There Is Glorious Growth In Our Increasing Legume Crops

High Authority on Alfalfa Growing Talks Over Radio On Benefits and Practices

O. T. McWhorter, County Agent of Washington County, Gives Facts Concerning What Has Been Done in Boosting Grimm

O. T. McWhorter, county agricultural agent for Washington county, has taken a long lead in promoting the growing of Grimm alfalfa in the Willamette valley; conferring benefits of monumental proportions.

On Saturday, April 6, Mr. McWhorter gave a talk over KGW, of the Portland Oregonian, at the noon hour, his subject being "Alfalfa in Washington County, Oregon," excerpts from this broadcasted address being as follows:

Since 1922 almost 4500 acres of Grimm alfalfa have been planted in Washington county; greatly aiding dairying by supplying a dependable source of high quality legume hay in winter and green feed during the summer months, cutting dairy feed bills and making dairying a more profitable pursuit; alfalfa also being used as pasture by swine raisers and as green feed by poultrymen; and 12,000 to 15,000 tons of hay is now produced annually from the alfalfa fields.

How It Was Started

Sherman Hyre of Hillsboro, who planted his first trial plot of alfalfa in 1920, has perhaps done more than any other man in Washington county to demonstrate successful methods of alfalfa culture to that locality, and in 1923-24-25 many field meetings were held on his farm by the O. A. C. extension service; caravans some times came from adjoining counties, and individual callers were numerous.

Mr. Hyre selected deep, well drained soils, seeded Grimm alfalfa without a nurse crop on a thoroughly prepared and firm seed bed, and inoculated the seed with the nitrifying bacteria so necessary for the best alfalfa growth, and finally seeded the crop about corn planting time. Sandy soils may require earlier seeding.

Unsuccessful trials at alfalfa growing prior to 1920 had included seeding that crop with oats, wheat, barley; and inoculation was not practiced. Therefore success was so seldom that alfalfa culture as a countywide practice had made no headway previous to the demonstrations by Mr. Hyre.

Returns From Alfalfa

Alfalfa yields in the county vary from three and a half tons for three cuttings on the less favorable soils to as much as seven tons annually on the more fertile soils. Perhaps the average conservative yield per acre can be placed at about three and a half to four tons annually.

Ben Heesacker of Verboort community reports that in 1928 he cut two and a half tons an acre for the first crop, a ton and a half from the second and a ton from the third, all of which he sold at $20 a ton, making a gross income of $100 an acre.

L. W. Guild of the Farmington community reports that he saved his first crop for stock feed, and sold his second and third crops totaling three tons at $17 a ton, giving him $51 an acre gross for his second and third cuttings.

In Washington county, however, we are not so much concerned with the raising of alfalfa hay for sale as we are in raising it for cow feed. Dairying is the backbone of the county's permanent agriculture. It is argued that the profitable fruits and berries of the county will be raised on farms where dairying is practiced; that where barnyard manures are returned to the soils the highest yields of quality fruits and berries are obtained.

Important to All

Alfalfa is therefore of importance to practically all branches of Washington county agriculture; especially to the livestock industry and to those farmers who engage in fruit raising on dairy farms.

A few of the farmers of the county who are depending on alfalfa for dairy fed are: George Biersdorf & Sons, Cornelius; Jas. Batchelder, North Plains; Edw. Fruendenthal, Hillsboro; J. J. VanKleek, Beaverton, Rt. 3; W. T. Putnam & Sons, Hillsboro, Rt. 5; A. J. Evers, Verboort; Chas. Herb, Banks, Rt. 1; Montgomery Turner, Banks, Rt. 3; L. L. Crawford, Manning, and the list grows too long to continue.

R. Hornbeeker of Hillsboro, Rt. 5 is making use of alfalfa for hog raising on a larger scale than is usually practiced here; many other names could be added. Alex Chalmers of Forest Grove, Rt. 2 produces alfalfa to use in his feeding program with Shorthorn cattle. Henry Beach of North Plains raises alfalfa for sheep feeding, as do others of the county. Poultrymen of the county often allow poultry to run on growing alfalfa or cut it and place it in feed racks for poultry to feed upon.

Soils for Alfalfa

Deep soils having excellent natural drainage are the ones recommended for alfalfa. Tile drained lands and those having the water tabl close to the surface are not so good, nor are those with a more or less impervious subsoil. On poorly drained soils or those with a more or less impervious subsoil the result is most often failure, involving loss of time and money. Be sure the soil is right before planting alfalfa. Your county agent, successful growers, or O. A. C. experts can give proper advice.

Lands of a sandy nature are ideal alfalfa soils if drained deeply through natural processes. The crop thrives on practically all Washington county soils where the drainage is correct.

Lime and Manure

Alfalfa is a gross feeder and cannot thrive on poor or worn out soils; but soils that have run down in fertility have produced fair returns of alfalfa per acre, where lime or barnyard manure has ben used. "Lime or barnyard manure or both are seemingly essential for the best results with alfalfa." However, there are several successful fields of alfalfa in the county which have had only barnyard manure. It is advised to use ground limerock at rates of not less than 2,000 pounds per acre. This is the safer procedure to follow. Since last fall some 10 to 12 carloads of lime have been shipped into Washington county to use with alfalfa plantings.

About limerock, do not go by the rule of guess. Ask the county agent, or inquire of the college. Ground limerock is supplied at your own state lime plant at Salem.

Preparation of Soils

Preferably, plow in the fall land to be seeded the following spring. Work lightly in the spring till about corn planting time, when most alfalfa is seeded. This constant shalow cultivation destroys the weeds, conserves the moisture, and prepares a firm seed bed with about two inches of loose soil on top.

Do not work soil too deeply, losing moisture. It is important to hold the moisture over the whole field by frequent shallow cultivation.

Can one plow the land in the spring and then seed alfalfa? It has been done in Washington county but far too many who have tried it have lost so much of the soil moisture that poor stands or failures have resulted. The general trouble with spring plowing is that one waits until the ground is too dry before plowing, or the plowed land is let lay and dry out after plowing.

Methods of Seeding

General recommendation, 12 to 14 pounds of seed per acre broadcasted; rule of O. A. C. experts.

In Washington county, farmers usualy run over the prepared soil with a cultipacker; leaving the soil in tiny ridges. If this is followed with the seeding process immediately, before the small crevices left by the cultipacker fill with soil, the seed mostly falls in these small crevices on firm dirt. Then follow with a spike toothed harrow with the teeth slanted back and cutting just enough to level the soil and fill the crevices; covering the seed to proper depth and leaving the greater part of the seed in rows and on firm soil. Deep harrowing to cover should be avoided.

When drilling the seed eight pounds of good seed is often enough. The difficulty with most drills is that they seed too deeply at times, too shallow at other times, and that some drill holes drop the seed too thickly or become clogged. Most drills seeding eight pounds per acre do a poor job, and uneven stands result. For small plots, the garden drill does splendid work; the rows are usually seven or eight inches apart.

Grimm Variety Only

Grimm alfalfa, with its branching tap root, is the recognized variety for Washington county. Varieties with the single deep, penetrating tap root have not proven very successful.

Buy from reliable dealers; get certified or registered Grimm seed. Inoculate by the soil method or the use of artificial cultures. Sowing without inoculation is a waste of time and money in most cases. The O. A. C. station or seed houses have inoculated cultures. Use according to directions on the package.

Inoculation is sometimmes practiced by spreading about 300 pounds of soil per acre from an already inoculated field.

A common method in Washington is the use of the O. A. C. cultures according to direction, to which is added about a cupful of sifted soil from about old alfalfa plants which have been inoculated. This doubly insures inoculation.

Care of the Fields

Following cutting of the first crop in the second year of the life of an alfalfa field, the field should be cultivated with an alfalfa cultivator or a spring toothed harrow. We do not use disc harrows in Washington county; the discs are liable to injure the alfalfa crowns. Do not cut the soil too deeply; the object being to loosen the top two inches of soil, kill the weeds, and conserve moisture.

Alfalfa should in fact be cultivated after each cutting. Sherman Hyre at Hillsboro follows this practice after each cutting of hay, and one field now eight years old seems to be about in its prime.

Neglect of cultivation will show up in decreasing yields, weeds and grass choking out the alfalfa. Uncultivated fields often become unproductive or are ruined in two or three years.

The O. A. C. recommends land plaster at 80 to 100 pounds an acre annualy on producing fields. In Washington county a few farmers are trying superphosphate at rates of 250 pounds per acre applied in the fall; applied every three years.

UMPQUA VALLEY IS GROWING ALFALFA

New Crop is Rendering the Dairying Industry There Profitable Line

The Roseburg Review of the 10th, under heading, "Dairy Men Prosper," has the following as its leading editorial:

Says a correspondent in writing to the News-Review and talking of the dairying industry:

"I am convinced, after having tried it out, that dairying will pay as well, and in most instances better, than any other phase of farming on our soils on which alfalfa can be grown. My reasons are twofold: The income is steady and sure; the soil is growing more fertile rather than being depleted.

"The writer quoted above knows what he is talking about. The dairymen in Douglas county are reasonably prsoperous and there is no reason why more dairy herds could not be equally so. The great number of different kinds of farming that are possible because of the soil and climate conditions here is one of the principal reasons why the Umpqua valley is destined to be a very great agricultural district."

FOUR FOLD GOOD FROM THE LEGUMES

The legumes are better than the four leaf clover for luck; they bring four fold benefits to the growers—with a lot of side incidentals of advantage to boot, for good measure.

J. R. Beck, county agent for Polk county gives these four: First, they are soil builders; second, they make hay and silage; third, green pastures; fourth, cash seed crops.

Mr. Beck mentions another function of legume feeds; says veterinarians have the opinion that such crops grown on well limed soils aid in preventing the development of sterility in dairy cattle. If this is the case the production of clover, alfalfa and vetch on soils that have been treated with limerock will assume added importance.

Governor Patterson Grows Alfalfa, and is Planning on Large Increase of Acreage

Polk County Legumes, Clover and Alfalfa, Reach High Acreage Levels, with 125 Farmers Now Having Fields of Latter

The following article is furnished for this annual Slogan number on Legumes by J. R. Beck, Dallas, efficient county agent of Polk county:

Dark green fields of clover and alfalfa dot the landscape wherever one may drive in Polk county, and the observer will quickly realize that the acreages of these two legumes are greater than for years and probably exceeds previous totals. Clover seed prices consistently above 20c and the great feed producing characteristics of alfalfa are the two factors that have stimulated these acreage increases.

Just how many thousand acres of clover there are in the county no one can say, but we are fairly sure that the acreage of alfalfa has grown from less than a hundred in 1926 to nearly a thousand, and the present rate of increase is around 50 per cent annually.

Three Great Benefits

Clover hay feeds many of the fine Jersey cattle of Polk county, and then the owners thresh a seed crop off of the acreage from which the hay was taken and have a mighty lucrative cash crop. Then the third consideration, that of soil fertility, is constantly in the back of their minds and perhaps has a greater value than the other two crops that can be accurately measured.

A. R. Cadle of Rickreall is one of the Polk county farmers who considers the clover item in his rotation indispensable; then Frank Farmer feels that it is vital to him for his sheep. Others equally successful second these arguments and add others of their own.

The removing of clover from the possible crops for Polk county farms would be a serious blow, and the writer certainly hopes it will never occur.

Would Make Great Story

If Grimm alfalfa could take on the attributes of man then its rise into prominence would read like a story from Horatio Alger. Considered impractical as a crop in western Oregon up to six or seven years ago, it is sweeping on to greater acreages in all of the valley counties each year, and Polk farmers are certainly grasping the possibilities presented to them through this crop in a positive way.

Yields of three to seven tons per acre are found on almost every planting, and these plantings run all the way from one acre to 35 acres. W. O. Morrow of Greenwood doubled the yields on one of his fields through irrigation, weighing in over seven tons in one season. Robert Pence of Rickreall has averaged nearly five tons per acre on a seven acre field for the past three years without irrigation.

Zielesch farm at Parker has the largest planting in the county with 40 acres in and 20 odd more going in this spring. One of the interesting things about these alfalfa plantings is that nearly every farmer is planting more, once he has tried it out, and there can be no stronger testimonial than that.

Governor Grows Alfalfa

Uses for alfalfa are varied. Governor I. L. Patterson has been using his for hog pasture, but is planning on a much enlarged acreage for other purposes. Byrd Walling of Lincoln pastures sheep on his in the spring, then cuts a hay crop. Wm. Garner of Smithfield uses his for poultry pasture, and so it goes.

Over here in Polk county we say that any farmer that has livestock should try out his best soil with alfalfa, and we feel that at least 600 farms should and can grow it. Already 125 are growing it successfully.

To list the growers of alfalfa in Polk would sound about like 125 of the successful farmers of the county, for you will find most of it growing on such places. On the other hand, some of the very best farmers are skeptical. Last week while talking with a certain prominent and wide awake farmer, I asked him how it happened that he hadn't put out an acreage of this legume, and he replied that some 15 or 20 years ago a neighbor of his had tried it and about the second year the weeks took it.

Alfalfa Tour in June

This same man has been driving past fields, that I have mentioned above, for the past five years and has seen them continue to thrive and produce large crops, but the prejudice of earlier impressions is hard to overcome in some. Once he is convinced, I am willing to bet that when he starts a field he will do the job right up right and not put it off on some poor piece of improperly drained ground and then go off and let it root, hog, or die. Some of those who jumped into the planting of this crop did it without proper planning, and they have given themselves and neighbors the wrong impression.

Largess in Lead in Legumes

THERE is largess in the lead the Salem district is increasing and has been maintaining in legumes—

Millions annually in our growing seed business; a wealth of advantages in keeping up soil fertility; other millions in the value of the hay and soilage and silo crops for live stock and poultry.

Two thousand new acres in Grimm alfalfa fields this year within a radius of 15 miles of Salem; the increased and increasing acreage in Austrian peas; several hundred acres more in ladino clover for the present season, and other expansions in leguminous crops here—

These all show the increasingly acquired notions in the "noodles" of our leading farmers concerning the advantages of the nodules that mark the distinguishing feature of the crops that get the nitrates from the air and deposit them in the ground to restore and keep up its fertility.

There is no better illustration of the trend of progress here towards the time that is coming when the Willamette valley will be the richest section of the earth, and the most uniformly prosperous—and one of the most populous; with a population drawing for its support from all the corners of the earth.

Legumes make up the foundation crops of a persistently prosperous agriculture; and all these steps are sure advances of prosperity for Salem and her environs and hinterland areas calculated to keep her going and growing gloriously.

MILLIONS OUT OF LEGUMES ANNUALLY

Salem District Leading Several Lines in This Benefcial Field

The boom in legumes goes on in the Salem district. H. O. White of D. A. White & Sons, leading seedmen and dealers in and shippers of seed supplies, estimates that there will be an addition this year of 2000 acres in the plantings of alfalfa within a radius of 15 miles of Salem. That makes a remarkable growth.

Nearly all the vetch seed in America is grown in the Salem district. There will be 100 cars or more for shipment this year.

In red clover, the acreage will be about the same this year as last. There will likely be above 100 cars of seed for shipment this year, as the price is firm. It is around 25 cents a pound to the grower; has been higher part of the time last year, and lower some of the time. The red clover crop for the district this year will bring around three quarters of a million dollars.

Many Legumes

Our growers produce many legume crops. We send hairy vetch seed as far away as New York, Baltimore and Philadelphia.

We grow all the white clovers; Alsike, Sweet, White Dutch, Bokhara Hubam, but have not been able to work up a boom in this, as there is in some eastern districts.

Our Hungarian vetch boom keeps up. We grow Canada field peas; mostly for "hogging off."

An addition to the ladrino clover acreage, to the extent of 100 acres, has been or will be added the present season. The seed is now growing scare.

We grow some soy beans; about the same acreage this year as last.

A good deal of purple vetch is grown here on contract; a seed for a cover crop for the California trade.

The Australian Pea

Australian peas, making a good feed and cover crop, something new here, is coming in strong. So far, it is being grown for seed purposes, to ship. D. A. White & Sons are seeking contracts for growing 300 to 500 acres of it, this year—the extent of the seed that is available now. The contracts are going out mostly around Salem and Albany.

They expect to have grown and to assemble enough seed this year to entend the acreage indefinitely here next year. The Australian pea looks like a winner.

Our legume industries in the Salem district are running into the millions. Our leadership in vetch and several other lines is pronounced. Legumes are going a long way towards redeeming and insuring the steady prosperity of our industries on the land.

Oregon has not gained sufficient population in the last 10 years to warrant the formation of a congressional district in Southern Oregon, and it is just as well as there would be nobody to run for the job. — Medford Mail-Tribune.

Over Half a Million Acres In Willamette Valley May Grow Good Grimm Alfalfa

Increasing Now at Rate of Five to Seven Thousand Acres a Year; Lime, Landplaster, Great Contributing Factors In Alfalfa Boom

Alfalfa is gaining in importance as a crop in western Oregon, according to G. R. Hyslop, agronomist at the experiment station. Estimates indicate that the acreage is increasing by from five to seven thousand acres a year. The reason for this sudden expansion in the acreage is based on a number of years of very carefully worked out experimental data and an organized extension program in several counties which has shown farmers the success of the crop.

Twenty, and even ten years ago, there was not sufficient data to warrant very general recommendation for alfalfa out side the sandy bottoms in western Oregon. Conditions are different now, insofar as alfalfa and its culture are concerned, and the conditions of competition with other crops have also materially changed.

John C. Burtner of the department of industrial journalism, Oregon State Agricultural college furnishes the following for this annual Legumes Slogan number of The Statesman:

It is no longer so easy to get stands of red clover on many of the soils that were successfully producing red clover a few years ago. One reason for this condition is that some of the soils have become rather acid, and another is the presence of the clover root borer, an insect that is seriously destructive to long-lived stands and good yields of red clover.

Clover Less Competetive

With less competition from the clover on many of the better lands, therefore, alfalfa with its large yields, fine feed quality and the production of considerable green feed, hay or pasture growth during the dry part of the summer, has become very attractive to a number of farmers, says Professor Hyslop.

Grimm Alfalfa Standard

The introduction of Grimm alfalfa is one of the outstanding factors in the increased alfalfa production. This variety, which in trials has shown its persistence and its ability to maintain production through a long period of years, is now pretty generally standard in western Oregon. It is usually more successful than most other kinds of alfalfa that have been planted and which frequently get thin or kill out in the course of three or four years.

Another very important change in conditions is the development of the state lime plant, which is producing agricultural lime at a cost within the reach of a large number of prospective alfalfa growers. With this cheaper lime available, it is now feasible in a great many places to lime the land and grow alfalfa where is was formerly not much of a success.

A third important factor in the increase of the alfalfa acreage is the study of the effects of landplaster on the growth of alfalfa on some soils. Another contributing feature is the supply of high class inoculation material provided by the department of bacteriology of the experiment station, which makes cheap and efficient inoculation possible.

"The long-lived, hardy, disease-resistant Grimm alfalfa, cheap state lime, cheap applications of landplaster or other sulphur carrying agents, and inoculation have contributed much toward making western Oregon farmers alfalfa-minded," says Professor Hyslop.

Passed Demonstration Stage

The extension program which has been carried out so thoroughly by County Agent McWhorter in cooperation with seed dealers in Clatsop county, and by County Agent Fletcher in cooperation with the Eugene Cooperative creamery of Lane county are examples of very important county-wide attempts at the development of more alfalfa. These and other county agents have discussed the alfalfa production, have made arrangements to get a dependable supply of seed, have assisted in the pooling of orders for lime, and in some cases for landplaster, and have frequently made arrangements to get the inoculating material. With all of these aids, it has passed the demonstration stage in a number of counties.

550,000 Acres Possible

One wonders how far this increase in alfalfa acreage may go. It is possible to expand it far beyond the expectations of many interested in the question. A study of the soil survey reports shows more than 550,000 acres of soil types in the ten Willamette valley counties that are or may be put in condition for the growth of alfalfa. Naturally it will be many years before there is demand for such an acreage, or stock enough to consume its product, says Hyslop.

Dates of Slogans in Oregon Statesman

(With a few possible changes)

Loganberries, October 7, 1928.
Prunes, October 14.
Dairying, October 21.
Flax, October 28.
Filberts, November 4.
Walnuts, November 11.
Strawberries, November 18.
Apples, Figs, etc., Nov. 25.
Raspberries, December 2.
Mint, December 9.
Beans, etc., December 16.
Blackberries, December 23.
Cherries, December 30.
Pears, January 6, 1929.
Gooseberries, January 13.
Corn, January 20.
Celery, January 27.
Spinach, etc., February 3.
Onions, etc., February 10.
Potatoes, etc., February 17.
Bees, February 24.
Poultry and Pet Stock, Mar. 3.
City Beautiful, etc., March 10.
Great Cows, March 17.
Paved Highways, March 24.
Head Lettuce, March 31.
Silos, etc., April 7.
Legumes, April 14.
Asparagus, etc., April 21.
Grapes, etc., April 28.
Drug Garden, May 5.
Sugar Industry, May 12.
Water Power, May 19.
Irrigation, May 26.
Mining, June 2.
Land, Irrigation, etc., June 9.
Floriculture, June 16.
Hops, Cabbage, etc., June 23.
Wholesaling, Jobbing, June 30.
Cucumbers, etc., July 7.
Hogs, July 14.
Goats, July 21.
Schools, July 28.
Sheep, August 4.
Seeds, August 11.
National Advertising, Aug. 18.
Livestock, August 25.
Grain & Grain Products, Sept. 1
Manufacturing, Sept. 8.
Woorworking, etc., Sept. 15.
Automotive Industries Sept. 22.
Paper Mills, Sept. 29.

(Back copies of the Sunday edition of The Daily Oregon Statesman are on hand. They are for sale at 10 cents each, mailed to any address.

Current topics, 5 cents.