

FIELD NOTES

May be Potato Shortage

Reports from different parts of the West indicate that a considerable portion of the potato crop was damaged by frost during the cold snap about the middle of October. Farmers had not dug the crop, and the potatoes in some cases were frozen in the ground. As it is not usual to have frosts sufficiently severe to damage potatoes so early in the season, growers, as a rule, delay digging as late a date as possible in order to lessen the period during which potatoes have to be stored, as well as to improve the keeping qualities of the crop. While no estimate can be formed of the extent of the damage done, dealers anticipate that prices will advance and that there may be a shortage of stock. At least the potato crop this year was none too heavy. A larger acreage than usual was planted last spring, but the crop for various reasons did not come on very well. Here and there yields are reported above the average, but in the main potato yields have been rather low.

Training for Farmers' Daughters

At a meeting of the board of directors of the Manitoba Agricultural College held recently, a department of household science was established, in order that a course might be put on for the benefit of farmers' daughters who desire to gain a thorough knowledge of such subjects as cooking, dressmaking, laundry work and the care of the sick in the home. The first course will open on May 3rd next, continuing until August 19th, and those who enter will be able to reside in the students' dormitory.

Steps have been taken to secure as head of the new department a lady who had considerable experience in the teaching of these subjects. She will have as assistants teachers who have been specially trained in household science work.

Enquiries already received at the college, indicate that this new course will be as popular as the course for young men has proved to be.

Fertilizers in Japan

It is reported that there has been a great increase in the use of fertilizers in Japan during recent years. The leading place is still occupied by farmyard manure, which represents 60 million yen yearly, and another 100 million are spent upon fish manure, oil cake and rice husks. But the great development has been in what are commonly called artificial fertilizers. Thus sulphate of ammonia, which in the year 1900 was imported to the amount of only 200,000 yen, now has reached the 9 millions, or 1-14 of the total production of this chemical throughout the world. In the case of phosphates the import in 1897 was 100,000 yen, and it is now 5 millions, which is 1-30 of the world's supply. Bean cake has also come to be imported as a fertilizer to the extent of 22 millions annually, and if we add to this the 20 millions which will probably soon be reached in the case of artificial fertilizers, we shall have a total of over 40 millions of imported manures, and the quality of all kinds used throughout the whole country will aggregate 200 millions. It appears that the greatest falling-out is in fish manure, which is now used to the extent of only 14 millions annually.

Expert Reports on Peat Supplies

An interesting report upon the government peat bog and fuel testing plant has been made. Dr. Eugene Haanel, director of the mines branch, who notes that owing to the absence of coal in Ontario, the use of Canadian coal is absolutely prohibitory because of the long haulage costs. While, however, coal is absent from the middle provinces, there is peat in abundance. "Throughout the country," says the report, "over thirty-seven thousand square miles of peat have been already located, and when it is considered that one square mile of bog—with an average depth of six feet—will after drainage, yield 774,000 tons of air-tight peat, equal in fuel value to 420,244 tons of ordinary bituminous coal, the utilization of this coal asset is manifestly of supreme commercial importance. It is good Canadian policy to begin where Europe left off. In the attempt so far made, however, to establish a peat fuel industry, experience seems to have been utterly disregarded. Instead of taking advantage of the scientific knowledge gained in countries like Sweden, Germany, Russia, and other foreign countries where the manufacture of peat fuel has been in progress for many years, our Canadian exploiters have adopted systems, and tenaciously clung to obsolete processes which from the first were doomed to failure, since they were designed and constructed on wrong principles."

"Perceiving that the industrial development of the middle provinces would be retarded unless cheaper fuel could be obtained, and knowing the potential heat energy lying dormant in the Ontario and Quebec bogs, the Dominion Government, through the Mines Branch of the Department of Mines, first investigated

and reported on the peat fuel industries of Europe, then directed its attention to the delimitation and examination of our Canadian peat bogs. Moreover, with a view of doing for the peat manufacturer what the Department of Agriculture has done for the farmer, the Government purchased an extensive peat bog at Alfred, near Caledonian Springs, Ont., and is erecting a modern fuel testing plant at Ottawa."

The peat bog at Alfred has an average depth of eight or nine feet, and is a fair sample of Canadian peat bogs. The peat in the bog contains eighty per cent. of moisture, but after being put through a peat machine, which thoroughly disintegrates and pulps it, the pulp is cut into bricks. After undergoing a drying process the moisture is reduced to about twenty-five per cent. In this condition the bricks are admirably adapted for the producer, also for domestic purposes, yielding a fine white ash, without clinkers. The plant has a daily capacity of thirty tons, and will employ about twelve men during the summer months. The operating machines are in no sense experimental, being similar to those now in use in many commercial plants in Europe. The peat fuel used in the gas producer at the experimental plant at Ottawa, will be supplied from the Alfred bog; the balance will be sold. The estimated cost of one ton of air-dried peat at the bog will be \$1.75, which means that it will be possible to supply peat fuel having an equivalent of one ton of coal, at a considerably lower cost than coal.

The report notes that peat has various uses. The product of one bog may be best suited for use in the gas producer; that of another for domestic purposes, while another may be used as antiseptic litter for packing fruit. Another use is in the making of coarse brown paper. In the utilization of peat fuel for gas producing purposes it is not recommended that the fuel be transported for long distances to power stations, but to erect power plants on the bogs, and convert the potential energy stored in the peat into electrical energy for distribution to neighboring towns, as is done in Germany. In this way a peat bog will become a source of energy, precisely as in the case of a water power.

World's Wheat Crop

The United States remains the largest wheat grower of the world, though as America is consuming more and more of her own produce she will soon cease to be the largest exporter. The latest estimate of the Washington Department of Agriculture is that the total wheat crop of the United States will reach 703,268,000 bushels, as compared with 664,620,000 bushels last year, for the winter wheat is 5,000,000 bushels behind, but the spring wheat is 44,000,000 bushels in excess of 1908. In Canada a larger acreage has been sown, and larger crops of both winter and spring wheat will be realized. Converting the American figures into quarters, we may count on a yield of 89,000,000 qr. (as against 83,000,000) in the United States, and of one of 16,500,000 (as against 15,750,000) in Canada. The next most important non-European producer is Argentina, and there a safe estimate is 20,000,000 qr., as against 20,150,000 last year. The largest producer in the Old World is Russia, whose total crops last year were estimated at 71,000,000 qr. This year it is turning out larger, and although the reports latterly are less favorable than they were last month, it is reasonably anticipated that the yield will not be less than 75,000,000 qr. Rumania had disappointing crops both in 1907 and 1908 in comparison with her splendid yield of 13,600,000 qr. in 1906, but this year has done better, and is credited meanwhile with a crop of 10,000,000 qr. Austria and Hungary unfortunately have both done badly, and the Hungarian crop, one of the most important in Europe, is accounted 5,000,000 qr. to 5,500,000 qr. short of

last year. Both Bulgaria and France and Italy and the United Kingdom have larger yields, but there are smaller crops in Germany and Spain. Altogether, without going into more details, the European crops (which, however, in the case of Russia includes Siberia) may amount to a total of 223,700,000 qr., as compared with 218,045,000 qr. last year. We have a world crop now being garnered and about to be garnered at the turn of the year of 420,850,000 qr., which is an increase of about 14,500,000 qr. on the world crop of last year. The world's consumption varies, but always on the up grade, with the price of wheat, the condition of trade, and other circumstances. In 1906-7, for instance, it reached the high figure of 431,500,000 qr., and in the following year it dropped to 382,500,000 qr. Last year—that is to say, in the wheat year now closing—the world consumed not only the 406,495,000 qr. produced during the year, but also exhausted the reserve stocks. The consumption, then, must have been, or will be before the season's accounts are closed, at least 410,000,000 qr., and probably a great deal more. Some place it at 415,000,000 qr., an estimate that in the coming season the world will require 420,000,000 qr., which is just about the estimate of the new world crop.—*British Trade Journal*.

Lower Bacon Prices

Writing from Manchester, Eng., to the *Trade and Commerce Weekly Report*, Ottawa, P. B. MacNamara says that after a range of very high prices for bacon during which 80s. was touched for Irish, 78s. for Danish, and 76s. for Canadian, the market has declined rapidly with the result that current prices make Irish, Danish 66s.; and Canadian, 65s., with a prospect of further concessions to the buyer. These reductions have been brought about not by any decline in the price of hogs, but the absence of demand and the heavy killings in Denmark, which have jumped up from 27,000 to 36,000 a week. American bacon has, in sympathy with this movement, also declined. The shipments of American, however, to Great Britain, continue very small, and for the present American bacon is a negligible quantity on the English market. Hams have ruled cheap and considerably below the price of bacon because of the unfavorable weather and the large stocks in cold store—not yet liquidated.

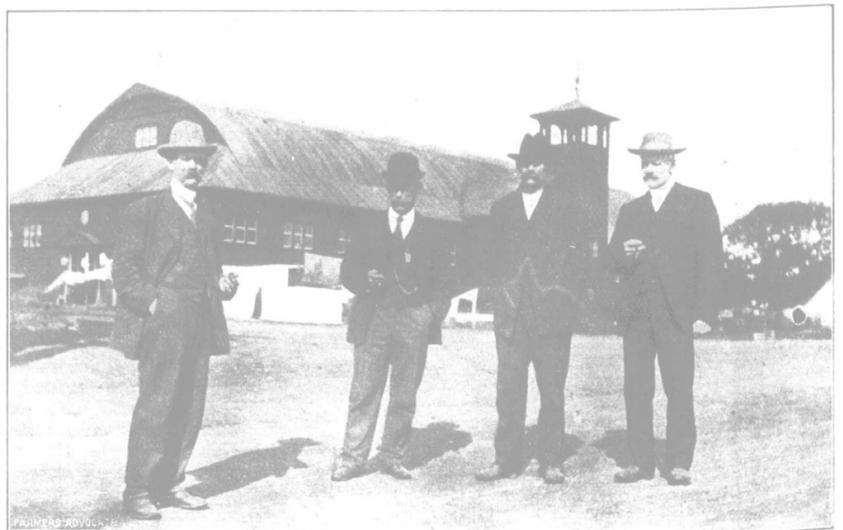
Japan's Rice Crop

The report of Trade Commissioner Gordon A. Harris, from Yokohama, to *Trade and Commerce Weekly Report*, says that just as the people of Canada look forward to a good wheat crop and prosperity, the Japanese people also are now looking forward to one of the largest crops, not of wheat but rice. If it turns out as large as has been estimated, trade in Japan should expand to a large extent in the next few months. For the last two years business has been stagnant, owing to the financial crisis of 1907, and also to the fact that Japan, while expanding rapidly in different lines, did not look forward (to use a homely expression), to the rainy day. But business confidence is returning, and as trade with the Empire is fairly good, most of the importers look for better business from now on.

Robert Meighen on Wheat Situation

Robt. Meighen, the well known Canadian miller, who earlier in the season strongly advised farmers to hold their wheat and market it more slowly, in a recent interview stated that in Ontario, particularly, farmers were not delivering wheat this year as freely as formerly. Continuing Mr. Meighen said:

"As far as applies to the Ontario farmer, it is understood that he is not placed in such a position as to compel his making immediate sale of his wheat as



BRITISH COLUMBIA LIVE-STOCK BREEDERS AND EXHIBITORS AT VICTORIA SHOW. F. S. QUICK, GEO. SANGSTER, JOHN LAMONT AND JOHN RICHARDSON.