

INCUBATORS AND BROODERS FOR PROFITABLE CHICKEN RAISING.

Clemson College, S. C.—Recent by many letters have been received by the Poultry Division asking for information relative to the use of incubators and brooders in hatching and rearing chickens. The high cost of poultry foods and the great demand for fresh eggs and fries have convinced poultry raisers that it will pay to use a dependable system to obtain chicks this year.

The old sitting hen will not work when we want her to. She and her friends refuse to go broody in January and February, but they fill every available nest as soon as the weather turns warm and the time of hatching the best chickens is over.

"My hens would not sit early and I could not buy any early sitters," is heard every summer and fall by owners of little chickens.

Any one who likes poultry can operate an incubator successfully. It is necessary to turn the eggs morning and night and fill the lamp once a day. It is not necessary to examine a good machine more often than two or three times daily, when the above work can be done.

Every incubator is equipped with a thermostat to regulate the temperature.

The more popular types of kerosene lamp incubators are heated by hot air although there are some good styles heated by the circulation of hot water. The main advantage of the hot air machine is that of durability.

The past year has found the electric incubator springing rapidly to the front. This machine can now be obtained for use on any voltage. It is also made to be used with one of the home lighting systems found on many South Carolina farms. The cost of operating an electric incubator is no greater than that of a lamp machine. The temperature can be maintained at a uniform degree and the machine can be placed in any room of the house.

It is usually found that a profitable size incubator to buy is one with a capacity of about 240 eggs. The size containing from 120 to 150 eggs is also popular with poultrymen who do not desire to raise more than 200 or 300 chickens a year. However, a large incubator when only one-half filled will give as good hatching results as a smaller machine, so that a big machine gives you an opportunity to hatch eggs for others or hatch sufficient chicks to sell the surplus to your neighbors. The best size for an electric machine is about 150 eggs. Just now these machines are rather high in price owing to little competition but it is hoped that within a short time the price of the electric will be about the same as the lamp-heated incubator.

The better types of incubators are built with double walls with one inch or more of insulating material between the walls. This prevents the temperature of the egg chamber being affected vitally by changes in the outside temperature of the room. The cheap or incubators have simply a single wall or a double wall with a piece of pasteboard between. It does not pay to buy the cheaper incubators made in this way.

Some machines have a separate compartment below the eggs into which the chicks drop as soon as they are hatched. This is a convenience but it is of no special advantage.

The average number of chicks hatched from the eggs placed in an incubator is about one-half. When you buy an incubator it is well to order one or more portable brooders, allowing 50 chicks to each brooder. Most of the manufacturers rate the capacity of their brooders at about twice as many chicks as they will satisfactorily rear.

These portable brooders are about two feet in diameter and stand on three cast iron legs. The kerosene lamp is under one side and a wooden curtain surrounds the lower part of the brooder. The baby chicks peep under this wooden curtain and the heat of the lamp keeps the inside of the brooder at the required temperature of ninety to ninety-five degrees. It is a simple matter to raise in cold weather almost all the chickens in a brooder of this kind when it is placed in a bright room. Later on in the season when the days begin to get warm, the portable brooder is preferably put in a small wire front house.

An incubator and one or more brooders will enable any one to hatch chicks when he wants them. February and March are the two best hatching months of the spring season. Pullets hatched these months will commence to lay in the early fall and continue to lay during the winter. It is easy to keep a pullet laying during the cold weather but it is difficult to star a young pullet to laying until after the colder weather is past. Then the old hens which have completed their molt begin laying. This is why it is best to hatch pullets early and have them laying when the price of eggs is so high in the fall.

Extension Bulletin 16, "Poultry Culture for South Carolina," which is mailed free to any one by the Extension Service of Clemson College, contains full directions for operating incubators and brooders. The Poultry Division will be glad to tell any one where the best makes of incubators and brooders can be obtained.

LAND SETTLEMENTS IN SOUTH CAROLINA.

Clemson College.—Secretary Houston, of the Department of Agriculture, said in an address recently delivered to a conference of editors of agricultural journals: "It would be desirable to facilitate land settlement in more systematic fashion. This has been too long left to the haphazard intervention of private enterprise, and the Nation has suffered not a little from irresponsible private direction. I think it is high time for the Federal and State governments both as well as local communities, to seek to aid in land settlement by furnishing accurate, reliable information, and agricultural guidance to beginning farmers and to promote well-considered settlement plans. It is particularly vital that the process of acquiring ownership of farmers be encouraged and hastened."

These views are also shared by the Department of Labor and of the Interior. Secretary Lane has associated with him, some of the best engineers who have been connected with reclamation work of various kinds. The semi-arid lands of the West, the cut-over and swamp lands of the South are being visited, that proper measures may be taken as soon as possible to render them fit for the plow, and open them for settlement.

In these days of reconstruction when industry may be disorganized by the cancellation of Government contracts for its products, and by the demobilization of large bodies both of working men and soldiers, the land beckons to the man more insistently than ever before. It will certainly be made easier for the man who wishes to own a farm to get it on reasonable terms. And these measures cur a far worse evil. They provide the very best security against the discontent likely to arise from unemployment and a lack of food. The idle acre can give healthful and profitable employment to all who can be placed upon them; but home ownership must be the goal, and fair annual profits above a normal standard of living must be the means advanced to secure these settlers. Almost every man can find congenial employment at his home, if he owns it, or is coming the owner of it. A few acres will suffice to provide food supplies in large part, for the family, and a surplus for market. Organized methods of disposing of the surplus in any community will go far towards providing funds for the other necessities of life.

In South Carolina, there are about 19,500,000 acres. Two-thirds, or about 13,500,000 acres are in farms. One third of the State lies absolutely idle for agricultural purposes; it consists of roads, towns and cities, and worn out and swamp wood land. But of the 13,500,000 acres in farms, crops are grown on less than half. To be exact the crops of 1917 were grown on 6,198,000 acres. Probably at least as much more can be used for growing crops and for pastures, but as we say there yet remain only 2,000,000 acres in the State fit for farming. As 25 acres is the size of the average farm cultivated, there is room then for nearly 60,000 more farm families. What a vast amount of land settlement could be done in South Carolina; what untold wealth could be added to the property lists, if the local communities, as Secretary Houston suggests, should aid beginning farmers!

Federal and State aid in the settlement of large tracts is necessary, but nothing can be done anywhere unless the people who already own the land are willing to sell it at reasonable prices, and to welcome the new settlers.

We have perhaps the best all the year climate in the whole country, as is shown by the location of so many army camps in the South. We certainly have vacant land in great abundance. It is cheap only because of the sparsity of our population, and that

DOCTORS ABANDON HEADACHE TABLETS THAT DEPRESS HEART

Adopt Aspitone, the New Tablet in Which All Heart Depressing Qualities Are Counteracted by Heart Toning Agents

Physicians and druggists who have kept up with recent discoveries in medical science are now introducing to their patients and customers the new pain relieving tablet called Aspitone, which does not depress the heart and circulation. They explain that headaches and neuralgias as well as colds and grippe are usually attended by a fatigued heart and circulation and that it is dangerous at such times to use coal tar derivatives. In fact they are claiming that all the coal tar derivatives are positively dangerous, even to strong hearts. They say that many sudden deaths have resulted from taking them and that there is no longer any excuse for taking them except under the watchful care of a physician.

It is explained that Aspitone is not a coal tar derivative, but is composed of vegetable elements, which relieve the pain of headaches, neuralgia, toothache, rheumatism, colds, grippe, etc., at the same time supporting the heart. It is predicted that Aspitone will take the place of the coal tar derivatives. The product is new to this State, but may now be had at the Standard Drug Co. and at all leading drug stores in all communities.—Adv.

use of poor agricultural methods.

It is still comparatively cheap, and at prevailing prices, is in many parts of the State, an attractive investment. But there ought to be in every community, a committee of the Chamber of Commerce, or of the Farmers' Union, or of self-appointed citizens, or at the least, one or two men, whose business it is to find new settlers, to assist them in buying their farms and to make them feel at home among us.

It is not necessary to wait upon State or Federal movement. We can begin now by assisting those who have become tenants, and wish to become owners, to find good farms in our own neighborhood at reasonable prices. Certainly we can help these men to join a National Farm Loan Association, and so obtain half the purchase price of their farms at the most favorable rates. To have a share in multiplying the prosperous contented farm owners of any community is to render a very large service to the State and Nation, for upon them our civilization ultimately rests.

That large service every one of us may perform in some measure. A few of us will make some financial profit, by the settlement of our idle lands; but all of us will be increasingly enriched by the fuller, healthier country life consequent upon their settlement by farm-owners.—W. H. Mills, Professor of Rural Sociology.

Making Tin Plate in Australia.

The supplies of tin plate for Australia, the value of which amounts to over \$12,000,000 per year, are drawn from Great Britain and America; but recently the lack of shipping and other difficulties have led to a serious shortage in deliveries. A leading Australian producer of steel has accordingly arranged to establish tin-plate works which will eventually supply the whole of the antipodal demand. Plenty of tin is available in Australia as well as the necessary steel. The company in question, in addition to supplying steel for Australia, has sent considerable quantities of munitions steel to Great Britain and has also opened up trade with South Africa by supplying 20,000,000 tons of steel rails.—Scientific American.

Why Turks Are Confident.

Amid the many menacing perils that threaten his thorny throne the new sultan of Turkey can find consolation for all Moslem disasters by contemplating the "Shining Stone" in the mosque of St. Sophia. This is a slab of translucent marble, brought from Persia, which has been fixed to the western side of the gallery. It emits rays of dazzling brilliancy during periods of Turkish prosperity or of religious triumphs for Islam, but becomes black and opaque, however cloudless the skies, whenever some calamity is about to befall the Ottoman empire or the faith. It has not hitherto been darkened during the present war, though the sultan's armies have so frequently been defeated and the power of Islam seemed to suffer eclipse. Thus the mystic stone, ever shining, proves to believing Moslems that, however fate may frown, the real victory remains with them.

Also Saves Money.

Scott—How is it you never go away during your summer vacation? Mott—I don't need to. Most of the bores leave town and in their absence I have a nice, restful time.—Boston Evening Transcript.

SOLACE THAT NEVER FAILS

Best Antidote for Cares and Worries Found in the Solitude of the Wilderness.

What medicine in the quietude of nature! After a day of feverish struggle to make the discords of human endeavor harmonize with the soul's aspirations for tranquility and peace go into a bit of natural woods bordering a calm, shadow-tinted lake and in the twilight silence listen to the innumerable whisperings of the leaves. Stretch your weary body on the green sward and with an ear to the earth note the quick bursting of the roots of those tiny blades through the compressed ground. Catch the quick changes in light and shadow of the breeze-stirred branches overhead. High over the water a swallow darts and sails, emblem of faith, against a tender sky. The waters lap the shore with accents of pure joy. Cool, soft winds steal through your hair and caress your cheek like the fingers of dear companions gone before.

In such sweet solitude all cares and worries fall into forgetfulness and their places are filled with gentle thoughts and fond remembrances. The harsh sounds of the busy day no longer assail the ear with their disturbing sequence. Nature is the only actor in this lovely scene and all her movements are full of gentle grace, all her sounds accord, one with the other, making a pleasant chorus, a "concord of sweet sounds," that win your whole being to their melodious flow.

Here you become one with the expanding sky, the reflecting water, the calm trees, the playful grasses. Something liberal takes possession of your heart and brain and soul and a great kindness grows within. Humanity is softly transmuted into an essence of brotherhood. No longer is your sight material, your senses go. The eye of the mind beholds a universe of quiet cheer, peopled with lovers of truth. Nature has wrought a miracle. You are translated with all the hitherto distracted earth into a land of pure delight where no fault lies and all eyes look unclouded into other eyes that look and beam again.

The glory of that dreamed-of heaven lies in that little lonely nook beside the placid lake.

Shows Spirit of Allies.

Among the cheering anecdotes Elizabeth Shepley Sergeant reports, in an article on the French-American offensive, none raise more sanguine hopes of allied victory than this:

Somewhat over a month ago a French general encountered an American colonel of infantry below Chateau-Thierry.

"How long have your men been on

the march?" asked the general.

"Thirty-six hours."

"Then of course they are too tired to go on."

"Not at all—they'll go right in."

"Certainly we can stop them."

It was thus that an American infantry regiment and five batteries of artillery were thrown straight across the road from Metz to Paris. The Germans not only did not advance one step further along that road, they were immediately driven back by the Americans and their re-enforcements at Boursches, at Chateau-Thierry, at the Bois de Belleau.

That a proper field crop rotation will increase your farm productivity, and that your county agent will help you plan one?

That potatoes and other starch vegetables can save wheat if you use them in bread or instead of bread?

Notice to Debtors and Creditors.

All persons having claims against the estate of Furman A. Magill, deceased, will present the same, duly attested, within the time prescribed by law, to undersigned as administratrix and all persons indebted to the said estate will make immediate payment to the same.

MRS. LUELLE MAGILL, Administratrix.

Dec. 30, 1918. 21.

Health About Gone

Many thousands of women suffering from womanly trouble, have been benefited by the use of Cardui, the woman's tonic, according to letters we receive, similar to this one from Mrs. Z. V. Spell, of Hayne, N. C. "I could not stand on my feet, and just suffered terribly," she says. "As my suffering was so great, and he had tried other remedies, Dr. — had us get Cardui. . . I began improving, and it cured me. I know, and my doctor knows, what Cardui did for me, for my nerves and health were about gone."

TAKE CARDUI The Woman's Tonic

She writes further: "I am in splendid health. . . I can do my work. I feel I owe it to Cardui, for I was in dreadful condition." If you are nervous, run-down and weak, or suffer from headache, backache, etc., every month, try Cardui. Thousands of women praise this medicine for the good it has done them, and many physicians who have used Cardui successfully with their women patients, for years, endorse this medicine. Think what it means to be in splendid health, like Mrs. Spell. Give Cardui a trial.

All Druggists

J 72



A Doctor's Gift to The World

A Remedy to Overcome Catarrh and Catarrhal Conditions was Dr. Hartman's Legacy to the World of Suffering.

The Doctor early recognized the insidious nature of catarrh and consecrated his life to checking the ravages of the worst of all health destroyers.

PERUNA

The Greatest of All Catarrh Remedies

Catarrh first attacks the mucous linings in the nose, throat, lungs, stomach, bowels or any other part of the body. Unchecked it finally breaks down the tissues and chronic ailments develop which, if not fatal, are always difficult to cure.

Guard your health with Peruna. Don't wait until too late. Peruna is excellent for coughs, colds, effects of the grip and all catarrhal inflammation and congestion of the mucous linings. Many startling recoveries have been recorded.

TOOK IT FOR CHRONIC BRONCHITIS.

"I was troubled for four or five years. A few doses of Peruna would always bring relief. In the Spring of 1914, I began taking Peruna in earnest and used twelve bottles and have not had an attack in two years. I feel better and can do more work than in ten years."

Peruna also cured me of chronic Bronchitis and I recommend it as a splendid remedy."

MRS. A. J. NETKOWS, 3354 Tyler St., Minneapolis, Minn., N. E.

If you want health, insist upon having Dr. Hartman's World Famous Peruna Tonic.

IN LIQUID OR TABLET FORM.

Sold Everywhere.

Ask your Dealer for a Peruna Almanac

HAD CATARRH IN WORST FORM

"I had catarrh and was all run down. Many claimed it was consumption and I really thought so myself. I had a pain in my lungs and left side, no appetite, could not sleep, always weak and tired. My weight was 89 pounds."

I took fifteen bottles of Peruna and am entirely cured. I now weigh 135 pounds. Thanks to Peruna."

MRS. O. F. McBRIDE, Santa Fe, Ohio.

WRITE FOR THIS BOOK.

If sick and in doubt, write the Peruna Company, Dept. S 81, Columbus, Ohio, for Dr. Hartman's Health Book. It is free. Sent in a plain wrapper to any address.

DO IT TODAY

COLDS Head or chest—are best treated "externally"

Your Bodyguard

VICK'S VAPORUB

NEW PRICES—30c, 60c, \$1.20



LANCASTER & CHESTER RY. CO.

Schedule in Effect January 1, 1919 Eastern Time.

Westbound.

Lv. Lancaster. 7:00 a. m
Lv. Fort Lawn. 7:41 a. m
Lv. Bascomville. 8:00 a. m
Lv. Richburg. 8:12 a. m
Ar. Chester. 9:00 a. m

Eastbound.

Lv. Chester. 11:00 a. m
Lv. Richburg. 11:48 a. m
Lv. Bascomville. 12:00 m.
Lv. FortLawn. 12:20 p. m
Ar. Lancaster. 1:00 p. m

A. P. McLURE, General Manager.

Do You Get The News?

Dodge Automobiles

We are beginning to get regular shipments of Dodge Automobiles from the factory in limited numbers. Owing to the fact that shipments of cars will be limited for quite a while, we are taking this opportunity to ask you to place your order as early as possible to insure deliveries promptly. The new cars just received are extremely neat and fully up to the standard.

City Motor Co.

Rock Hill, S. C.

Agents for Dodge Cars in Lancaster County.

BE SURE YOUR NEXT CAR IS A

DODGE

RELIEVES COLD IN THE CHEST

You can't afford to trifle with a cold in the chest. It may lead to pneumonia, influenza, or other serious trouble.

MOTHER'S JOY

gives quick relief and prevents pneumonia. You just apply it to the throat and chest, and rub it in. It quickly penetrates to the seat of the inflammation and congestion disappearing in a moment.

Mother's Joy Salve is harmless and soothing, and can be applied to the tenderest baby skin without irritating effects. Thousands of users testify that it never fails to relieve congestion and croup.

Keeps jar on hand for emergencies. Doctors and nurses recommend it. Good dealers sell it. 25c. and 50c. jars.

Goose Grease Company Greensboro, N. C.

