a steersman, in addition to the captain, the chief actor in this athletic drama, who is armed with a wooden lance, twenty-five feet long, having a compara-

hard blow at his opponent in the other boat.

The captains at the end of each boat approach each other with lances raised. Just before they meet these lances are lowered and the interest increases, for the crucial stage of the contest is imminent. The object of each contestant is to strike the center of his opponent's shield and at the same time to withstand the thrust of his antagonist's lance, for if both lances do not break, one contestant or the other must fall into the water. It is not unusual for both to lose their poles and go overboard. One can well realize the excitement among the spectators as the two fast moving boats come into close



The two boats approach each other with each of the captains well-braced for the expected impact of his opponent's lance. Note the crowds of spectators on the banks of the river.

proximity with each other. The question as to which man is going overboard as the two lances meet the shield opposed to them is intensely interesting.

Needless to relate, the ducking in the river which is sure to come to one or the other, or both, is always received with tumultuous applause by the immense crowds that line the banks. This sport has become so popular in parts of France that great covered reviewing stands have been built in some places along the river banks, and every foot of space on the banks and bridges near the scene of the contest is occupied.

Readers of this publication who might be desirous of trying a game of this kind on their own account will find it very easy to experiment. Simply secure two long poles of equal length and weight, secure one capable oarsman or more, manning each boat with the same number, and then proceed

with the contest on the lines we have described. If you do not desire to bother with a shield such as is mentioned in this contest, you can place a boxing glove on the end of each lance. As the boats approach each other and each contestant braces himself for the emergency, you will experience much interest whether you are one of the active participants or are viewing it as an outsider.

It would be better for the opponents in this improvised contest to stand on the back part of the boat as the boats approach each other, and with the boxing glove on the end of the lance there is but little danger of anybody being injured. About the only result of the encounter will be a ducking for one or both of the participants.

In America, canoes are also used by those participating in this novel sport. Canoeing clubs frequently include tilting contests in their



A snap shot showing the defeated captain on his way to receive the ducking that comes with defeat in this exciting contest.

race meets and regattas, in addition to the usual fixtures of sailing and paddling races, and the "upset" races (in which each man is forced to take to the water and regain his position in the boat during the course of the race), and other competitions designed to afford amusement to the spectators, and calling for considerable skill on the part of the victors.

Taken all in all, the aquatic sports of various countries constitute no small proportion of their outdoor amusements, particularly during the warmer seasons. In addition to the more common forms

of boating and swimming—practiced by even barbarous tribes—the diversified water sports peculiar to various countries exhibit man's love for the water, and perhaps his desire to master it. It is worthy of note that those nations among which swimming, when practiced at all, is merely regarded as a means to prevent loss of life, and in which boats are not utilized beyond the domains of commerce and warfare, compare unfavorably, in point of power and progress, with the more athletic countries in which swimming and boating have attained a high degree of perfection.



The defeated captain in the water waiting to be picked up by the small boat that has started in his direction.

Sense and Nonsense.

By Harry G. Hedden.

A great many people seriously need an operation or some kind of skillful treatment for cranial vacuumitis.

The high death rate of women and birds is highly fashionable.

No, bleeding is not out of date. Nowadays, however, the doctors bleed their patients financially instead of physically.

These dispensers of famous fat-cures are surely living upon the fat of the land.

There are two kinds of courts in this country, probate and reprobate.

The leading sign of the times is the dollar sign.

Dame fashion is very economical; she doesn't allow much waist.

We ought not to be victims of circumstances; we ought to be victors over circumstances.

Strong-headed people are often weak-minded.

Some doctors are in the medical profession for the good of humanity; a great many more, however, for the goods of humanity.

If some people's ideals were as high as their heels, they would do far more good in the world than they are doing.

General Question Department

By Bernarr Macfadden

Our friends will please note that only those questions which we consider of general interest can be answered in this department. As we can only devote a small portion of the magazine to matters of this kind, it is impossible for us to answer all the queries received. Where the letters, however, do not require lengthy replies, the editor usually finds time to answer by mail. Where an answer of this kind is required, please enclose a self-addressed, stamped envelope.

Mouth-Breathing

Q. Can mouth breathing caused by a tumor in the throat or nose be remedied by exercise?

A. Mouth breathing caused by a tumor such as you mention can only be remedied in two ways, one by an operation, provided the tumor can be safely removed, and the other by going through a course of treatment for purifying and improving in every way the condition of the blood. As you can well realize, a tumor located in any part of the body is brought there by the blood, and in those cases where the tumor has not become of a hard, fibroid nature, it can be removed by the blood, if proper methods are adopted for bodily up-building. Of course, before an operation is recommended, we would in all cases advise that the natural methods suggested be adopted. It would be impossible in the short space allowed to give definite instructions for purifying the blood. The general principles advocated in this magazine will usually bring about satisfactory results.

Making Peanut Butter

Q. Kindly give in your valuable magazine a recipe for making peanut butter at home.

A. Peanut butter is easily prepared. It simply consists of ground, roasted peanuts. The peanuts, of course, grind more easily if they are put through the mill as soon as possible after roasting, as they are drier and more brittle at this time. An ordinary nut grinder can be used for the purpose, though, of course the shell and the thin outside covering of the nut should be removed before grinding. There is no oil or any ingredient used in making peanut butter. In some instances, cornmeal and other low priced ingredients are used to cheapen the product.

Reducing Waist, Bust and Hips

Q. How can I reduce my bust, waist and hips?

A. If you will read the suggestions found in my recent article for reducing a large abdomen and follow them in every detail, you will soon be rewarded by a decided reduction in the

parts of the body referred to. Exercise is, of course, especially valuable, but in nearly all cases a certain amount of restriction in diet is needed in order to get results that are satisfactory in every way.

The Corset

Q. My betrothed believes most emphatically that the corset is of benefit to her, that she has given it a fair test both with or without, and that it is of benefit as a brace for her back, which is very weak. However, she says she does not wear it tight.

A. I am satisfied that the views expressed by your betrothed will change with time if she takes the trouble to consider the conclusions set forth in this publication. If her back is in a proper condition, it should not need a brace, and the fact that it does need a brace would indicate weakened muscles in this part of the body and the only advice that could be given under such circumstances would be the adoption of those methods necessary to properly strengthen the back. This result, as you can well realize, could easily be brought about by the various exercises necessary to actively use the muscles located in the back. The statement that she does not wear her corset tight is made in all cases, but please remember that any change made in the appearance of the figure by a corset would brand this statement as false in every instance. For the good of your home and future happiness of both yourself and fiancée, it is to be hoped that the corset will be barred forever.

Cocoa or Chocolate

Q. Do you consider cocoa or chocolate a nourishing or non-stimulating drink? How does it compare with coffee or tea?

A. Cocoa and chocolate are supposed to contain a very minute quantity of stimulating elements. The quantity, however, is so small and the food values of these articles so satisfactory that they are well worth considering. They can be recommended whenever a hot drink is desired.

Purifying Water

Q. Kindly advise how water can best be purified. Which is better, cistern or well-water. Is charcoal a good purifier?

A. The best way to purify water is to put it through the distilling process, that is, secure an ordinary still and distill all the water you drink, though it is necessary to aerate the water in order to make it palatable. About the best distilled water, is that distilled by Nature in the form of rain. When rain water is secured from clean roofs and stored away in clean vessels or vaults in such a manner as to avoid contamination, it makes the purest and the best drinking water. A filter is, of course, quite valuable for removing the impurities that the water may contain. Many filters are constructed partly of charcoal. Any method which you can adopt which will force the water that you desire to purify to pass through charcoal would accomplish the object desired.

Courage, Ambition, Self-esteem

Q. Can you recommend a remedy for lack of ambition, courage and self-esteem?

A. The lack of the characteristics mentioned in nearly all cases indicates physical weakness. In practically every instance the building up of the bodily powers and the improvement of the muscular and nervous energies, in other words, the adoption of those methods that would be inclined to make one a healthy, vigorous, well-developed, and normal human being, would naturally remedy the defects referred to. Manliness and cowardice cannot combine, and self-esteem and ambition represent characteristics that are rarely met with in the weak and ailing. Buoyant, vigorous health is necessary to acquire and maintain them.

The Rest Cure

Q. Please inform me as to the advisability of the rest cure for consumption, and also state what climate in the United States you consider the most healthful.

A. I could not under any circumstances recommend the rest cure for consumption or any other disease. For a short period, say from four to eight weeks, comparatively freedom from very vigorous or violent exercise might be advisable, in case a very full diet, such as furnished by milk, is desired; but in practically every instance, a complete rest will weaken the entire functional, muscular, and nervous organism. At least a certain amount of mild exercise is necessary in order to maintain bodily vigor, and this is really far more essential in the cure of disease than under ordinary conditions. As to the best climate to cure consumption, New Mexico seems to furnish one of the most favored locations, though I do not believe that climate is as important as it is supposed to be. The diet, exercise and general environment are really of far more importance than climate.

Remedying the Itch

Q. What kind of treatment would you recommend for the disease commonly called itch? I notice the annoyance is mostly present when going to bed. I very rarely notice it during the day.

A. As a rule, two or three hot baths weekly, making free use of some good soap, will remedy a trouble of this nature. When taking hot baths for this purpose, however, cold water should not be used after the bath. There are forms of the itch, however, which are due to the presence of a minute parasite, which from one standpoint you might say is not very different from ordinary lice. When these minute animals are the cause of the symptoms, it is a good plan to follow the hot bath referred to by thoroughly rubbing the affected parts with a mixture of sulphur and vaseline. A few applications of this mixture should destroy the parasite of the annoyance, and the irritated parts should quickly heal.

Restricting the Abdomen while Breathing

Q. I have made a habit of drawing in the lower part of my abdomen whenever I am walking or standing, and especially when I am taking deep breathing exercises. I have been told that this is injurious.

A. We have replied to queries of this kind before, but as many of our readers are not fully aware of our theories, I will state that the abdominal region should never be held in while walking or breathing. The shoulders, of course, should be held back and down, which will give the spinal column a proper position, and the abdominal region will then assume its normal position without restriction of any nature. This part of the body should expand when the breath is inhaled, and contract slightly when it is exhaled. This subject will probably be given more detailed attention in an article to appear later.

Eating Skin of Peanuts, Almonds and Fruits

Q. Do the skins of peanuts, almonds, and such nuts harm the system? Also the skins of various fruits, apples, pears, prunes, etc.?

A. The skins of peanuts and almonds are practically harmless; in fact, they are composed mostly of woody fibre and assist to a moderate extent in accelerating the peristaltic action of the bowels. Where one is inclined to be constipated, it would be advisable to use these skins. If otherwise, there is no special necessity for eating them, provided they can be conveniently removed. The skins of some fruits can be used with impunity. The skin of apples, pears, peaches, are rich in nourishment and can be used at all times when the flavor is pleasing in character. There is no harm in eating these skins under any circumstances, provided they are thoroughly masticated.



THE VIRTUES OF OUR METHODS PROVEN

Fighting for our Youth

TO THE EDITOR:

By chance a copy of your magazine fell into my hands, and I want to tell you that it certainly is wonderfully gotten up, and must surely be doing a great amount of good.

You are fighting for our youth, and that is where your work is practical. If you sow the seeds of purity and manhood into their hearts, you will be doing a great and lasting service for America.

Just as Sparta triumphed (because her youth were carefully trained, and kept free from the contaminating influences of the world), over luxurious and corrupt Athens, so we will triumph over all our foes, if men like you instill into the hearts of our youth the principles of right living.

It is a shame the way we waste our boys (the handsomest and manliest since the days of ancient Greece), by not teaching them in their early years, the secret of life.

I have travelled all over the world and have had a good opportunity to study the conditions existing in the different countries of Europe and Western Asia. Two months in Germany, after a short stay in the other European countries, will show you why Germany is the leader of the continent to-day. They care for their children, in a way that no other nation does.

It is a remarkable fact of history, that when the youth of a nation are exposed to the temptations of the world, they succumb to them, and that once the youth of a nation are corrupted, that nation is doomed.

Greece, Sodom, Persia and Rome are sad examples of that true fact.

There exist to-day in Paris, the same gross immoralities that shook ancient Rome. The corruption existing in the French schools, surely to a certain extent explains Sedan, if the truth of the assertion of Wellington is accepted "that on the foot-ball fields of Eton and Harrow, was won the battle of Waterloo."

Cut out, with your editorial knife, that cancer (if you see it cropping out in America), that has been the fore-runner of the doom of every nation that has waxed and waned.

By teaching boys that virtue and strength are twin-brothers, you will build an America that will be able to cope successfully with any situation.

In the beautiful sun-kissed valleys of California, the people of the Occident and Orient have met. The old elemental racial feeling of the white and the yellow exists there

to-day — a feeling that neither treaties, nor statesmen can change. We want to feel that we have a race of men, that are able to do and dare. We want to feel that we have a race of men that can bear the burden of a war, if that should be our lot.

While the East is rolling in luxurious ease, confident that no nation or race, can affect the prestige of America and the concessions, Japan is preparing for the mastery of the Pacific. God grant that we have no war, but if we do, we want to feel that the descendants of the men that fought at Bunker Hill and Gettysburg are worthy of their sires. And the time to begin is now.

Mr. Macfadden, you are doing a great work, and a work that is lasting and far reaching.

I am going to send you the names and addresses of half a dozen boys, in the very near future (with my subscription for them), and I feel sure they will be different men, for having had the opportunity to read your valuable paper, and learn the sane way of living.

In the meantime, accept my sincere good wishes.

EDWARD M. BENTON.

Values Physical Culture next to the Bible

TO THE EDITOR:

The Bible of course is the greatest book in the world; next to it I place your magazine, and John Bunyan's immortal allegory, "The Pilgrim's Progress."

Nearly nine years ago, when I was working in the city of Worcester, Mass., a copy of your magazine came into my possession. At that time I had to give up work on account of suffering from stomach trouble. I left the city and returned to my home on Prince Edward Island, determined to give your methods a fair trial. By adopting the two meals per day plan (and sometimes eating only one), I gained about twenty pounds in a little over a year, and cured my stomach.

W. A. MILLMAN.

Alberton, Prince Edward Island.

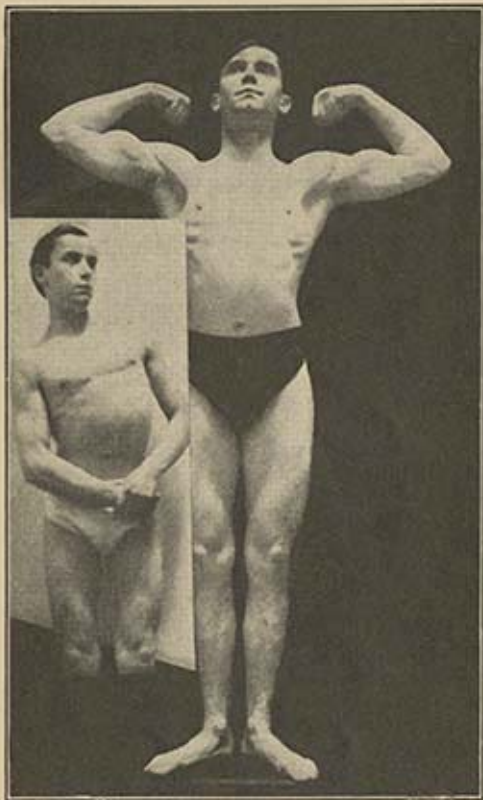
Comment of a High School Principal

TO THE EDITOR:

I keep your magazine before the high school pupils continually. All of them get the benefit of its good moral teachings. They read it until its outer leaves are all torn off. It is literally "read to pieces."

BRENT A. LINDSAY.

Principal of High School, Burton, Wash.



Two photographs of Fred S. Korn, 5253 S. Halsted street, Chicago, Illinois, showing a gain of sixteen pounds of solid muscle and a corresponding gain in vigor, as a result of following the suggestions found in our literature

Gained Sixteen Pounds of Solid Muscle

Fred S. Korn has sent us photographic proof of the splendid results he has achieved in the building of superior physical vigor. He states that he has not by any means reached his ideal as yet, but he intends to keep up the good work. He informs us that he has been a reader of our magazine for a long time and is very greatly pleased with what he has learned therefrom. The following is an extract from his communication.

"I have been carefully studying your magazine since 1899, and will say that it is through its pages that I have learned to lead a clean and pure life, free from indulgence and excesses that are seen in the youth of to-day. I am also proud to say that as a result of the hints given in your literature, I am master of my mind and body.

"One of my feats of strength is taking a fifty-pound dumb-bell in each hand, total 100 pounds, and bending down with the weight of the body resting on one leg and then raising to an upright position. I take a dumb-bell weighing seventy-five pounds, and hold it with my teeth and do a hand stand on two chairs."

Diagnosed as Victim of Cancer—Gains Twenty-seven Pounds—Cures his Wife and Saves his Child from Children's Diseases

TO THE EDITOR:

I want to thank you for the benefit I have received from your books and magazines. Over two years ago I was taken sick. I went from one doctor to another and they all had a different story to tell me. I was doctored for everything you could think of. I dropped from 165 pounds to 108 pounds, and the thinner and weaker I got the more the doctors would tell me to eat and the more dope they would give me, I ate three big meals (with meat) a day besides raw eggs and milk every two hours. I got so weak I could not get off my chair. Then I had one of the best doctors in the State to examine me and after he had asked me all kinds of questions about my parents and grandparents he told me with tears in his eyes I had cancer of the stomach and that an operation within ten days was the only chance to get well.

I had been reading some of your books and at once made up my mind not to have an operation till I had tried some of your methods. The 1st of September, 1908 I stopped taking medicine and followed your instructions for the milk diet. In 32 days I drank 163 quarts of milk and gained 27 pounds in weight, and the 10th of October I went back to the store to work and was feeling fine.

I am not real strong yet, but hope to be before long. I feel better than I ever did. My wife and I also cured ourselves of bad cases of constipation by your methods. We have also been able to keep our three year old baby from taking any of the children's diseases. He played out doors all winter in the snow and was exposed to measles, mumps, and whooping cough, and did not as much as take cold.

We eat two meals a day, with lots of fruit, and drink plenty of water between meals, sleep with three big windows wide open and when it was eight and ten below zero we took a cold shower bath in the cold room. To be sure our friends call us cranks, but we don't mind that. I expect to spend my vacation at your Sanatorium to learn more about living right.

Watsonstown, Pa. G. BOYD AUNKST.

A Minister Made Strong

TO THE EDITOR:

I wish to say a word of appreciation for your magazine, PHYSICAL CULTURE. It has been a great blessing to me in the past few months. During each of the past two years I had a siege of sickness in the month of January. This year I felt it coming again, but having read your magazine I laughingly said to my wife that I would try exercise, diet and cold baths for a while. Well I started to exercise twice each day. After three or four days I wanted to quit—too tired at night or too lazy in the morning but then I read another number of PHYSICAL CULTURE and vowed again to keep it up. For the next two weeks I had to drive myself to it—but finally it began to take effect

and I liked it. Since February 1st, I have not missed a single time and now I am well and stronger than I have been in ten years and really enjoying life.

I have been a preacher for ten years and bothered with catarrh and frequent colds, I discarded my overcoat and muffler the latter part of January and since then have been out every day in all kinds of weather, but have not had a cold. The head and neck exercises have about "fixed" the catarrh. I live on fruit, nuts, vegetables, milk and breakfast foods—no meat—I believe my power of endurance has been more than doubled. I am coming to think that your teachings are just as important for the physical body as the preachers are for the soul. In fact the more I study the life of Christ the more I find that he insisted on healing the physical body before teaching them about their soul. In fact I believe nine-tenths of Christ's teachings are about physical and social relations in this world and only one-tenth about the future world.

I would like to know more of your methods so I could help my people in my work. I have wondered if such knowledge should not be required in our ministerial course.

REV. C. A. MACDONALD,
Pastor Christian Church.

McKee's Rocks, Pa.

Once Hopeless Wreck—Almost Paralyzed

TO THE EDITOR:

About three years ago I had an accident to my spine and after doctoring with M.D.'s for about six months, was a *nervous wreck*, almost paralyzed with no more hope. About this time, a friend sent me over some magazines, but I had not looked them all through for some months, as I had not the strength at times to page a book, so I had suffered for about nine months, before I came across a *PHYSICAL CULTURE* magazine at the bottom of the pile. This book looked new to me and at once I took an interest. I read the testimonials and saw that many had been nervous wrecks, as I was at the time, also that they had been despondent when they first saw the magazine, but after reading the messages of health from you, Mr. Macfadden, as well as your other capable writers, they were inspired with hope. This put new life into me, a determination to get well. I followed your principles faithfully, laid aside my corsets forever, and after three months was very much improved, then I went to an osteopath, who cured my spine, a sprain of the vertebral ligaments. At that time I also joined the Physical Culture Club, of Chicago, and there met my husband, who is also a physical culturist and vegetarian, so you see, I have a lot to thank you for, Mr. Macfadden.

After witnessing the knee bending contest at your Chicago lecture I thought that I'd try it. I performed the exercise 230 times.

Ever your friend and well-wisher,
MRS. MALVINA THOMPSON.
225 Walnut avenue, Chicago, Ill.

Compares Physical Culture to the Bible

TO THE EDITOR:

A room has been fitted up and maintained

by our minister, as a reading room for the young men and boys of our city. Here physical culture is taught and physical culture amusements indulged in.

Excepting the bible, I know of no publication which so perfectly meets the moral, intellectual and physical needs and enjoyments of our boys and girls.

Troy, Kansas.

MISS BIRD CAMP.

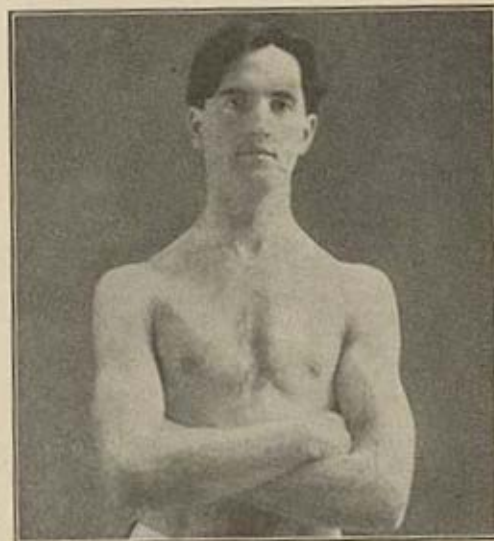
Remarkable Results Secured in Ten Weeks

TO THE EDITOR:

I am enclosing you one of my photos, which will show very clearly what I have accomplished in following the suggestions found in *PHYSICAL CULTURE*. The results portrayed were brought about in the short time of ten weeks. I have been a reader of your magazine for some time, but never lived up to its teachings until ten weeks ago, during which time I was sick with pneumonia. I believe that I have accomplished more in this short period than any of your readers. In the beginning I was round-shouldered, flat-chested and flabby, with tender muscles, and I have developed so wonderfully as to surprise my friends as well as myself. One thing that I believe has helped me considerably is the habit which I have acquired of taking deep diaphragmatic breathing exercises, as suggested in your literature. Your magazine has been a great help to me morally as well as physically. I feel as though I could not do enough to repay you. I sincerely hope that your literature may fall into the hands of the boys and young men and even women who are living the pace that kills. I only wish that I had known of your efforts earlier in life.

ERNEST L. PUTNAM.

307 N. Main street, Ellensburg, Wash.



Ernest L. Putnam, of Ellensburg, Washington, who claims to have made a remarkable change in his physical condition in ten weeks.

Physical Culture Directory

TIME FOR ACCEPTANCE OF NAMES EXTENDED TO AUGUST 7th, TO GRANT ALL PHYSICAL CULTURISTS AN OPPORTUNITY OF BECOMING ENROLLED

SO many of our readers have urged upon us the necessity of securing as complete a list of names as possible in the second edition of the PHYSICAL CULTURE DIRECTORY that we have been moved to extend the time of closing the forms of the DIRECTORY until August 7th, 1909. Many of our correspondents have expressed surprise that there were so few physical culturists listed from their immediate vicinity. In almost every instance we have discovered, through examination of our files, that there were numerous subscribers to PHYSICAL CULTURE in the localities in question, but that for some reason their names had not been listed in the DIRECTORY.

We would urge upon all followers of the physical culture movement the possibilities of this DIRECTORY in the furtherance of the cause. It offers many excellent opportunities of securing congenial correspondents and companions.

Attention has been called to the fact that the male physical culturists' names appearing in the DIRECTORY greatly outnumber those of the fairer sex. This indicates that the ladies are not fully represented, and we urge upon them to lose no time in enrolling themselves with their fellow physical culturists.

The forthcoming edition of the DIRECTORY will be sold at the same price as

that charged for the first edition, 25 cts., including the insertion of name and address. Those wishing a full description of themselves inserted in the DIRECTORY, may supply the information requested in the coupon below, and on receipt of \$1.10 we will place any name requested on the subscription list of PHYSICAL CULTURE for the forthcoming year, and also insert name and full description in DIRECTORY No. 2, and forward a copy as soon as the work is off press. The reader will note that it is necessary to forward a subscription in order to secure insertion of full description in DIRECTORY.

This notice of close of DIRECTORY No. 2 is absolutely final. It is improbable that a further edition of the DIRECTORY will be issued during the present year, and we earnestly advise our readers to have their names and addresses listed in the DIRECTORY in order to prove to those interested in the movement that they have many fellow physical culturists, and to point out to the skeptical the growing interest in the physical culture movement throughout the world.

A combination offer has been made to enable those who subscribe to second edition to secure the first edition at a reduced rate, both books being sold, together with a yearly subscription to this magazine, at \$1.20.

COUPON

(PUT A CROSS OPPOSITE PROPOSITION YOU ACCEPT. WRITE VERY PLAINLY.)

Please find enclosed \$1.10, for one year's subscription to PHYSICAL CULTURE Magazine, and insertion of my name in PHYSICAL CULTURE DIRECTORY, No. 2. Subscription to begin with.....Number.....

I enclose twenty-five cents, for which please insert my name and address only in *Physical Culture Directory, No. 2*, and send me a copy as soon as completed.

Name.....
 Street Address.....
 City.....State.....
 Occupation.....Height.....
 Weight.....Color of Hair.....
 Eyes.....Age.....
 Married or Single.....Religion.....
 Condition of Health.....
 Education—Poor, Fair, Good, Superior, Very Superior.....
 Do you believe in the physiological laws of sex as advocated by Bernarr Macfadden?.....

Comment, Counsel and Criticism by Our Readers

If, at any time, there are any statements in **PHYSICAL CULTURE** that you believe to be erroneous or misleading, or any subject discussed regarding which you take issue or upon which you can throw additional light, write to us, addressing letters to this department. We intend to make this a parliament for free discussion. Problems that you would like to see debated, interesting personal experiences, criticisms, reminiscences, odd happenings, etc., are invited. We shall not be able to publish all letters, but will use those of greater interest to the majority of readers. For every letter published we will present the writer, as a mark of our appreciation, with a subscription to **PHYSICAL CULTURE**, to be sent to the writer or to any friend the writer may designate. For the convenience of our office, kindly write us after the publication of your communication, giving name and full address of the person to whom you wish subscription to be sent.—Bernarr Macfadden.

Suggests a Physical Culture Convention

TO THE EDITOR:

The **PHYSICAL CULTURE DIRECTORY** has materialized at last, and a great success it is.

Although disappointed in not finding others from my town listed therein, I am rejoiced to see Sunny Kansas so well represented. I have received interesting letters from several of these "true believers" in the Sunflower State as well as many physical culturists from all over our broad land. The spirit they breathe is always helpful and inspiring, and it is a pleasure to read them—and to reply.

I was sorry indeed to find so few girls' names in the book—only 218 out of the large number listed. Am inclined to believe that some of us girls are "afraid to have a purpose firm and afraid to make it known," for surely the men physical culturists do not outnumber us ten to one.

We owe it to the cause we represent of health and right living to "let our light shine," don't you think so, sister physical culturist? The influence and example will encourage others to be true to their colors. I realize that "convention beats us down" and to stand up as an advocate of physical culture and all its teachings does take courage. But let us take our fearless editor for an example. This great physical culture movement is still in its infancy but it is making tremendous strides and some day soon we shall be proud that we contributed a little to its growth. By living consistent physical culture lives, by entering our names in the Directory and encouraging by letter other physical culturists, by scattering copies of the magazine and taking subscriptions for the same—these are little ways within the reach of us all through which we may help in the good work.

When I think of the health and happiness that I enjoy to-day as contrasted with the ill-health and despondency of the days before chance put a copy of the magazine in my way, I am ashamed that I have done so little to repay the debt, by showing others the way.

I hope that we physical culturists who have become acquainted through the medium of pen and paper may later devise plans for conventions in our respective states and localities

and thus enjoy the physical culture companionship that I feel from experience, many of us have never known. We could camp out, live the simple life and find congenial spirits, i.e., "cranks" of a like degree. For instance, in addition to living according to the physical culture regime in general, my particular hobby is horseback riding (all devotees of equestrian pleasure, take note).

If the Directory is to be a still greater success, it is ours to make it so. So in accordance with this idea I will say that I hope to have the pleasure, sometime this summer, of holding a "meet" of physical culturists here at my home among the beautiful wooded hills of Eastern Kansas. We are a mile and a half from Lansing, which is an hour's ride by trolley from Kansas City, Mo. The farm is of 480 acres, house and barns are large and all physical culturists will be welcome. There are several points of interest within ten miles—The Federal Prison, Fort Leavenworth, the State Prison and the Old Soldier's Home.

As for the time for this gathering of the clans—it's up to you. Let me hear from all who could come.

Your physical culture friend,

PHOEBE LAMBORN.

Leavenworth, Kansas, R. D., No. 2.

Raising Money for a Gymnasium

TO THE EDITOR:

Over eleven hundred dollars have been raised by the people of the Episcopal Church of Ironwood, for the erection of a parish house to contain a gymnasium and swimming pool. And all during 1909. The pool will be forty feet long by twenty feet wide. The depth will vary from three and one-half to seven and one-half feet. Over the pool will be a gymnasium with modern equipment. The promoters have shown considerable initiative in their various methods of raising money. A "Kirmess," or the dances of different nations; in which many took part, brought nearly four hundred dollars. To make and lay a concrete block costs about twenty-five cents. It will take about one thousand blocks for a suitable foundation. Cards on which they are represented by squares are being sold for the cost of making

and laying. The name of the buyer is written in the square that he buys. When the corner stone is laid these names will be placed within. The Knights of King Arthur, a church order, intend to give a minstrel show soon. Proceeds to be devoted to the gymnasium. The boys have volunteered to excavate the hole necessary for the pool. It is thought the entire cost will approximate \$10,000. As the gymnasium is for the benefit of the entire town and is the first of its kind it will be very popular.

Ironwood, Mich.

C. D. LUTHER.

About Mastication and Other Things

TO THE EDITOR:

When food is thoroughly masticated there is no need of swallowing, in fact there is nothing to swallow, for when food has been thoroughly acted upon, and changed, by the saliva, the food not only becomes tasteless, but is swallowed involuntarily and unnoticed; two rules given by advocates for thorough mastication being to chew as long as there is any taste to the substance, or to chew until it is swallowed involuntarily. That is, if we chewed everything as long as our sense of taste demanded, nothing would be passed on from the mouth until it had been "digested" by the saliva.

Now I think this also furnishes us with the key to the action of the stomach in passing along its food. The food is churned and acted upon by the gastric juice until some portion is wholly changed, when, as in involuntary swallowing, it is passed out through the lower opening of the stomach automatically. And so on, each portion as it is completely digested being "swallowed" and passed along. According to this, nothing is passed on from the stomach until it has been digested; this seems to show why some things indigestible, as cheese, or grease, or hot, heavy biscuits, or soggy pastry, will sometimes remain in the stomach for hours.

If this rule also applies through the rest of the digestive organs, viz.: that nothing passes along until the local juices have done their work, it will show why, in weakness or sickness of the digestive organs, or when eating indigestible foods, the contents of the intestines are retarded and moved along slower than the normal rate, thus causing the condition known as constipation.

Here is my recipe for pea beans baked with olive oil: Three pints pea beans; parboil as usual; put in bean pot and cover with water; add six tablespoonfuls of olive oil, two tablespoonfuls of molasses, one and one-half tablespoonfuls of salt. Bake eight to ten hours.

Try boiled rice with a dressing of olive oil; salt to taste. I find it far better than it is with milk and sugar, syrup, meat juices, or other things; and it is a more hygienic combination.

Concerning the use of salt in our foods: The theory seems to be true that no mineral substance can be used as nourishment by the body, but most ordinary foods in which it is used would be flat and tasteless without it. The best solution of the difficulty seems to be

that the most perfect diet yet devised, namely, the fruit and nut diet, with some cereals and green stuffs, all uncooked, does not require any salt at all to be palatable, so that salt would become an absent quantity, when we have brought our dietetic practice right up to date.

The digestive action of saliva has long been known, and pepsin has been given, or gum chewed, to increase the saliva's flow, but while these added saliva (or its active ingredient, pepsin), to the food in the stomach, they never gave the results that thorough mastication has.

The reason seems to be this: When the saliva reaches the stomach it is neutralized chemically by the hydrochloric acid in the gastric juice, so that it does not act on the food until after it reaches the intestines. We must take it for granted that our digestive organs were originally correctly designed, or evoked, and that to be digested properly the food must pass through certain specific changes, in a certain specific order. Now it looks evident that one could not expect the best results by introducing the food first to the bile, or by running it through backward, but that each of the digestive juices are intended to act on the food *after* it has passed through the previous stages.

That is, that the food should have been acted on and *changed* by the saliva *before* it is passed on into the stomach and not presented to the stomach in an unchanged form. And recent experiments seem to show that to do this completely and change all the cells in the food, it is necessary to masticate the food very thoroughly.

Wonalancet, N. H. CHARLES E. BURNS.

Save the Boys and Girls

TO THE EDITOR:

Last month the writer bought his first copy of *PHYSICAL CULTURE* and was so thoroughly impressed with the weight of its wonderful value, that the May edition was awaited with positive eagerness.

This communication is prompted by your editorial in the May number, relating to the repression and suppression through prudery of that knowledge of self so essential to the health of the human mind. The dissemination of literature bearing on the subject of sexual dangers, no doubt involves a grave responsibility, but such information properly placed must of necessity work an incalculable amount of good. In the article referred to, you utter truths at once patent and manifest to all who have trodden the highways of experience, but truths nevertheless so rarely discussed in print that their mere presentation in the garb of type almost excites curiosity. Your flashing of the spotlight on the blunting of the moral sensibilities wrought by indulgence in intoxicating drink; on the invariable though hidden relationship between the bawdy house and the saloon, doubtless invokes the fervent approbation of hundreds of your healthy-minded and truth-loving readers. But the burden of this correspondence was inspired by the half lost voice of the poor wretch

whose letter you published, when he feebly cried out against the obscene pictures, and the lewd theatres as part of the mechanism, which contributed to his pitiable condition. These agencies are diligently and studiously and constantly instilling into the veins of our choicest boyhood and girlhood their sure and deadly venom. At the same time our law-making forces, while reaching out to the most minute details of sanitation for the purpose of safeguarding the health of the body, permit the slimy gutters of obscenity and lewdness to reek in open rottenness anywhere and everywhere without as much as raising a hand.

Verily may it be said that in the matter of morals we are indeed in a most primitive state. Woe to him who for mere personal gain would strangle the soul and dim the eye and the intellect of the future men and women destined to carry the burden of the nation.

Give our boys and girls at least a fair chance! Why should we stand criminally idle and watch a pack of hell-hounds for money deliberately beset their paths with the traps and pitfalls of the obscene and the morally unclean, whether it be literature, "art," so-called, or the filthy play? While many a man has withstood the ravages of these furies through the period of adolescence, yet what a heart-tearing and soul-crushing struggle it has been up to the portals of a healthy manhood! And so, while we extend our charity and humanity to societies for the prevention of cruelty and atrocities to the lower animals, it would be well for us to recognize the great field for a grand work in which the State should be a most powerful ally of the church in reclaiming, safeguarding and upbuilding the mental structures of her boys and girls, her men and her women.

Such a work faithfully prosecuted would in a reasonable time show a very considerable reduction in the percentage of the inmates in our institutions for the feeble-minded and the insane, criminal records would reduce, and our standard of citizenship increase to a higher degree of efficiency.

May God preserve the voice that appeals for the care and protection of our boys and girls. Long life to a magazine which so strongly champions the hygiene of the mind as well as the physical development of the body.

HOWARD N. BLOUNT.

Information about Bananas

TO THE EDITOR:

In a recent issue of your magazine I note an article under the caption: "Some Information about Bananas as a Food," by W. J. Brand, M.D., and wish to call attention to the entirely erroneous statement that opens the second paragraph of said article and reads as follows:

"A banana that ripens to full maturity on the plant is no better to eat than those that are imported into the United States and England."

The fact is that the banana (or bunch), which ripens on the plant is not edible at all, and the writer is surprised to find such a statement purporting to come from one who has lived in the tropics. The fruit becomes, as the

writer states, "sour and somewhat woody, and will decay." No one who has ever lived in the tropics ever saw a native eat a banana ripened on the plant. In fact, the banana does not ripen properly, as it is commonly understood, by ripening on the bunch at a fruit stand, but "goes to seed," and very rapidly decays.

The writer lately sojourned in the heart of the banana district of Costa Rica, on a banana farm, and observed all the processes of banana culture and incidentally learned much about them by association with practical planters there.

There is one thing about bananas not generally known and it is, that we do not get—that is to say, they are not supplied to the market—the very largest bunches; what we do get and see everywhere are bunches classed as "9's," and before each shipment is made from their plantations, these "9's" are culled and selected by expert "inspectors." During each "cutting" many inferior bunches are found on sorting the bunches and also many "7's" and "8's," which are discarded and left to rot, in many instances. The nine-hand bunches is the standard-size bunches, with which we are all familiar, but many bunches even reach 10-12-13-14-15, and the writer has heard of 18, but never saw them.

Now the reason why we do not get larger sized bunches is due to the fact of the weight and bulk of the larger bunches, which makes their handling difficult, without bruising the fruit. Bruised or diseased fruit will not pass the inspector, and it is to the credit of the Fruit Company that their system of inspection is so rigidly and closely enforced, otherwise thousands of tons of apparently good fruit might be foisted upon a credulous public. It is really astounding to see the amount of rejected fruit incident upon a cutting and shipment.

A word upon the value of the banana as a food. The writer has lived nine years in the Philippine Islands, and Panama, having sojourned also several months in Costa Rica, Nicaragua and Cuba—natural habitats of the banana—and has the while been nourished by its luscious fruit, which in his humble estimation is easily first.

In the Philippine Islands a greater variety exists than in perhaps any other part of the world. The natives distinguish some eighty varieties or kinds on the Island of Luzon alone, of which the "Lacatan" and the "Gloria," are perhaps the best and also best-known.

The "Lacatan," unlike all other bananas, ripens green—that is never changes its color, and, is of all the most delicious, having a peculiar and distinctive flavor of its own, that no other approaches in delicacy and aroma. The method in vogue over there to mature banana asis to put them away in a dark, cool place covered up in some receptacle filled with rice and rice hulls.

The favorite way of eating bananas in the tropics, is sliced with cream or evaporated—a most delicious breakfast dish, served American style. Bananas are also a most appetizing dish served fried brown.

Another thing not generally known is that a plant produces only one bunch, which, as soon as the bunch matures sufficiently is cut down; in this way the bunch is secured.

The best bananas that come to our market are from Bocas del Toro, Panama, or the Shanginola district of Costa Rica and Bluefields, Nicaragua; the choice being very largely a matter of opinion and taste.

Port Eads, La.

GEO. GOODALE.

The Physical Culture Farming Colony

TO THE EDITOR:

There has been such wide-spread interest among readers of this magazine, in the suggestion of a physical culture *farming* colony, that it has become impossible for me to answer each inquiry individually. I have just returned from a trip through the southwest. The place that I am most interested in, is San Juan County, of Northwest New Mexico.

There can be no dry farming done here—it is all arid land and must be irrigated the same as California. The soil is a rich, red, sandy loam, the kind best suited to fruit. The enormous advantage in yield of arid land, artificially watered, over land in humid regions depending on natural rain fall, can be learned from proper government publications. The soil in this valley is the alluvial deposit of centuries.

The greater part of New Mexico, has been under cultivation from the time it was first irrigated by the pre-historic man to the present day. San Juan, was never cultivated until about thirty years ago. Regardless of the short time since the first farming was undertaken, orchards in the upper part of the valley near Durango, just across the line on the Colorado side, have been known to sell for as high as \$2,000 per acre. The soil will never wear out, as it is being constantly replenished with the deposits from the irrigation water—the deposits which originally made the soil. Land can be secured under the Carey Act, at about fifty cents an acre. There are a number of irrigation propositions under construction at present. The largest and probably the best is the Jay Turley ditch. This project is under the supervision of the United States Government. The price of a perpetual water right is nowhere to exceed \$35.00 per acre, and is paid for in installments, which makes it possible for the land to pay for it.

As for me, I intend to go there and invest in land as soon as possible, and raise fruit, vegetables and honey, and would like to have physical culturists locate around me. I believe we would all prosper, would be congenial and helpful to each other, and have the best chance to lead the real physical culture life. All those desirous of further information can secure it, also pamphlet on San Juan County, by writing to H. B. Herring, Secretary Bureau Irrigation, for Government Report of New Mexico, Albuquerque, New Mexico. This is all perfectly reliable, as it is issued by the Government. I have no financial interest in this place and am connected with no irrigation

enterprise. Let us have a physical culture farming colony.

MARK FISHER.

5346 Zealand avenue, St. Louis, Mo.

Baby Sleeps Out-of-doors Forty Degrees Below Zero

TO THE EDITOR:

I have been a reader and a firm believer in PHYSICAL CULTURE for some time, and I think it is a pure book. If every one would live up to your teachings, this would be a purer and better country.

I have one child, a baby twenty months old, who has never had a day's sickness in her life. She sleeps outdoors, rain, snow, or sunshine. It was forty-three below zero this winter. I put hot water bottles in her bed and she never had the slightest cold.

Before my child was born I walked every day sometimes seven or eight miles—never less than three. Everyone said I would surely hurt myself.

My baby was born without much trouble and is a picture of health and strength, thanks to your teachings.

I am not a fancy writer, but am sincere in what I write, and hope some day that there will be a copy of PHYSICAL CULTURE in every home. You can use this letter if you wish.

MRS. WM. SAMPSON.

Hedley, B. C., Canada.

A Protest against Vivisection

TO THE EDITOR:

Norman Brady has the courage to denounce the monstrous cruelties committed against dumb creatures in colleges and universities, and deserves honor for so doing. It is outrageous that dumb animals should be subjected to agonizing tortures and excruciating pain not merely for hours, but for days and sometimes weeks. If any particular good had been accomplished by vivisection we might perhaps condone the practice, but many authorities declare that during the one thousand years it has been practiced that no important fact has been forthcoming, as a result, that could not have been found out by other methods.

Dr. W. B. Hadwen, Dr. Geo. Wilson, of the British Medical Association, and Dr. Lawson Taitson, declare that they are prepared to condemn the indiscriminate maiming and slow torture of millions of animals with which bacteriological methods of research and experimentation have been inseparably associated and which do not demonstrate the saving of a single human life. The effect upon the character of those who practice vivisection must be hardening and degrading.

I agree with Mr. Brady, that voters should be aroused to stop this unwarranted and useless cruelty. A pledge for vigorous opposition against vivisection ought to be inaugurated, and colleges and universities should be obliged to discontinue the barbarous practice against animals, who cannot defend themselves.

DAVE COLVILLE.

Confession of a Drunkard

A GINGER FIEND, THE FINAL DEVELOPMENT
OF THE CAREER OF AN ALCOHOL SLAVE

By Wilbert Sheldon

NO. Rob not the woods of those tender shoots to bring to my bedside—insult Nature no more. The hand and brain of man conquers the world, but himself, never. The virgin beauties of Nature are shorn from their life's growth and brought here to gladden the heart of a dying man. But I care not for the beauties of the world, for have I not seen and felt the curses of mankind? Ha! Ha! Start not at my words. My time is limited and soon I shall be in the darkness of futurity, wandering about amidst the conscious deeds of my earthly career. But oh, man of holiness, if your words can give but one spark of hope, one illuminary ray in that other world, gladly will I confess my sins. But, what is the use—what is the use?

The ignorance of youth started me off. No paternal advice warned me against the pleasures of my worldly companions, and I soon became habitually imbued with the cravings of the downward path. Down, down I went, at first hiding my depravity from older eyes, but gradually, easily, my conduct became public and I laughed and jeered at the warnings; mocked the vehement scoldings of my parents, and went deeper and deeper into the toils of ruin. Women were added to the red rum, and between the two, my feet became mired within the sickening aftermath of the ending. All through my young manhood I traveled the path of sin, and after five and twenty years had passed, I was moneyless, friendless, homeless: my parents dead and all my boon companions gone—deserting me in my first real trouble. Nothing was left but the dives and hell-holes of this Christian city, this city of churches. So I joined to soulless throng and entered into the spirit of corruption that was protected and encouraged by the laws of a God-fearing country, and became a victim of an honorable, profit-making Christian gentleman's commodity—rum!

Ah, you know not the awful consequences that follow fast in the wake of a drunkard. During these last few mo-

ments of the ending my mind is clear and I can see clearly the terrible failure of myself; see the horrible experiences I have undergone. I had sufficient education to fit me for better things; good blood and rich, that exulted in physical endurance. But after those seconds of tipping fun came the hours of misery and desolation. The alcoholic stimulation of the imagination, perhaps, at times excelled the normal and the brain created wonderful, fanciful thoughts; witty and gentle sayings; musical and beautiful poetry. But after the wearing away of the reeling, soddening effect of the poisonous alcohol, I became imbued with a maudlin melancholy, then gay and boastful, cruel, egotistic and defiant, and in my defiance, I became disgustingly dogmatic and mercilessly atrocious; the ego of myself became exhausted, and finally, when the stimulation was gone, I became unsteady and sleepily fell into a drunken doze that was only broken by spasmodic and foolish utterances.

And then the cravings of a burning appetite became unconquerable and I resorted to anything to drive away that demon of the morning after. After a time my credit was gone and I had to take what was most easily obtainable. So I drank that cheap drink which takes effect sooner and lasts longer—Jamaica Ginger. Ah, that drink! that drink! How often I resorted to its power; how often has it quieted my jerking nerves and made me lie around listless and insensible to all things. But oh, fiend that it is, when with each little irritating suggestion the overwrought nerves cause a man to burst forth into a resentful, dangerous brute. And with each awakening, the passions arise and the strongest survives; and the strongest passion of man being the sexual one, he becomes a fiend of weakness, and terrible because of this weakness.

And when ginger was unobtainable, I drank anything. Shoe-polish became a luxury. Well I remember once when that was refused me. Snow was upon

the ground and the cold winds of December whistled around the corners; the piercing blast chilled me through and through, and I shambled from place to place, stopping all whom I met and whining for drink. Spurned by all, I at last entered a store and commenced drinking catsup. Bottle after bottle I consumed of the hot stuff before I was detected, and being unable to pay for those, I was marched away and cast into a cold, steel cell. With a metallic clang the door closed upon me and I heard the warden move away, the jingling of his keys becoming fainter and fainter, till all was still and I was alone with no chance for help, and the awful demon of thirst clutching me. What a night of horror that became!

I sat upon the iron cot and listened to the wind howling; gazed expectantly at the door where the faint glow of a swinging hall lamp cast fearful, dancing shadows. Presently these shadows appeared to be alive and assumed wonderful shapes. They worried me and I tried to examine them closer, when I felt something touch me and I sprang to my feet, crying: "Off demon! Off!" I scared the old devil and he jumped into the window, but my cries awakened the imps and they came bouncing through the cracks in the door. They stopped and moved back and forth, back and forth, till they joined together into one vast ball of darkness. It kept growing and growing, filling up the little cell till I was firmly pressed against the wall and gasping for breath. With my last breath I screamed. Then I screamed again, again and again, piercing the uttermost parts of the jail, but bursting that suffocating ball of blackness into jumping,

stinging hornets. These fluttered about till they dislodged the thing in the window and it fell with a thud, and I saw quivering arms whirling through space, reaching for me. I silently slipped over to the door to get away from the dreaded thing. But there, I heard a noise, and looking through a crack, I saw hordes of fiends with great, shining eyes of evil. These started a great babel of noises and began to mount the air, climbing to the sky. When they reached the sky, they put their shoulders to it and turned it over, releasing hordes of cold and crying winds that came rushing upon me and blew me into the arms of the monster in my cell. I closed with it and fought with insane ferocity; and as I fell to the ground, with the dying thing under me, I heard the door open and saw the black and white fiends coming in—the foremost carrying the moon, all covered with glass and shining brightly. I crouched in the corner and gazed wildly at them as they moved toward me. Then they stopped; and the one that carried the moon held it high and I saw it coming nearer and nearer, its brightness growing more and more intense, till I could have been swallowed up within its light and lost, but I sprang and clutched the burning glass, broke it in two, and with the ragged edges, I slashed and cut the fiends around me. But I was overpowered and crushed beneath their enormous weight; so crying with fear, I became unconscious.

My eyes grow dim and I can scarcely see; my voice is becoming husky and I can hardly speak, but before my mind becomes confused, I beg the reader to preach the message I have given and save this prudish world.

To Our Friends.

Our friends can greatly assist in extending the circle of PHYSICAL CULTURE magazine readers by doing missionary work among their local news dealers. If your newsdealer does not handle PHYSICAL CULTURE magazine, ask him to order at least a few copies, and display them conspicuously. They will be certain to excite attention, and he will find that they will constitute a source of new business for him.

PHYSICAL CULTURE magazine is fully returnable, and newsdealers assume no risk in ordering the full amount for their requirements. Unlike most periodicals, it sells well in midsummer when the demand for other publications suffers a marked decrease. Its readers, as a class, are consistent consumers of literature of every sort, and they are patrons of booksellers and newsdealers the country over.