

WINTER INJURY TO APPLE TREES.

Apple-growers in Durham County have been alarmed of late at the mysterious dying of large apple trees in a number of orchards. In the orchard of Mr. Charles Axford, of Darlington Township, which was made up of thirty twelve-year-old trees just beginning to bear heavily, the trouble first showed itself last year, when two or three trees died after leafing out. The rest of the trees bore an exceptionally heavy crop, but this year two or three dozen trees have died, and nearly half the trees in the orchard show signs of failing. Many theories have been advanced regarding the cause of the trouble, but as nothing definite could be assigned, Prof. H. L. Hutt, Ontario Agricultural College, Guelph, was requested to investigate the matter. He went down for that purpose last week, and after a careful examination declared that the trouble was the result of a combination of causes, the chief one being winter injury during the severe winter of 1903-4. Many of the more tender varieties of apples were that year killed outright in many parts of the Province, Baldwins suffering the most. In Mr. Axford's orchard the principal failures are among the Baldwins, and the injury may be seen in the dead bark around the collar of the tree, which practically girdles the tree, and eventually causes death through lack of proper nutrition. That the injured trees have lived so long is ascribed to the fact that the roots were not injured and the sap was carried up to the leaves as usual, but the down-flow of cambium elaborated in the leaves was unable to cross the girdled part and return to the roots, which eventually caused the starvation of the trees. The unusually heavy crop of fruit last year was the direct result of the girdling, as trees so injured usually make an effort to reproduce themselves by producing seed. The effect of the heavy bearing, however, lowered the vitality of the trees, and has hastened their death this year. This winter injury was most severe in orchards that were not on high, well-drained land, which emphasizes the importance of care in the selection of a site for the orchard. This was particularly noticeable by comparison with the orchard of Mr. John Penfound, east of Oshawa, where he has a thrifty young orchard twelve or thirteen years old, situated on a sidehill, where there is excellent drainage to lower ground. In this orchard even the Baldwins have escaped injury.

The result of Prof. Hutt's investigation has been to assure fruit-growers that the trouble is not caused by some new insect or disease which it was thought might spread and do damage to other orchards, but is really the results of previous winter injury, which could not well have been avoided.

The British Dairy Farmers' Association will probably hold its next conference in Canada, combining business with pleasure, as the Britisher often does.

NEW ZEALAND'S PROGRESS.

A return has just been received from the Registrar-General of New Zealand, giving the progress of the colony for ten years, from 1896 to 1906, writes D. H. Ross, Canadian Commercial Agent in Australasia. The population has increased from 714,162 to 908,726. The land under cultivation rose from 11,550,075 acres to 14,382,787; the number of horses from 249,813 to 342,603; cattle, from 1,138,067 to 1,851,750; sheep, from 19,138,493 to 20,108,471; shipping inwards, from 614,097 tons to 1,243,652 tons; outwards, from 627,659 tons to 1,238,214 tons. The total exports of produce increased from £9,177,366 to £17,841,346; imports, from £7,137,320 to £15,211,403. The development is still going on; for, though the colony is of small extent, there are yet very considerable areas of land to be brought under cultivation.

AUSTRALIA EXPORTING BREEDING SHEEP.

Australia has been shipping considerable numbers of high-grade breeding stock to South Africa since the conclusion of the war. Some little time ago an agent from the State of Uruguay arrived in Australia, and has purchased a number of sheep, paying very high prices for them. In one instance he paid 1,000 guineas for a Merino ram. He paid an average price of £588 each for five, and £126 each for eight ewes. It is believed that the result of this experiment will be to open up a large and profitable market to Australian breeders. The purchaser of the sheep has visited the Merino countries of the world, and asserts that nowhere has he seen anything to compare with Australian Merinos.

APPLE-EVAPORATING PLANTS.

Press despatches last week from St. John, New Brunswick, announced that R. J. Graham, manager of a cold-storage company, which is now erecting a warehouse near the Long Wharf, St. John, has arranged for the establishment of six apple-evaporating plants, to be built along the line of the Dominion Atlantic Railway in Western Nova Scotia. More may be built later on, but the six already decided on are at Bridgeport, Middleton, Kingston, Sheffield's Mills, Cambridge and Auburn, and the intention is to have them in working order by September 1st. The St. John warehouse was expected to be completed by the second week of September. Allusion was also made in the despatches to a proposed retail store which the company was evidently planning to erect.

The judges in the field crop competition, under the Ontario Department of Agriculture, are Andrew Elliott, Galt; Simpson Rennie, Toronto, and T. G. Raynor, Seed Division, Ottawa.

TWO-YEAR-OLD APPLES.

Editor "The Farmer's Advocate":

I am sending you two apples that were grown in our own orchard two years ago; have had no other care or treatment than just being left on a table in the cellar. We have taken "The Farmer's Advocate" for several years, and like it very much. Wishing the paper every success. OSCAR C. B. ARMSTRONG, Peel Co., Ont.

[Note.—The apples above mentioned are sound and in an excellent state of preservation. The name of the variety is not given, but the apples have much the appearance of the Baldwin.—Editor.]

WESTERN CROP OUTLOOK.

Dr. Wm. Saunders, Director of Experimental Farms, returned from a tour of inspection of Manitoba and the West, says the area in which partial failure is expected, owing to drouth, is a restricted one, and, on the whole, after a careful review of the situation, he believes that there will be a three-fourths crop. With wheat at its present price this will mean a larger cash return to the farmer than he received for the crop of last year. Even should some of the late-sown grain become frosted, it will fetch a price almost as high as was obtained for good wheat last season. The agents of the Canadian Northern Railway send quite encouraging reports of crop prospects along that line of railway. On the whole, however, it is probable that Dr. Saunders' estimate is near the mark.

A GRAIN-SLING ACCIDENT.

A Kent County, Ont., farmer was killed last week while driving a team that was working the sling unloading wheat in his barn. The explanation given in the press despatches was that the hook in the barn, holding a pulley, broke, allowing the rope to strike him with great violence. He was found a couple of minutes later lying on the ground in an unconscious condition.

E. Thompstone, B.S.A., formerly Demonstrator of Botany at the Ontario Agricultural College, a graduate in agriculture of Edinburgh University, has been appointed President of an agricultural college at Mandalay, Burmah, India.

At the annual commencement exercises of the Consolidated School at Hillsboro, Prince Edward Island, Dr. Jas. W. Robertson announced that for a while the Macdonald fund would contribute \$1,200 a year towards its maintenance.

Contents of this Issue.

ILLUSTRATIONS.	
"Chieftain" and "The Only Way."	1227
Judging Southdowns at the Royal Show, '07.	1229
Golden Treasure	1231
On the Umlaas River, South Africa.	1231
Kaffirs in Everyday Costume	1233
Incubator House at College Farm, Theale, Reading, Eng.	1236
Part of the Rearing Ground, College Poultry Farm, Theale, Reading, England	1236
Range of Scratching Sheds, College Poultry Farm, Theale, Reading, England	1236
EDITORIAL.	
The Rural School and the Farmer	1225
The Clydesdale Situation	1225
Winter Wheat in Ontario	1225
An Important Poultry Conference	1226
HORSES.	
Our Scottish Letter	1226
The Hackney as a Harness Horse	1227
A Bath for the Horse	1227
Lameness in Horses	1227
Horses in Hot Weather	1228
The Clydesdale Rules Again	1228
Three-horse Evener (illustrated)	1228
LIVE STOCK.	
Grubs in the Heads of Sheep	1228
Brighter Prospects for the Stock-cattle Trade	1229
More Praise for Muslin-Curtain Ventilation	1229
Recollections of a Shepherd	1229
THE FARM.	
Another Tribute to Alfalfa	1230
The Cultivation Propaganda in Alberta	1230
Breaking by Power	1230
Blight in the Oat-fields (illustrated)	1230
Good Value for Expenditure at the O. A. C.	1230
A Western Farmer Who Makes Hay Carefully	1230

Our Growing Need for Timber	1230
Mustard Spraying at Montreal College	1231
THE DAIRY.	
Essentials for Supplying Good Milk	1231
Never Too Late	1231
Put a Detective on the Poor Cows	1231
Dairy and Other Notes from P. E. Island	1231
Amount of Time Trifling	1232
Interesting and Profitable	1232
Terse	1232
GARDEN AND ORCHARD.	
Advantages of Co-operative Packing and Selling	1232
Evaporated Apples in Britain	1233
Horticultural Progress	1234
Ontario Vegetable Crops	1234
POULTRY	
Shall We Stamp the Eggs?	1234
Poultry at Macdonald College	1234
New Poultry-breeders' Organization	1234
Poultry Conference at Reading, England	1235
College Poultry Farm and Experiment Station, University College, Reading, England	1236
THE FARM BULLETIN.	
Hay, Spring Grain, Fodder Crops, and Rye; The Fly Plague; Develop P. E. Island's Orchard Resources; Grass a Weed in the Orchard; Fair Dates for 1907; The "Ideal Butter Separator"	1237
Australia Exporting Breeding Sheep; New Zealand's Progress; A Grain-sling Accident; Winter Injury to Apple Trees; Apple-evaporating Plants; Two-year-old Apples; Western Crop Outlook	1238
Vaccination for Blackleg and Anthrax in Cattle	1239
Some Necessary Farm Supplies	1241
Seasoning of Telegraph and Telephone Poles	1247
Encouraging the Poultry Industry in Japan	1257

MARKETS	1239
HOME MAGAZINE	1240 to 1248
QUESTIONS AND ANSWERS.	
Miscellaneous.	
Indigestion in Calf	1248
Caked udder; quitting work; ailing turkeys; lice or possibly blackhead, binding a bargain	1250
Meal for pigs on grass; presumably white diarrhoea	1253
Black collie dogs; penny grass and bladder campion; insect on hedge; grub in head—milk fever	1256
Veterinary.	
Brain trouble—sweeny; pink eye—conception; discharge from joints	1253
THE IDEAL EVE.	
Not one man in five hundred pictures his future wife in the surroundings of the ordinary girl. Where is the Adam who dreams of meeting his Eve, short of skirt and strong of arm, in the hockey field; or striding over the turf with a golf ball, or plunging madly after a tennis ball?	
Au contraire, he pictures her clad in "something soft and clinging," a being more angel than woman, who, as a daily companion, would undoubtedly prove the most withering bore a man could be cursed with.	
The late Senator Quay used to tell of an Irishman who prided himself upon his delicacy and tact. One day when a boy was killed in the quarry where the Irishman worked, he told the men to leave everything in his hands; he would break the news to the boy's mother as it should be done.	
He went home, put on a black suit and tie, and started for the mother's shanty.	
"Good mornin', ma'am," he said.	
"Tis the sad accident yer boy's gold watch has met wid."	
"Why," said the mother, "Tom never had a gold watch."	
"Sure, an' that's lucky," said the diplomat, "for twenty tons uv rock just fell on him."	

GOSSIP.

The Eastern Townships Agricultural Association, which runs the Sherbrooke, Quebec, Fair, has made several innovations in connection with the Dominion Exhibition to be held in that ambitious town, Sept. 2nd to 14th, as advertised, some of which are the result of experience in former years, and some of which are experimental. Of the latter class is the new arrangement for trotting races. Instead of giving the race to the best three in five heats, the plan of making each event three heats, every heat a race, and thus avoiding the "laying up" and the consequent dragging out of races to interminable length, has been decided upon. Sherbrooke is the only place in the international circuit where the plan will be tried.

Of the other class is the enlargement of the bureau of information. This year it will occupy a small building of its own, near the railroad station. Competent and courteous men will be in charge, and long before Sept. 2nd, when the Exhibition begins, the bureau will be in service to engage rooms for intending visitors, to furnish any information and help to arranging tours for persons who may desire to come. The Fair is so large this year that more than one day will be really required to see it properly, but the hotels have joined in the general effort to make visitors comfortable. A list of good boarding houses, at all sorts of prices, has been made up, and some of the city's institutions and seminaries will throw open their dormitories for the fortnight. One of these alone will accommodate 600, and with the fourteen hotels in the city, the numerous boarding houses, and the conveniently-near hotels at North Hatley, there should be nobody in danger of having to sleep out of doors. Reduced fares, practically one fare for the return trip, will be given by the railways. The horse and stock classes will be the best ever seen in Eastern Canada and the Show will be a great treat to all who attend.