

# LIVE STOCK & AGRICULTURE

## SAVE YOUR TREES

Life of Infected Chestnuts May Be Prolonged For Years.

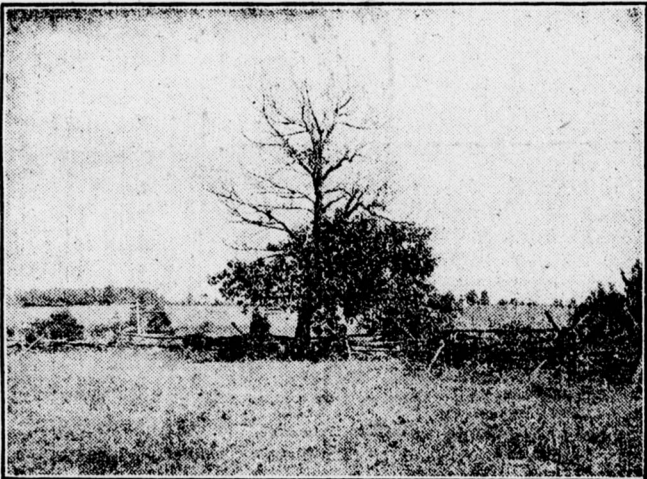
### DIRECTIONS FOR THE WORK.

Federal Department of Agriculture Recommends Cutting Out of Diseased Spots and Treatment With Coal Tar or Good Paint.

Where valuable ornamental, shade or orchard chestnut trees become infected in one or more spots with the chestnut bark disease that has been killing the trees in several states and is spreading rapidly the life and usefulness of such trees can be prolonged for several or for many years, depending largely upon the thoroughness with which the recommendations given in a bulletin issued by the United States department of agriculture for cutting out the diseased areas (lesions) are carried out.

The essentials for the work are a gouge, a mallet, a pruning knife, a pot of coal tar and a paint brush. In the case of a tall tree a ladder or rope or both may be necessary, but under no circumstances should tree climbers be used, as they cause wounds which are very favorable places for infection. Sometimes an ax, a saw and a long handled tree pruner are convenient auxiliary instruments, though practically all the cutting recommended can be done with a gouge with a cutting edge of one or one and one-half inches. All cutting instruments should be kept very sharp, so that a clean and smooth cut may be made at all times.

By cutting with the gouge into a diseased area a characteristically discolored and mottled middle and inner bark is revealed. All of this diseased bark should be carefully cut out for at least an inch beyond the discolored area if the size of the branch will allow it. This bark should be collected in a bag or basket and burned. If the cutting is likely to result in the removal of the bark for much more than half the circumference of the branch or trunk it will probably be better to



Photograph by United States department of agriculture. CHESTNUT TREE PARTLY KILLED BY BARK DISEASE. (Upper Branches Dead, Lower Living).

cut off the entire limb or to cut down the tree, as the case may be, unless there is some special reason for attempting to save the limb or tree. The fungus usually, though not always, develops most vigorously in the inner bark next to the wood. When this is the case not only all the diseased bark and an inch of healthy bark around it must be removed, but at least two or three annual layers of wood beneath the diseased bark must also be gouged out. Special care should be taken to avoid loosening the healthy bark at the edges of the cut out areas. Except in the early spring this is not difficult after a little experience in manipulating the gouge and mallet, provided the gouge is kept sharp.

Small branches which have become infected should be cut off, the cut being made well back of the disease—at least two or three inches, if possible.

All cut-out areas and all the cut ends of stubs should be carefully and completely painted with coal tar. A good grade of paint has been recommended by some authorities as superior to tar, but it is more expensive. If the tar is very thick the addition of a little creosote will improve it for antiseptic purposes as well as for ease in applying. If the first coat is thin a second one of fairly thick tar should be applied within a few weeks or months. Other coats should be applied later whenever it becomes necessary.

The entire tree should be carefully examined for diseased spots and every one thoroughly cut out and treated in the way already described. In case of suspicious looking spots a portion of the outer bark can be cut out with the sharp gouge as a test. If this cut shows the characteristically discolored bark the spot can be considered as diseased and cut out accordingly; if the cut shows healthy bark it need merely be treated with tar or paint, as other cuts are treated. In examining a tree for diseased spots it is always best to begin at the base of the trunk and work up, for if the trunk is girdled at the base it is useless to work anywhere on the tree.

When the spores of the fungus are present, especially in the form of

## "ANIMALS WITH GOLDEN HOOFS."

"When I was a boy," writes a correspondent of the Denver Field and Farm, "my father sent me to drive a large flock of sheep from the stockyards to a pasture. The sheep were hungry and we were unable to keep them off a field of fine fall wheat. The owner with his sons and dogs came running as he would have done were his house on fire and ordered us to 'Get those sheep out of his wheat!' After the first burst of wrath was over I explained we did not have bridles and lines on the sheep and that it had been impossible to keep them off; if he would help us we would get them off as soon as possible and that my father would settle for any damage done. We worked fast and hard and so did the sheep, eating as they went. The field looked as if it had been mowed its full length and for several rods back from the road. A few days after the owner of the wheat came to see father, claiming damages, which he agreed to pay. The amount, however, was to be determined at harvest time. Nothing further was heard about the matter for nearly a year. Then, instead of wanting payment, there came a frank acknowledgment that the best wheat was harvested from the land the sheep passed over, and the owner agreed to take some sheep, pasture them on his wheat fields and care for them free of cost."

threads or horns, they are readily washed down the branches and trunk by every rain and thus carried down to or toward the base of the tree. As a result the base of the tree, the crotches and other places which afford easy lodgment for the spores are particularly subject to infection.

Although spraying with any of the standard fungicides appears to have no effect whatever in stopping the progress of the disease after it has once started in the inner or middle

bark, there is little doubt that it is of use in preventing infection from spores washed down by rain from the upper part of a tree or from spores which have been transported from other trees. For this reason the spraying after each rain of the parts of a tree below a spore bearing lesion is recommended, but only on an experimental basis. If no spore bearing lesion occur in the tree there is less apparent reason for spraying. The scattering of slaked lime about the base of a tree and the whitewashing of the trunk and larger limbs have shown apparently beneficial results in preventing infections and perhaps also depredations of borers.

A tree which is being treated for individual infections must be carefully watched and the diseased spots promptly cut out as they appear. For this purpose each tree should be examined very carefully two or three times at least during the growing season.

**French Care of Stallions.**  
The Frenchman's method of working stallions makes the animals very obedient, which is due to three things. The Frenchman is very severe on his horses. He breaks them to work early, and he works them steadily. His horses are usually of a good disposition. When a team of several of these stallions is halted only the lead horse is tied, and all usually stand quietly.

**Forms of Nitrate to Use.**  
The best form of nitrate for orchard or vineyard is a cover crop of clover plowed under. If you feel that you must buy nitrogen I would suggest some preparation of barnyard manure and would add potash also. Nitrate of soda is all right to use now and then if your pocketbook will stand it.—Professor U. P. Hedrick, Experiment Station, Geneva, N. Y.

**Dry Seed Corn Won't Freeze.**  
If seed corn is thoroughly dry there is but little danger of the germ being destroyed by freezing. Corn for seed is easily dried out at storing time.

## THE CHRISTMAS TREE.

Inexpensive Decorations Which Will Look Artistic.

The cost of decorating a Christmas tree is largely a question of choice. Nothing makes so much show for the money invested as tinsel, and it should be used on the Christmas tree as extravagantly as the purse warrants. An inexpensive but exceptionally artistic decoration was worked by one mother to whom expense was a great consideration. It consisted of chains of cranberries and popcorn interwoven with gilt and silver tinsel. The red of the berries, the white of the corn and the glitter of the tinsel against the green of the tree were wonderfully pretty.

Another mother who had to evolve her decorations had only cotton batting and tinsel as her stock in hand. The tree was first flecked with bits of cotton, as if a snowstorm had passed that way, then sprinkled freely with epsom salt, which produces the same effect as diamond dust and costs next to nothing. Then yards and yards of tinsel were draped over and among the branches. The result of this simple decoration was charming. The base of the tree was banked with cotton.

Paper Christmas bells make effective and inexpensive decorations for a tree. If the children of the household are kindergartners their fingers can fashion the trimmings of tissue or gilt and silver paper. Apropos of the children lending a hand, it is a mistake upon the part of the mother, after the children are old enough to assist, to take upon herself the entire task of trimming the tree.

Then, too, it is really depriving the children of a great pleasure, for the fact that they had a hand in the matter will add rather than detract from their joy. Of course the gifts, the real surprise feature, if hung upon the tree, must be put in place after the children are off for the Land of Nod. The better plan is to arrange the gifts around the base of the tree, for if hung upon it the decorations will be more or less disturbed when detaching the gifts.

## RULES TO GET WEALTH.

Rothschild Said It Took More Wit to Hoard Than to Earn.

Rothschild commonly ascribed his early success in a great degree to the following rules:

"First.—I combined three profits. I made the manufacturer my customer and the one I bought of my customer—that is, I supplied the manufacturer with raw materials and dyes, on each of which I made a profit, and took his manufactured goods, which I sold at a profit, and thus combined three profits.

"Second.—Make a bargain at once. Be an offhand man.

"Third.—Never have anything to do with an unlucky man or place. I have seen many clever men who had not shoes to their feet. I never act with them. Their advice sounds very well, but fate is against them. They cannot get on themselves. How can they do me good?

"Fourth.—Be cautious and bold. It requires a great deal of boldness and a great deal of caution to make a great fortune, and when you have got it it requires ten times as much wit to keep it."

The last idea was one which Rothschild frequently expressed.—Life.

## SCRAMBLED PROVERBS.

Never look a gift horse on the bright side of things.

Early to bed and early to rise; vinegar never catches flies.

The whirligig of time makes the world go round.

A barking dog never makes two bites of a cherry.

Fools rush in while the iron is hot.

It is a poor rule that has no turning.—Chicago Tribune.

## Bits of Good Fun For Everybody

### Being More In Earnest.

The Rev. Sylvester Horne, the Liberal M. P. from London, was talking about religion at a dinner in New York.

"Too many of us in our religious observances," he said, "are like a little Tottenham court road girl.

"This little girl said one night to her new nurse:

"Oh, must I sleep in the dark?"

"Yes, miss," the nurse answered.

"Then wait a minute," said the little girl. "I'll get up and say my prayers more carefully."

### A Formidable Foe.

"Some o' dese reformers," said Uncle Rasberry, "makes me think of Rastus Pinkley's dog. I says to 'im, 'Rastus,' I says, 'is dat dog good foh rats?' An' he says, 'No; he's mighty bad foh rats.' 'Does he ketch 'em an' kill 'em?' 'No,' says Rastus; 'he don't ketch 'em nor he don't kill 'em. But if dey come foolin' aroun' him he'll mighty near skeer 'em to death.'—Washington Star.

### No Absentees.

"So you actually went to church last Sunday?"

"I really did."

"Excuse me if I seem skeptical. What was the text?"

"Aha, I have you there. The text was, 'He giveth his beloved sleep.'"

"Good word. And who was there?"

"All the beloved, it seemed to me."—Cleveland Plain Dealer.

## TWO YULETIDES.

Greek Catholic Church Still Celebrates Christmas Jan. 7.

### RUSSIA OBSERVES THAT DAY.

Only Great Nation That Clings to the Julian Calendar Made Up According to Time Measurement of Julius Caesar.

"Christmas comes but once a year," wrote somebody, and everybody accepted the statement as truth. It is not true, however, for Christmas comes twice a year. Those of us who reckon by the Gregorian calendar celebrate Dec. 25. Those who still adhere to the Julian calendar observe Jan. 7. Russia is the only great nation which still holds out for the Julian calendar. The Greek Catholic church sticks to the time measurement adopted by Julius Caesar forty-six years before the birth of Christ. Thus the Greeks and all the adherents of that church, including the Russians, of course, hold their Christmas on the 7th day of January.

In the city of New York both Christmas days are celebrated. New York city has a considerable population of Greeks, Russians, Armenians, Syrians, Servians, Poles, Bulgarians, Montenegrins and Vlachs, all of whom observe the Julian Christmas. For forty days prior to Jan. 7 they observe a fast, eating no meat, neither beast, fish nor fowl. They eat fish eggs or caviar, but draw the line there. Their principal diet for the forty days' fasting is made up of olives, beans, caviar bread and crackers.

But at 6 o'clock on the morning of Christmas day, Jan. 7, the Julianist fast is over. Julianist friends go to church early on their Christmas morning, but not too early. They eat breakfast first. High mass is celebrated in the Greek Orthodox church at 8 o'clock. The forty days' fast having ended two hours before, the Julianists are joyfully full of the good things of this world before they enter the house of worship. The chief viand, so far as its symbolic character goes, is a spiced loaf of rye bread covered and filled with walnuts, with a cross cut on top. This is called the christosoma—"bread of the Christ."

The Greeks, many of them arrayed in gorgeous new clothing, bring their feast to an end with the cups of Turkish coffee and the Turkish cigarettes, mixed in with songs and toasts. It is highly interesting for a plain American, with a plain name like Jim Jones, to sit in a cafe and hear the songs of the foreign gentlemen with seven jointed surnames, observe the satisfaction depicted in their countenances as the feast goes on and receive the impression that this is real Christmas cheer, though it be thirteen days late, according to our method of counting time.

### Regarding Color Blindness.

It is a curious fact that color blind persons are not often aware of their defect of vision. Even scientific men frequently fail to detect this defect in themselves.

The following is a favorite theory to account for the cause of color blindness: The eye is capable of four distinct color sensations—blue, yellow, red and green. These arise, however, from only two sources, each of which has a double action, producing the sensations of two complementary colors. One of the sources of sensation corresponds to blue and yellow, the other to red and green. Most color blind people are deficient in the latter source of sensation and can distinguish, therefore, only blue and yellow with their compounds, but sometimes the reverse is the case.—Harper's Weekly.

## CHRISTMAS IN SHETLAND.

Islands Have Curious Yuletide Customs.

The festival of Yule, as is well known, dates back to prehistoric times, when men worshiped nature rather than nature's God.

The inhabitants of the Shetland Isles are descended from Norsemen, who were zealous in religious belief, and "Yule" to them meant a season of great importance, says Madame. The "Gammel Norsk Hjul" signifies, literally, "wheel," and the festival so called was held in honor of the sun at the winter solstice wheeling round toward the equator. The return of the sun formed an important period of the year as being the beginning of renewed life in nature, which only could be revived by the light and warmth of the ascending orb.

The course of the sun was observed in all things as far as possible. Everything was turned from left to right. The boat was so turned on the water, the corn stacks so built in courses, the mill so turned in grinding and the wheel in spinning. In fact, everything went with the sun, even the round of the drinking horn.

Many superstitions included in nature worship had full scope at the "Hjul" time—or more modern "Yule"—when a vast multitude of "trows," or fairy folk, who at that season were not only active, but maliciously disposed, had to be propitiated.

To give the fairy folk no opportunity of playing tricks the fishing creel and lines were removed from the wall, the spinning wheel taken out of gear and its integral parts laid aside and everything suspended from ceiling or walls lifted down, as if left in their usual places the ubiquitous elves were supposed to set all going against the sun's motion, which of course would mean serious trouble. The time of Yule was and still is rigidly observed as "helly"—i. e., a time of rest from all manner of labor.

## MISFIT CHRISTMAS GIFTS.

Now the women go a-shopping Every week day without stopping. Buying thin gifts for the stout man and fat presents for the gaunt, And we reckon that's the reason Why at every Christmas season All the married men and single get the things they do not want.

When a man with whiskers frowns Gets a razor, then he's going To emit ejaculations that would not look well in print.

And if hand soap is presented He'll be sore and discontented, For his feelings will be harrowed By that most suggestive hint.

If a man has no desire For tobacco, then a briar Or a meerschaum for his Christmas would be sinful and absurd. You might just as well give blubber.

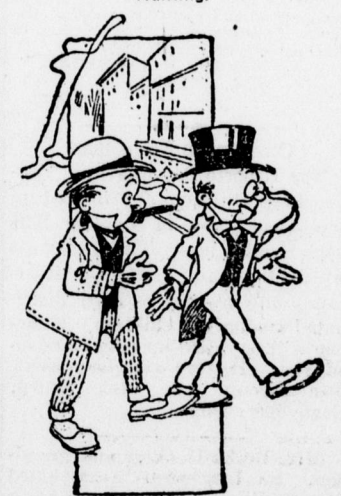
To a whale, for Yuletide grub or A bushel of canary seed to a chap who has no bird.

But it doesn't really matter If the women widely scatter All their tokens of affection on the men in manner rash, For the luxury of living Is enhanced by Christmas giving When the presents are not misfits that you can't exchange for cash. —New York World.

### Where Clay Is Food.

In the colony of Upper Senegal and Niger, near a place named Diekuy, exists an edible clay, of which the natives are very fond. It is found in a layer between strata of limestone, and a gallery has been driven into the earth for the extraction of the substance. It is not only eaten on the spot, but broken into pieces a few inches across, is sold to the inhabitants of the surrounding country over a radius of some twenty miles. It is said by French explorers that some natives consume several pounds of the strange food every day. A similar custom is found in the Sudan and in other parts of Africa.—Youth's Companion.

### Hunting.



Jones—My wife was hunting last week!

Smith—In the mountains for rabbits?

Jones—No; in the stores for Christmas bargains.

### Sonny Was Wise.

"You'll be late for supper, sonny," said a merchant in passing a small boy who was carrying a package.

"No, I won't," was the reply. "I've dot de meat."—Lippincott's.

### The Danger In Flattery.

The curtain had fallen on the performance of the amateur theatrical company, and compliments wise and otherwise were flying freely. The well meaning young man approached his hostess.

"You played the heroine's part magnificently, Mrs. Portleigh," he said gushingly as he bowed before her.

"You're too kind, Mr. Rasleigh," replied the good lady, who would never see forty again. "But I'm afraid you're only flattering. A young and pretty woman should really have taken the part."

"Ah, madam," he sighed, "with your skill you proved quite the contrary."—Philadelphia Ledger.

### A Lost Race.

"Oh, yes," Mrs. Smith told us, "my husband is an enthusiastic archaeologist. And I never knew it (9) yesterday. I found in his desk some queer looking tickets with the inscription, 'Mudhorse, 8 to 1.' And when I asked him what they were he explained to me that they were relics of a lost race. Isn't it interesting?"

### Black Diamonds.

"I want to provide for my grandson, but stocks may depreciate. How do I know what will be good a few years from now?"

"You might leave a few thousand tons of coal in trust," suggested the family lawyer.—Washington Herald.

## CHRISTMAS MINE.

By J. WILBUR TAIT.

This is a true story. It happened in 1805.

"It is now nearly Christmas, Brokaw, and I see no way for us to keep soul and body together till spring except to go into the mountains and cut wood."

"And freeze our fingers and our noses and our feet. We may as well starve to death."

"It won't be long. The spring 'll be along in a few months, and we can go to prospecting again."

"Prospecting? How many years have I been digging holes in the ground for nothing? I tell you, Trimmer, I'm through with prospecting, and as soon as I can get a regular job I'm going to take it."

"But you can't get a job just now, and we've nothing to eat. Come, cheer up. It's always darkest before day."

The two ragged, discouraged men climbed the mountains of Calaveras county, Cal. There was a chance of their making some thirty or forty dollars a month, on which they could easily live and buy some clothes, but it was a sad comedown from the roseate dreams with which they had begun to hunt for a fortune. They found an old abandoned miner's cabin, in which they made their home, a splitting place in which to live, for it was a perpetual reminder of another's failure. But they were not hunting for gold in this region. They were keeping themselves alive.

Every morning as soon as it was light the sound of their axes rang in the wood and continued till the early winter twilight came on. Cord after cord was stacked up, each cord representing days of hard labor. Meanwhile a snowstorm came down on them and covered the ground to a depth of two feet. The prediction as to frozen members was not verified.

"We've got such a pile of brush here from chopped off branches," said Trimmer to his partner one afternoon, "that we'd better get rid of it."

So they touched a flame to it, and it was soon roaring and crackling, sending out a pleasant heat. It melted the snow beneath it and left an area of hot ground.

"Here's a good chance for a roast," said Brokaw. "I'm going to make an oven in this hot earth, and we'll cook our deer meat, and as today is Christmas we will have a befitting meal if we never get another one."

So Brokaw began to dig a hole for the baking. At the depth of two feet he struck a bed of rock.

"Good!" he exclaimed. "It's hot stone and will keep its heat. Give me the meat."

The venison was brought in a baking pan, and Trimmer was about to place it in the hole when Brokaw stopped him.

"Hold on till I chip off a piece of the stone to see what it's like," he said.

"I thought you were through with prospecting," Trimmer remarked satirically.

"So I am. This isn't prospecting; it's only yielding to a habit. Any man who has been hunting in the earth as long as we have will want to see everything he takes out."

He broke off a bit of his oven bed, the venison was placed in the hole and covered over, and the two men listened to the welcome sound of its sizzling. Brokaw took the piece of rock into his cabin, where he lighted a candle, for it was now dark and the brush had burned to cinders. Trimmer was over the oven basting the venison and humming a little Christmas ditty when he heard his partner call.

"Come here, Trim."

Trimmer went to the cabin where Brokaw was holding the chipping of rock to the candle.

"What do you think of that?" asked Brokaw, his eyes standing out of his head as big as butter plates.

"What do I think of it? Why, great Scott, man; it's live rock!"

"That's what it is," replied Brokaw; "nothing more nor less—that is, if I know live rock when I see it, and I think I do."

"Shake!" shouted Trimmer. "We've struck it, and struck it big!"

It was a supper of another kind from roasted venison that the partners partook of—a probable realization of their vanished wild dreams. The meat was savory, but their minds were not on it. They were laying plans. Experience had taught them what to do. They would keep their secret. They would pre-empt their claim. They would learn the dip angle and the length and breadth of their newly discovered ledge.

Spring came, and the partners were still ostensibly cutting wood, while they were really gathering information. One day Brokaw went down into the valley, appeared at an assay office, handed in the chip of rock he had broken from the floor of his improvised oven and left it to have it assayed. He went back to the assayers the next day, got his report and started up the mountain. Trimmer saw him coming, but so cautious were the men in guarding their secret that he withheld inquiry till both were in the cabin and the door closed.

"Well?" he asked impatiently.

"Six hundred dollars to the ton."

"Rich, by thunder!"

Such is the story of the discovery of the famous Christmas mine. Before the next Christmas came around from the time when Henry Brokaw dug an oven in which to cook a haunch of venison for a Yuletide meal he and John L. Trimmer had more than realized their wildest dreams.