

PROPER SOILS-AND PREPARATION OF SEED BED FOR MORE AND BETTER OATS



DISK IS GOOD FOR PREPARING SOIL FOR OATS.

(Prepared by the United States Department of Agriculture.)

Oats in the United States is exceeded in acreage and value only by corn and wheat of the grain crops. The average area annually devoted to this crop in this country in the five years from 1912 to 1916, inclusive, was 39,459,000 acres. This is approximately three-eighths of the acreage devoted to corn, and three-fourths of the acreage devoted to wheat in the same years. The estimated average production of oats in these five years was 1,286,437,000 bushels, with an estimated farm value of \$521,436,000. But, notwithstanding this, less attention has been given to the production of oats than to any other important grain, so that yields often have been unsatisfactory and the crop sometimes unprofitable.

Best Soils for Oats.

In the production of oats proper climatic and cultural conditions are of more importance than the character or even the fertility of the soil. Owing to their greater water-holding capacity loam and clay soils usually produce better crops than sandy soils. Sandy land with plenty of plant food and a moderately stiff subsoil will grow good oats, but heavy, undrained clays are too wet and cold for the best growth of the crop. More water is required to produce a pound of dry matter in oats than in any other cereal; hence the necessity for growing this crop on land that naturally retains moisture or that is well filled with humus. On account of their liability to lodge, oats should not be grown on very rich soil or on low, undrained lands. Good drainage is essential also in the prevention of injury from plant diseases.

Fertilizers and Manures.

Though the crop is a vigorous feeder and will do better on poor soils than most other grain crops, the judicious use of fertilizers or manure is usually profitable. The fertilizer problem is made difficult, however, by the fact that on rich soil oats make a rank growth, which often results in lodging and in conditions favorable to rust and other diseases.

Unless the soil is very low in fertility the direct application of barnyard manure to the crop is seldom advisable. Much more satisfactory results usually can be obtained by applying the manure previous to growing some other crop in the rotation, such as corn. The oats then will get the benefit of a part of the manure and of the added humus in the soil, with less danger that a rank growth of straw will be made at the expense of grain production. On very poor soil a few loads of well-rotted manure may be applied some time previous to sowing oats. The manure should be spread as evenly as possible and should be well worked into the soil. The use of a small quantity of raw rock phosphate with the manure is usually advisable.

SIRE OF GREAT IMPORTANCE

High-Class Animal Neglected Because of Use of Grade Females—Worthy of Attention.

Probably the reason why the average farmer does not give more attention to the sire he uses is that he has only grade females, and he thinks that it does not pay to use a registered sire on such common stock. But if he would stop to figure just what he made or lost in dollars and cents with a good or poor sire, the importance of a high-class registered animal would be clearly seen.

Fish Meal for Poultry.

Fish meal is coming into favor as poultry food. If prepared from sound material and fed in moderation it does not affect the flavor of eggs.

Value of Kafir Crops.

Only 10 crops produce more total value than the kafirs in the United States in 1917. The kafir crops were worth more than 2½ times as much as the sugar beet crop.

Of the three most important plant-food elements, nitrogen, phosphorus, and potash, phosphorus is the one most often present in insufficient quantities for the best production of oats.

Preparation of the Seed Bed.

Less attention ordinarily is given to the preparation of the seed bed for oats than that for any other field crop. In the corn belt, where oats commonly follow corn, the seed is often sown broadcast without previous preparation of the land. It is then covered by disking and harrowing. Much better results are obtained, however, by disking the land before seeding, whether the seed is sown broadcast or is drilled. A good seed bed usually can not be prepared with fewer than two diskings and at least one harrowing. If the oats are to be sown on cornland on which the stalks are still standing, it is good practice to break the stalks before disking. This can be done readily, especially on a frosty morning, by dragging a heavy pole or iron rail broadside across the field. The stalks then can be cut with a disk harrow much better than if left standing. If the disks of the disk harrow are sharp, they will cut the stalks into short pieces, which soon decay. It is never advisable to rake and burn stalks and other trash on cornfields that are to be sown to oats unless the quantity is so great that it can not possibly be covered by disking. This humus-making material should not be destroyed but should be worked into the soil.

Oats always should be sown as early in the spring as the land can be worked, but the proper preparation should not be sacrificed to gain a little time in getting the seed into the ground. Oats do best when sown in a rather firm seed bed, with two to three inches of loose, mellow soil on the surface. This can be obtained best on corn-stalk land by breaking the stalks, double disking either by lapping half or cross disking, and thorough harrowing with a spike-tooth harrow. Lapping half with a disk harrow leaves the surface more nearly even than when the field is disked. The disks should be set to run three or four inches deep. After the seed bed is in good condition the seed should be sown and the field again harrowed.

The land seldom is plowed for oats that follow a cultivated crop. Spring plowing usually is not profitable, as there is little time to allow the sub-surface to become compact and the land is rarely in proper condition to plow before the oats should be sown.

Garden Often Neglected.

On some farms the garden is often a neglected or poorly cared-for spot largely because the work is being concentrated on the fields in preparing them for planting. This is a time when the garden needs attention.

GRAIN FOR FEEDING LAMBS

Oats Probably as Good as Corn Found for Young Animals—Used at Indiana Station.

Oats are probably as good grain as can be found for starting lambs on feed, and the Indiana experiment station makes a practice of teaching the lambs to eat by feeding them oats. There is quite a practice among sheep feeders of feeding oats throughout the entire feeding period.

TROUBLE WITH COLT'S FEET

Examine Frequently for Thrush and Keep Well Cleaned by Use of Ordinary Hoof Pick.

The colts kept in the barn should be frequently examined for thrush, and the feet well cleaned out with the hoof pick, after which a little strong disinfectant—and any of the coal-tar products are good—should be applied with a syringe or a brush. This will, with proper care, eliminate the trouble.

STATE NEWS IN BRIEF.

The snow at Crater Lake has melted very rapidly during the last week and teams can now get to headquarters camp, where it is only four feet deep, according to Assistant Superintendent H. E. Moynier.

While shooting squirrels near the Lakeview city limits Monday afternoon, Tommy Drinkwater, aged 15, son of Mr. and Mrs. T. H. Drinkwater, of Lakeview, accidentally shot and killed his brother, Willie, aged 10.

A spark from a donkey engine in the Miller logging camp, north of Toledo, Tuesday started a fire which destroyed a bunkhouse and endangered other buildings, machinery and near-by timber. The loggers, numbering 45, finally extinguished the flames.

The war has opened a new and important industry for Benton and Lincoln counties. This money-making industry consists of gathering and drying foxglove leaves, from which digitalis is extracted. There is a heavy demand for this product in the hospitals of Europe.

J. N. Williamson, of Prineville, purchased 3600 acres of land from the Ochoco irrigation district this week. The land surrounds the reservoir, and was secured from the people who sold their holdings within the submerged area. The deal included a lease on the submerged lands for a term of years.

Carey Stearns, son of Mr. and Mrs. S. S. Stearns, of Prineville, is home this week on a furlough from Camp Lewis, American Lake. He has just finished the officers' training course at American Lake and is awaiting orders. The names of the men receiving commissions will be announced about May 3.

Governor Withycombe has forwarded a communication to Senator McNary asking him to take up with the War department the question of extending to Oregon soldiers in camps either in or near their home state the right of voting at the primary election or at the general election, if they are still stationed in or near the state.

With the report that many American enlisted men from this state have already been returned to their homes from army camps suffering from tuberculosis or kindred diseases, Superintendent of Schools Churchill agreed to join with the home service department of the Red Cross in preparing to take care of such soldiers and their families.

William Sproule, president of the Southern Pacific, telegraphed to Governor Withycombe Tuesday that the company has agreed to purchase \$2,000,000 worth of liberty bonds, of which amount \$1,000,000 has been set aside for the credit of the states through which its Pacific System lines pass, and that of this amount \$75,000 is credited to Oregon.

Fremont Hodson, a graduate of the North Bend high school and medical student at the University of Oregon, who enlisted in the hospital corps shortly after the entrance of the United States in the war, and who has been attending the officers' training school at American Lake for several months, has passed the examinations with high honors and will report at Macon, Ga., for a commission.

The capital stock of the Chelsea Box company at Klamath Falls was increased from \$50,000 to \$100,000 at the annual meeting of the stockholders. This company, which was organized a year ago, has been so successful that it was found necessary to double the stock to keep pace with the growth in the business. The company has 2,000,000 feet of lumber in the yard and the plant is running with a full force.

Mr. Woodlawn, in behalf of the Armenian relief work, made an address at Madras Sunday afternoon, at the close of which a collection of \$260 was taken. On the same evening about \$150 was collected at Gateway.

Carl McClain, of Cleveland, O., has been elected superintendent of the municipal electric and water plants at Eugene, to succeed Charles W. Geller, whose resignation becomes effective June 1. Mr. McClain was graduated from the University of Oregon. He later attended Cornell University.

Mr. and Mrs. A. H. Grossong, of Mount Angel, married each other a third time in Salem Thursday. After their first marriage they were divorced. Six months' separation proved sufficient. They were remarried, but that marriage proved illegal, and the third time the tie is bound firmly.

The deep sea fishing is advancing in profitability for the several individuals and companies who are sending out boats to fish in the grounds between Marshfield and Cape Blanco on the south, and Heceta Head on the north. The halibut banks have commenced giving up their denizens earlier than usual, and several boats have brought in good catches of that variety, while ling cod and red and black snappers are seen in market almost daily.

9000 MORE ACRES IN

Additional Reserve Land in Yakima Valley is Sown With Grain, of Which Most is Wheat.

Yakima, Wash. — Nine thousand acres of new land have been put under cultivation on the Yakima Indian reservation this year, according to L. M. Holt, superintendent of the Indian reclamation service. This acreage is largely in grain, principally wheat. The estimated wheat planting on the reservation is 12,000 acres.

Superintendent Holt was obliged to discontinue development work on the canals until congress passes an appropriation bill. The bill as passed by the house carried \$500,000, but the senate cut this to \$250,000. A conference committee has the matter under consideration. Should the larger appropriation carry and the bill soon pass so as to allow early use of the money, the increase for the season of 1919 is estimated at 20,000 acres. The reservation has 60,000 acres under the Wapato project for which water is ready, but the canals are not yet dug.

TO BLOT OUT TEUTON TRADE

"Germany's Industrial Army on American Soil" to be Topic.

New York—Revelation of the government's plans "to divorce Germany permanently from American industry and commerce," will be made by A. Mitchell Palmer, custodian of alien enemy property, at a meeting here May 8, under the auspices of the National Security League.

Accepting the league's invitation to speak, Mr. Palmer wrote from Washington:

"I shall address myself to the subject, 'Germany's Industrial Army on American Soil.' It seems to me a good opportunity to disclose the result of my observation as alien property custodian, showing the strong industrial and commercial foothold which Germany obtained in this country before the war, and what we are now proposing to do, to divorce Germany permanently from American industry and commerce."

NORTHWEST MARKET REPORT

Wheat—Bulk basis for No. 1 grade: Hard white, \$2.05. Soft white, \$2.03. White club, \$2.01. Red Walla, \$1.98. No. 2 grade, 3c less; No. 3 grade, 6c less. Other grades handled by sample.

Flour—Patents, \$10 per barrel; whole wheat, \$9.60; graham, \$9.20; barley flour, \$14.50@15.00; rye flour, \$10.75@12.75; corn meal, white, \$6.50; yellow, \$6.25 per barrel.

Millfeed—Net mill prices, car lots: Bran, \$30.00 per ton; shorts, \$32; middlings, \$39; mixed cars and less than carloads, 50c more; rolled barley, \$75@76; rolled oats, \$73.

Corn—Whole, \$77 per ton; cracked, \$78.

Hay—Buying prices, delivered: Eastern Oregon timothy, \$29@30 per ton; valley timothy, \$25@26; alfalfa, \$24@24.50; valley grain hay, \$22; clover, \$19@20.00; straw, \$9.00@10.

Butter—Cubes, extras, 37½c; prime firsts, 37c; prints, extras, 42c; cartons, 1c extra; butterfat, No. 1, 41c delivered.

Eggs—Ranch, current receipts, 34c; candled, 35c; selects, 36c per dozen.

Poultry—Hens, 27c; broilers, 40c; ducks, 32c; geese, 20c; turkeys, live, 26@27c; dressed, 37c per pound.

Veal—Fancy, 18½@19c.

Pork—Fancy, 23@23½c per pound.

Sack Vegetables—Carrots, \$1.15 per sack; turnips, \$1.50; parsnips, \$1.25; beets, \$2.

Potatoes—Oregon Burbanks, 75c@ \$1 per hundred; new California, 10c per pound; sweet potatoes, 10c per pound.

Onions—Jobbing prices, 1@1½c per pound.

Cattle—May 2, 1918.
Med. to choice steers, \$14.00@15.00
Good to med. steers, 13.00@14.00
Com. to good steers, 11.00@12.00
Choice cows and heifers, 13.00@14.00
Com. to good cows and hf, 7.25@10.75
Canners, 5.00@7.00
Bulls, 7.00@12.00
Calves, 8.75@13.00
Stockers and feeders, 6.50@9.50

Hogs—
Prime mixed, \$17.65@17.75
Medium mixed, 17.25@17.50
Rough heavies, 16.25@16.50
Pigs, 15.00@16.00
Bulk, 17.65

Sheep—
Prime spring lambs, \$20.00
Heavy lambs, 16.50@18.00
Yearlings, 15.00@15.50
Wethers, 13.00@13.50
Ewes, 12.00@12.50



GOOD ROADS

DRAGGING IN EARLY SPRING
Easiest and Best Method of Road Maintenance After Road Has Been Properly Located.

Farmers don't realize the value of the drag. If it costs \$25 or \$50, and was pointed up, and somebody could make money by going around selling drags, it would be better. For the farmer would then think he must use it to get his money out of it. Its cheapness and simplicity work against it. In ten years' time, when we have had experience, we will find that the drag is the easiest and best method of road maintenance after the road has been properly located, graded, drained, and bridges and culverts put in. The drags in a township are worth many times as much as the expensive machinery, in the way of graders, which the township usually buys.

If you really want a good road this summer, don't forget the spring dragging. If you dragged your roads smooth last fall after the last rain, so that they froze up smooth, you have had good roads all winter. If not, you have smoothed them down by bumping over them, and then smoothed them only in the tracks, torturing your wife, your children and yourself simply because you would not follow our advice, says Wallace's Farmer.

There will always be trouble about getting the township trustees to drag



Useful Drag in Operation.

the roads at the proper time. Surely we shall soon reach a time when every farmer will take pride in seeing the road in front of his farm kept smooth and hard, whether he is paid for it or not. The best work we get done in this world, the work that counts for the most, is that which a man does for love of it, and because of his own self-respect, rather than for the money he may make. This is true of about everything we do. The best work is work that cannot be paid for in cash, but is the outward expression of the inward life of the man.

Let's get over the idea that we must do only what we are paid for doing, and that when we are paid for it, it is all right to do less work for the same money for the township or county than we would do for a neighbor or employer. Let's develop a loyalty to ourselves, to our farms, to the township, to the state, that will lead us to do things because they should be done, and not for the gain we get out of it, not primarily for the pay.

CONVICTS WILL MAKE ROADS

State of Missouri to Put 500 Prisoners to Work on Columbia-Jefferson City Highway.

Missouri will employ 500 of the 2,500 prisoners confined in institutions of that state at road work. Probably the first road to be so built will be the Columbia-Jefferson City highway, connecting the seat of the state university with the state capital. The state highway department will pay the state \$1.25 for each convict used, a compromise wage suggested by Governor Gardner. The state will feed, clothe, transport and guard the prisoners for this wage.

GOOD ROADS ARE NECESSARY

Without Them Farmer Is Not Going to Achieve Success He Is Justly Entitled To.

Good roads, better roads are everywhere needed, not luxuries to be enjoyed by the classes only, but necessary for the masses, and without them the progress that the farmer, particularly, is entitled to and is going to have, would never be his.