

Farm Department

Devoted to the Interests of Those Engaged in Agricultural Pursuits. Conducted by J. M. Beaty

Agricultural Education.

Some time ago we promised to show the real facts as to the influence of agricultural education. The point at issue was whether agricultural education had a definite tendency to turn its possessor away from the farm.

Not a single farmer has ventured to go on record with an expressed belief that agricultural education injured any farmer. Not a single writer has cited a known case of any boy having been turned away from the farm, toward which he originally inclined, by the direct influence of any agricultural school.

Scores of letters have been received from men and women who affirm that they were either attracted to the farm or have been made better farmers by these institutions.

There can be no argument on this phase of the question. One point, however, demands brief consideration. It is claimed by some well meaning critics that the total number of college and school made farmers have made little numerical impression on the total aggregate of farmers.

There are two correct replies to this contention. First, the college bred farmer seldom claims superiority because of his college training. He resists his whole claim to recognition on his success as a farmer. Except among his intimate associates the school from which he came receives little recognition or credit for his position.

The facts are identical with other professional schools. The general public seldom knows anything of the training of the successful lawyer, physician or farmer. We could mention many leaders of agricultural organizations, state commissioners of agriculture, presidents of state agricultural societies, masters of State granges, Farmers' Union officers whose personal history prove this contention.

Second. The possible number of college-bred farmers is so small as to be put a mere insignificant numerical fraction of the total number of farmers of the country.

There are something like fifty agricultural schools and colleges with graduates. The average period of their activity has scarcely exceeded twenty-five years. Should each of them have educated 100 farmers per year—a number far in excess of their real possibilities—the total number of farmers thus trained could much exceed 100,000, out of some 15,000,000 farmers in the country.

Now let us turn to the actual record of achievement. The total number of farmers coming within the sphere of influence of agricultural colleges through short courses, extension work, institutes, and similar effort can only be surmised. The actual number of graduates is a matter of record, and therefore fairly accurate statistics are available.

Of the total number of graduates of these colleges over 60 per cent are actually engaged in some kind of agricultural pursuit. In some institutions the average is over 95 per cent, and the average percentage of farmer graduates is steadily on the increase.

The question is a national one, as these colleges are national in origin and largely so in support and management. We therefore cite the definite facts relating to a few of the better known, as illustrating the general condition.

The per cent of graduates engaged in agricultural occupations is as follows: Minnesota, 90; Wisconsin, 75; Cornell, 91; Michigan, 75; Massachusetts, 65; Mississippi, 65. Of the thousands of short and partial course men practically all are engaged in the work for which these courses were intended to fit them.

These facts should suffice to satisfy any one that these colleges are really and effectively fulfilling their mission of making trained farmers and a more intelligent agriculture. There is, however, another very important element in agricultural progress for which they are entitled to credit. Directly and also through the experiment stations, so closely identified with them, the colleges are responsible for nearly all that science has done for modern agriculture.

Every farmer who treats his grain for smut, who attempts to protect his crops from the chinch bug, who treats his seed potatoes for scab, who sprays his trees for any pest, who uses the Babcock test, who practices shallow cultivation for the conservation of soil water, who vaccinates against black leg, or sprays his fields for weeds, recognizes thereby the practical value of the agricultural college.

It adds wonderfully to the credit

due these institutions that a very large part of these great benefits to the farmer have been made possible by the work of men trained in these very institutions. These men may not be classed as practical farmers, but thousands of practical farmers owe their success to the training of institutions which placed the making of useful men above the mere making of farmers.—Southern Ruralist.

Cabbage and Beans.

More than one hundred varieties of cabbage are cultivated in the United States. It is much used as an article of food, supplying as it does about as inexpensive a sort of roughness as could be desired. The encyclopedia describes it as "a plant in general cultivation for culinary purposes and for feeding cattle." It can be eaten by humans cooked in various ways, raw as a salad, and salted and cured as kraut. Cows eat it freely when it is boiled with corn meal or wheat bran, and is served to them as a sort of Brunswick stew.

It is not unlawful to eat cabbage, although we do not see why any one should care to, and, besides, since the head of this plant has been selected for the purpose of unfriendly comparison in sundry cases; but the cabbage crop is a very large one and profitable withal. Three years ago one cabbage planter in the South cleared \$50,000 on his cabbage crop alone, and another man has made a fortune raising cabbage plants for sale to cabbage growers. We do not know the nutritive value of the cabbage; but we are sure that it is far below that of the bean, which grows in the Southern States in great perfection. String beans, or snaps as they are called, contain per cent: water, 89.2; protein, 2.3; fat, 0.3; carbohydrates, 7.4; mineral matter, 0.8; and its fuel value is placed at 195 calories the pound.

This is interesting, in a way, and the wonder is that the bean is not more generally eaten because of its nutritive value, as well as its cheapness and the ease with which it can be grown in this part of the country.—Richmond Times-Dispatch.

The Plutocratic Farmers.

"The best way to discover the advancing value of farm lands and the prosperous condition of the farmer is to revisit the scenes of your childhood and compare the situation as it was then and as it is now. The writer well remembers a plantation in the neighborhood where he was reared that was noted for its poverty. Its sand spots were white and glistening and the bottom patches were few and far between. It was notorious for its 'bumble bee' cotton and its frail and feeble corn. It now produces great crops and the weak places average up with the bottoms. Twenty-five years ago that place would have been considered dear at \$7,500; it sold last spring for \$37,000, and the buyer is chuckling over his bargain. Another plantation in that neighborhood more valuable than the one mentioned, was worth a quarter of a century ago \$12,000. The owner would not sell it today for \$60,000.

"The small farmer in the old days with a hundred acres of land and hardly able to make buckle and tongue meet, finds himself now worth \$10,000. This is the way things are going in that section and although property values have bounded forward more rapidly there than in most sections of the State, the progress in the value of farm lands everywhere has been steady and strong. Furthermore, the methods of farming have more than kept pace with the increasing value of property. The use of fertilizers is much more intelligent than formerly. Even the negroes have at their tongue's end the proper proportion of constituent elements in commercial fertilizers that are suited to certain soils and crops. This is not as it used to be, for guano was guano then, and the main thing was to get hold of it with no regard to its component parts.

"The danger before our farmers is the same thing that confronts our people everywhere, namely, automobiles. If they do not get into the habit of spending all their profits for speed, they are on the high road to wealth. We were glad to observe among our old neighbor, a disposition to harness up the mules and go to church in the good old way and we hope they will continue to do this, and ride only in the other fellow's automobile."—Charity and Children.

The Barnyard Manure.

The Minnesota Experiment Station says that manure can be hauled and scattered over some portion of the farm every month of the year to good advantage. It is much better to leave it on the land than in the barn yard or in piles near the farm buildings. The Station has found the manure spreader a wonderful help to lightening the work of unloading and obtaining an even distribution over the soil.—Indiana Farmer.

EXTERMINATING CATTLE TICKS.

A Pasture May be Freed of Ticks by Keeping All Stock Off of it from September 1 to July 1.

The month of August lends itself well to the eradication of cattle fever ticks where a pasture rotation plan is used. By vacating a pasture during this month and keeping it vacant until July 1 of next year it may be freed of ticks, and if no tick-infested animals are allowed to enter after July 1 the pasture will remain free. The United States Department of Agriculture advises farmers in the tick region to take advantage of this favorable time so far as practicable.

Pastures from which live stock is removed for a sufficient time become free of ticks by a process of starvation, as the ticks can not live to maturity if they are unable to get upon animals. The time required for all ticks to die after the stock has been removed from infested fields and pastures varies considerably, depending on climate, season, and weather conditions. Experience has shown, however, that the period from September 1 to July 1 is sufficient, and this appears to be the most convenient time.

The advantage of vacating a pasture for the period named is twofold. Not only is the pasture freed from ticks, but its disuse during that time will probably cause less inconvenience and expense than at any other season, and it will be benefited by the rest and will have a better growth of grass the following summer. In some sections where pastures are utilized throughout the winter, to vacate would probably necessitate feeding the stock, unless the farmer is situated so that he can keep his stock on one pasture while another pasture is kept vacant. But it is also true that beginning with September there will be a more abundant supply of rough feed about a farm which can be utilized. August is a most favorable month for making a start toward freeing premises of ticks by the method suggested.

The animals should of course be free of ticks when they are again turned on the pasture in July. Where the owner has a small number of cattle, greasing or spraying them with Beaumont crude petroleum is a good way to rid them of ticks. When the number of cattle is large or when a dipping vat is convenient it may be more practicable to dip them.

Full information as to how to get rid of the ticks, including directions for the preparation of dips and sprays, may be obtained free upon application to the Bureau of Animal Industry, Department of Agriculture, Washington, D. C.

If your liver is sluggish and out of tone, and you feel dull, bilious, constipated, take a dose of Chamberlain's Stomach and Liver Tablets tonight before retiring and you will feel all right in the morning. Sold by Hood Bros.

Education is Accumulated Experience.

Progress upon the farm depends upon experience. This is why I read the Ruralist and a half score of other agricultural papers. The reason I go over to my neighbor farmer and talk over his ideas is to get his experience.

Several years ago my parents decided to send me to some college. This they did I believe as a sort of duty, as my friends were all being sent to various schools away from home. I went and thought I would take up some other vocation besides farming, as I had never seen anything easy or inducing upon my father's farm. Nothing but a great deal of hard work.

I entered the agricultural college and decided to prepare myself for a school teacher. Occasionally I would go out upon the college farm with my student mates who were taking the agricultural course. I could see that they were enthused over the subjects of the farm. They would tell me how to prepare the soil, select seed, cultivate and harvest crops to the best advantage. I could see work that was being done with intelligent labor and good tools. We would return to our rooms and the next chance I would go out by myself. I would visit the live stock department, see the best breeds of stock of our country, talk to the keepers of the various breeds of hogs, sheep, cows, horses and fowls. I would visit the farm machinery, see the cream separator, corn and cob mill, corn husker and shredder, and a pea thresher that would thresh peas from the vines. I was especially carried away with this last machine, as picking peas upon my father's farm had been a great drudgery.

Finally I became restless trying to become a school teacher, gave up that course and selected the agricultural. I met instructors whose experience seemed to be unlimited. They would talk hours and hours up-

on facts, things they had done and seen themselves. I took a broader conception of farm life, kept aloof from society, read and studied almost night and day, because my time was limited and I was to pay back the money I spent.

I remained three years in college, then came home, drained my old home field, broke my land in the fall, planted legume crops, corn crops, got farm machinery, good breeds of live stock, worked hard, became interested, and in a few years was ahead of my friends who had stayed at home.

I knew a farm boy who was very strong. He was a good student and decided to study law; so he entered an agricultural college and took a literary course. In his fifth year he became devoted to agriculture. When school was out he was given a position in my district in charge of demonstration work. Last season the farmers who made crops under this student made an average of sixty-four dollars per acre above labor and expenses upon cotton. Upon corn a yield of fifty bushels above the average crop was made.

I could relate dozens of instances just as above. In all my observations I have never seen a case where good, prosperous farmers have been spoiled by agricultural education. Such education teaches the love of farming, it gets you interested in the work. With love and interest a person will go through a great many hardships and be more willing to sacrifice than otherwise.

I would say to both young and old, get experience, go to school, talk to others of your standing, learn all you can from observation, receive instruction from these agricultural professors. The best farmer is the one that has the most experience. All around me and everywhere I go is the cry, "Where can we get experienced men to run our farms?" Many advertisements are only "to those of experience."

This Southern country is demanding that good experience be given quickly. If we farmers did not demand agricultural colleges the government would not be building them by the hundreds. The editor of a paper tries to make his paper what the readers mostly desire.

Agricultural colleges make accumulated experience accessible. What would you think of a man who had never seen a mowing machine trying to invent one, when he could with but little money or credit buy a machine? It is bad economy to try to learn everything through your own experience when others are willing to give you instruction from theirs.—J. B. Jones, in Southern Ruralist.

Using Your Resources Well.

Readers of Home and Farm have seen much in the newspapers and magazines about the "conversation policy." It originated in connection with western forests. The movement is an effort to prevent the destruction of these forests, first by fire, and second by the unwise cutting of timber.

But there are other things to be "conserved" besides western forests. We waste our soil. We waste our seed and our labor. We waste our money. We waste our lives.

A broad conversation policy calls for the adoption of rules for the conduct of life which will make our labor more effective, which will enrich our soils through cultivation; which will develop our seed and live-stock through wise selection; which will secure labor-saving devices for the conservation of health and strength.

The farming community of the South has reached another season of harvest. Slowly the cotton is ripening for the hand of the picker. It is work that has to be done not by mechanical devices but by manual labor. Some day the inventor will come on and show how it can be done by machinery and how to harvest wheat.

But it is a dream and this inventor is manifestly a long way off. In the meantime the world is paying us more for cotton than it will pay when the cotton picker is at work in the fields.

The purpose of this article is to talk awhile to the Southern farmer about the uses to which he will put his income this year. We are assuming that after the harvest, after he has paid his hands and his store account, there will be something left for investment. We are urging upon him to invest this surplus, whether it is big or little, in farm implements, in household utensils, in those things that lighten labor and make labor more productive.—Home and Farm.

In buying a cough medicine, don't be afraid to get Chamberlain's Cough Remedy. There is no danger from it, and relief is sure to follow. Especially recommended for coughs, colds and whooping cough. Sold by Hood Bros.

The Gasoline Engine On the Farm.

We have had something to say to our readers about that labor-saving device, the gasoline engine. It will in time work a revolution not only in the cities but in the country. The modern automobile has as its motive power the gasoline engine. The new boats along our rivers and the yachts along the seashore are propelled by gasoline engines.

The contest between inventors now is between a storage battery for the use of electricity and the gasoline engine.

It is said that in the West owners of automobiles hitch their gasoline engines to the pump and to the feed cutter and in the South to small cotton gins.

But there are engines made especially for all these purposes—engines of small capacity, engines of large capacity.

With the growing difficulty of securing reliable labor, labor that is on the spot when needed, farmers will come to a more ready recognition of the value of the gasoline engine in the barn and at the house and in the field.

Have your son study mechanics enough to know all about this simple little motive power. It is easy for the young to master machinery of this character because they are simple, effective and inexpensive. Let him take up the study, write to advertisers, get all the information obtainable, calculate the cost and then the saving and put some of your profits of the year 1910 in a small gasoline engine to begin with. It is cheaper than horse power and far cheaper than hand power.—Home and Farm.

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Peanut growers and buyers alike declare the Benthall Peanut Picker the only absolutely satisfactory picker made.

Growers do the work of forty men with one machine, and more than double their profits. It picks Spanish or Virginia varieties with equal satisfaction. It picks while the vines are in a condition for saving, thus giving a crop as good as alfalfa. Buyers declare Benthall picked nuts cleaner and much more desirable than hand picked nuts.

Vines are fed to picker like grain to thresher. Nuts come out whole and clean. The stemming and cleaning capacity has been increased, and the weak parts in the 1909 models corrected. 13 ft. model run by horse or applied power; 16 ft. model applied power only.

All horsepower machines will have 1908 shoe or shaker, and we will build machines if desired with 1910 general construction and 1908 shoe or shaker.

Standard Peanut Co. buyers say: "It is a standing rule with our buyers to give preference to machine picked peanuts, as in our opinion they are far superior." W. F. Jones, grower, writes: "Threshed 173 sacks of Virginia nuts in one day. Can thresh 100 to 125 sacks Spanish." E. J. Railey: "I threshed 1609 bags with repair bill of only 75 cents."

Big money picking for your neighbors. Write for free booklet giving pictures and full information. It will mean much in profits for you.

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Free Liver Remedy

It is well to stop a physical ailment at the first signs of its approach, and that is especially true of liver trouble, which can eventually give rise to so many serious complications. Many have liver trouble and imagine it is indigestion, and hence take the wrong remedy.

When the liver does not store up sufficient gastric juices it becomes sluggish, and in this way disturbs the stomach and bowels, with which it is supposed to work in harmony. Then comes the sallow complexion, the pimply face, the dull pain in the forehead, the thinning of the blood, etc. A very quick and sensible way to stop the trouble, as well as to cure it is by the use of Dr. Caldwell's Syrup Pepsin, which contains ingredients especially intended to promote the activity of the liver.

Among the many thousands who have written the doctor about the results achieved with his remedy, and who are glad to make the facts public so that others can help themselves, are Mr. Jas. Kennedy, St. Louis, Mo.; Mrs. S. A. La Rue of Smith's Grove, Ky., and many others.

These, like thousands of others, started the use of Syrup Pepsin with a sample. If you will send your name and address you can also obtain a free trial bottle. This will prove to you that liver trouble is promptly cured with this remedy or money will be refunded. Having tried it you can then buy it in the regular way of your druggist at fifty cents and one dollar a bottle, and the latter is sufficient for an entire family.

This remedy is a vast improvement over cathartic tablets and salts, which only do good for the time being. Syrup Pepsin is permanent in its results, is pleasant to take and does not gripe. It is especially good for all those who cannot stand a violent purgative.

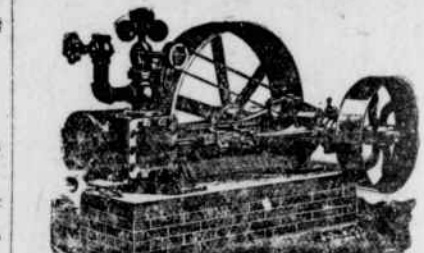
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