Issued Each Week

FARM AND DAIRY
RURAL HOME

Only $1.00 a Year

Vol. XXX. FOR WEEK ENDING JANUARY 19, 1911. No. 3

FIELD CROPS OF ONTARIO—VARIETIES THAT DO THE BEST

Prof. C. A. Zavitz, O.A.C., Guelph, Ont.

How the College and the Ontario Experimental Union is of assistance to every farmer—Work that has been accomplished—Experiments with Grain Crops, 1910.

Of the cultivated land of Ontario, nearly one-half is used annually for the production of grain crops. Not only have the cereals occupied an important place in the field experiments at the Ontario Agricultural College in past years, but they have also received particular attention in connection with the cooperative experiments throughout Ontario. A number of the leading varieties of grains which are now grown extensively throughout the province were first introduced and tested at the Ontario Agricultural College and were afterwards distributed for the cooperative tests in connection with the Experimental Union. From these small lots of these varieties, which proved the most successful, increases were soon made and later seed was sold from one farm to another until, in many cases, those leading varieties became the most commonly grown grains in the different neighborhoods.

Many people are now growing grains which are giving much better results than the old varieties which they had under cultivation some years ago, and do not realize that these improved varieties have been introduced and distributed as here described. A farmer recently made a statement that the College cost a lot of money and that he had never yet obtained five cents worth of value from the institution. On inquiry, however, it was ascertained inside of two or three minutes that he was growing the Mandscheuri barley with great satisfaction, that he was growing the Black Tartarian oats, which is not a particularly good variety, and that a weed had recently reached his farm through seed grain, which he had bought, and that this weed had increased rapidly and was becoming very troublesome.

It was at once explained that the Mandscheuri barley, which had been mentioned as giving such good results, had been imported from Russia by the College, and from a very small quantity, which was produced on a little plot 21 years ago, we now have upwards of a half a million of acres of this barley in Ontario annually. It was explained that the Black Tartarian oats had been surpassed by an average yield per acre per annum of about 20 bushels by each of three or four other varieties, and that an Ontario farmer who was still growing the Black Tartarian, without even trying some of the other varieties, which had been giving so much better results in yield of grain, in freedom from rust, in strength of straw, and so forth, was not living up to his opportunities.

It was also pointed out that the very weed referred to had been illustrated and fully described in a bulletin sent out by the College two or three years previous, and that this bulletin was sent to all the members of Farmers' Institutes in Ontario.

This gentleman, however, was not a member

Professor C. A. Zavitz

A man who has done a great and remarkable work, which has been of untold material benefit to the people of Ontario and of Canada in general

of the Farmers' Institute, did not receive the bulletin, was not in a position to know the weed when he first saw it in the field, did not have a handy reference regarding its method of eradication, and is only now awakening to the fact that the weed had become a very troublesome pest on his farm and would require a great deal of expense and labor in its eradication. This gentleman decided at once to take a part in the Experimental Union work, to become more in touch with the Farmers' Institutes and with other organizations through which he might secure valuable assistance.

The substance of this short conversation is here rehearsed simply to show two things: First, that a farmer may, unawares to himself, be obtaining advantages from the College and from the Experimental Union in his every day work on the farm; and second, that it is exceedingly foolish for any Ontario farmer not to take advantage of the results of experiments and investigations which are being conducted on his behalf.

The tabulated results here presented give the average of the successfully conducted experiments with grain crops throughout Ontario in 1910. The figures in the column under comparative value are made up from the answers obtained from the experimenters on placing the varieties in order of merit after taking everything into consideration. The yield of straw, as given in the second column, represents the total crop less the amount of grain, and therefore includes the chaff with the straw. The yield of grain is given in pounds as well as in bushels per acre in order that the results may be more clearly understood, and that comparisons may be made between the different classes of crops as well as between the varieties of each class. While it is true that the different classes of crops were grown on different farms throughout Ontario, yet as most experiments were conducted in a large number of localities, the complete table enables one to make a fairly good comparison of the yields of the different classes as well as of the different varieties of crops throughout the Province. Owing to the great variation in the weight per measured bushel of the different crops, it is much easier to compare the results in pounds than in bushels per acre.

NOTE.—Farm and Dairy readers will do well to note in the table given in connection with this article that the O.A.C. No. 21 barley gave a greater number of lbs. of grain per acre than did oats; also that corn for grain gives a return in weight much in excess of any other cereal or grain crop.—Editor.

Cooperative Experiments with Grain Crops, 1910

Experiments	Varieties	Comparative Value	Yield per Acre: Straw (tons)	Grain (bus.)	Grain (lbs.)
Oats (75 tests)	Liberty	100	1.39	52.01	1768
	Siberian	96	1.37	50.26	1749
	Yellow Rherson	55	1.10	47.75	1624
	Daubeney	63	1.05	44.11	1500
Six-rowed Barley & Emmer (28 tests)	O.A.C. No. 21 Barley	100	1.53	41.17	1976
	Emmer	60	1.46		1623
Two-rowed Barley (5 tests)	Success Barley	55	1.29	30.30	1454
	Hanna	91	1.38	34.58	1660
Hulless Barley (14 tests)	Two-rowed Canad'n	100	1.33	29.67	1424
	Guy Mayle	100	.87	22.11	1326
	Black Hulless	100	.93	21.75	1305
Spring Wheat (27 tests)	Wild Goose	93	1.49	25.06	1504
	Red Fife	97	1.59	24.23	1394
Buckwheat (2 tests)	Hungarian	100	1.44	22.31	1339
	Rye	100	1.57	20.90	1098
Emmer & Spelt (13 tests)	Silver Hull	82	2.06	14.65	703
	Common Emmer	100	1.17	34.34	1374
	Alstroun Spelt	90	.94	32.86	1314
Winter Wheat (23 tests)	American Wonder	100	2.14	31.25	1875
	Imperial Amber	88	2.39	27.80	1668
	Tasmania Red	82	2.21	27.60	1656
	No. 5 Red	66	2.68	26.70	1602
Winter Rye (4 tests)	Crimean Red	59	2.33	26.59	1595
	Mammoth White	100	1.68	23.04	1290
Field Peas (35 tests)	Common	92	1.54	22.14	1140
	New Can. Beauty	100	1.06	36.72	1693
	Early Britain	88	1.40	25.51	1530
Field Beans (15 tests)	White Wonder	100	.66	21.11	1266
	New Prize Winner	83	.57	20.57	1234
Soy Beans (2 tests)	Marrowfat	100	.71	20.23	1214
	Brown	100	.16	9.00	540
	Early Yellow	100	.40	8.00	480
			Whole Crop		
Corn for Grain (20 tests)	Wiscon. Little Dent	100	4.97	45.16	2529
	Genesee Valley	93	5.64	40.14	2248
	King Phillip	69	6.25	36.61	2050

I believe that winter dairying is one of the most profitable lines of farming possible. Cows come through the winter in better shape as we have to feed them well, and it provides work for the men. It is a mistake to dry off the cows in the fall and dismiss the hired man as is so often done.—H. Glendinning, Ontario Co., Ont.

When we consider the great advantage derived from sowing good, well cleaned seed, of some variety of good reputation for yield and quality, and one that is suitable to our land, and the purpose for which we wish to use the product, is it not well to procure it before seeding time?—A. Forster, York Co., Ont.