

PUBLISHED EVERY WEEK. \$1.50 PER YEAR.

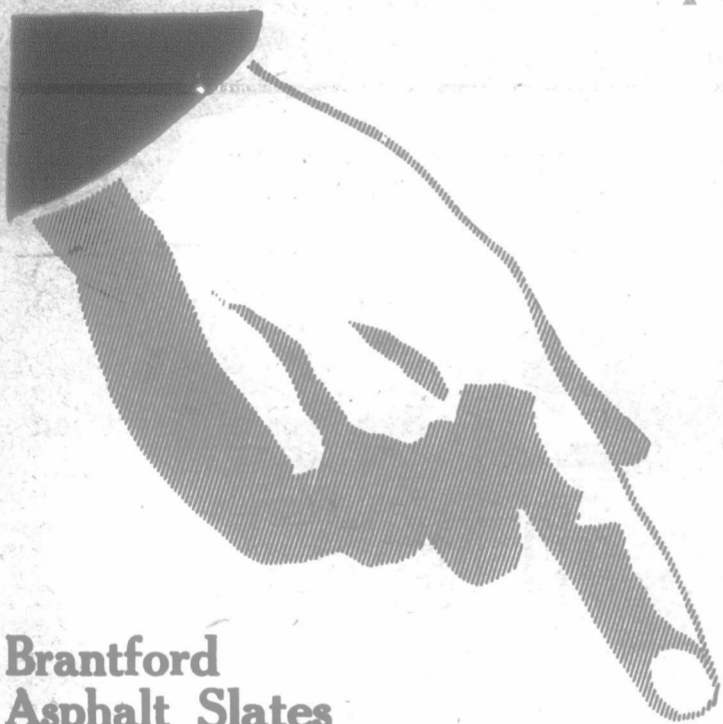


AGRICULTURE, STOCK, DAIRY, POULTRY, HORTICULTURE, VETERINARY, HOME CIRCLE

Vol. L.

LONDON, ONTARIO, SEPTEMBER 2, 1915.

No. 1197



Brantford Asphalt Slates

are the twentieth century house-roofing material. Uniform in thickness, pliable, fit any corner, curve or angle, can be laid quicker and cheaper than wooden shingles, natural slate or tiles. First cost is only cost—they are practically indestructible; proof against fire, water, heat, cold, lightning.

Brantford Asphalt Slates will not warp, crack, become weather-beaten or ugly. Made in three permanent fadeless, colors, finished with a coating of crushed rock. For a warmer house, a more attractive house, a safer house—roof with these everlasting slates.

Ask for free booklet to-day.

"There they are, the enemies of roofing!"

A roof that will last must be first-class in more ways than one. The numerous and varied enemies of roofing made it necessary to produce Brantford—the roofing of all 'round excellence; proof against wet, frost, heat, fire, lightning.

Because we made Brantford Roofing to withstand every roof trial, and the years have proven it does so, you need pay only a reasonable price for better roofing than was ever produced before.

Brantford Roofing

MADE IN CANADA

is used on huge manufacturing plants, with the approval of the best architects, by firms who must have the highest grade that money can buy. Why shouldn't it be the best possible covering for that building of yours? Remember, that the labor cost of laying a poor roof is the same as for putting on a real permanent covering.

Brantford Roofing costs no more, yet has resistant qualities never reached by ordinary roofs. It is superior to metal roofing, which is liable to rust both sides and under which drifting rains and snow will find a way. No roof-tinkering needed year by year once you use Brantford. There is no metal in it, no paper in it, no weather can affect it.

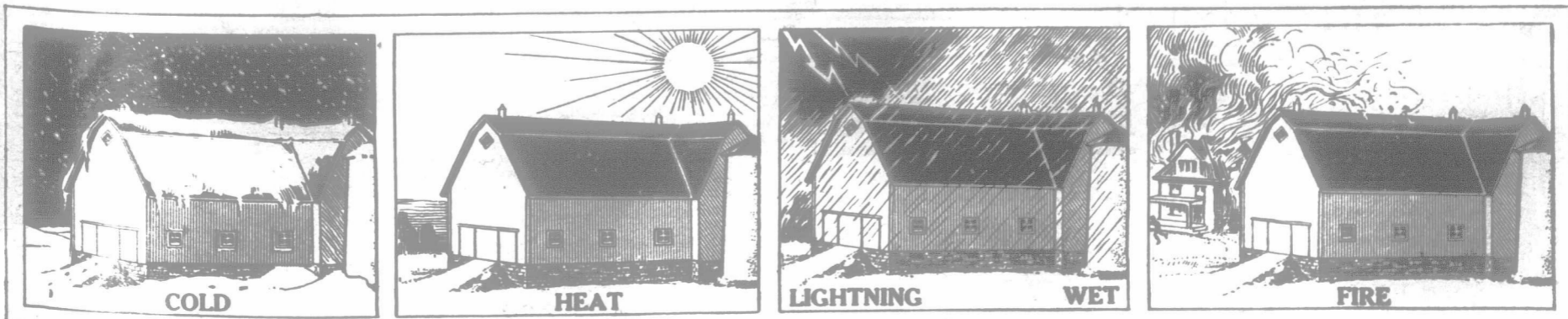
The base of Brantford Roofing is long-fibred pure wool, saturated and super-saturated with pure Asphalt. Fire insurance companies quote low rates on Brantford-roofed buildings. They know!

Write for Free Roofing Book

Now, don't you want to use Brantford Roofing and no other? We'll send a big, practical book on roofing free. It contains truths you should know. Mail a postal for your copy to-day.

Brantford Roofing Company, Limited, Brantford, Canada

The only roll roofing plant in Canada controlled entirely by Canadian Capital



Separators

positively all com-
D. The quality is
never before in all
Separator offered
s. We have such
BOLO Separator

SPECIAL OFFER

re say. Every
tell you a machine
ve had a machine
atisfied with your
you may return
will gladly refund

Engines

all UNITED ma-
e but the highest
d the best skilled
oney can procure.

mes to give your
eatment, whether
es or a small re-

our goods that
he biggest value
le to obtain.

ITED Engines are
World's Standard,
can pay more, but
can't buy a better
e.

our Big Catalogue
ABOLO Separators,
ED Gasoline En-
Pump Jacks, Water
ire Systems, Gover-
ulleys and the Calf-
Milker Systems.

ited Engine &
eparator Co.
Canada, Limited
Wellington St. West
NTO CANADA

GILSON "GOES LIKE SIXTY" SILO FILLERS

SAVE MONEY--TIME--POWER--LABOR in filling your silo



AN ARISTOCRAT AMONG GAS ENGINES

A 6 or 8 H.-P. Gilson Engine and a Gilson Papec Ensilage Cutter make the ideal outfit for the individual farmer. Besides the engine will do all your feed grinding, wood sawing, feed cutting and other work all the year round.

Gilson Mfg. Co., Ltd.: "I filled a 10 x 35 foot silo in eight hours with my 8 H.-P. Gilson Engine and 0-10 Gilson Papec Ensilage Cutter. Both the engine and the ensilage cutter are without doubt, the best machines I have ever seen—strong, durable and very easy running. I have filled eight silos with my outfit this fall. Yours truly, Wm. E. Main, New Dundee, Ont."

Write to-day for large catalogues. You should know of the wonderful saving a fuel, labor, time and money—you can make by getting a Gilson Outfit. Send us a card to-day. If you already have an engine, tell us the size, and we will recommend the right cutter for it.

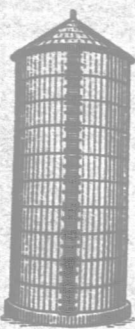
GILSON MFG. CO., LTD.
59 YORK STREET, GUELPH, ONTARIO



MADE IN CANADA

CALL AND SEE US AT THE TORONTO, LONDON AND OTTAWA FAIRS.

Have You Ordered Your HYLO SILO ?

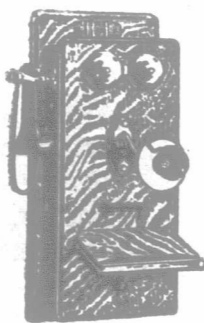


The HYLO SILO is built on scientific principles—air tight, leak tight—without metal parts, masonry, or concrete. It preserves the ensilage, sweet and succulent, down to the last forkful, and will last for generations. It is truly called "THE WATCH TOWER OF PROSPERITY" and "THE MORTGAGE LIFTER."

If you are not acquainted with the special features of design, construction and material of the HYLO SILO, write us at once for catalogue and price on a HYLO SILO for your farm. Let us tell you how you can save money, and why a HYLO SILO is the best investment you can make. As we can furnish only a limited number more, WRITE TO-DAY for catalogue.

Gilson Manufacturing Company, Limited
69 York Street, Guelph, Ont., Canada

Own Your Own Telephone



To know the conditions under which your neighbors are working, to be in touch with markets where you sell your produce, to get weather reports in time to protect your crops, means more time to devote to making your farm productive.

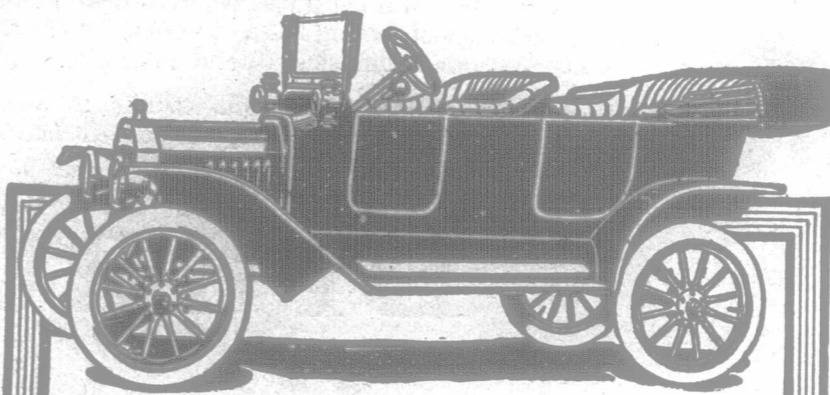
Write for a free copy of our interesting bulletin "A Telephone on the Farm"

It contains valuable information about building your own telephone system.

Stromberg-Carlson Telephone Mfg. Co.
23 Richmond St. West, Toronto, Canada

CUT THIS OUT

Farmer's Advocate Pen Coupon, Value 4c. Send this coupon with remittance of only \$1.52 direct to the Fleet Pen Co., 119 Fleet Street, London, England. In return you will receive by registered post, free, a splendid British-made 14ct. fountain pen, self-filling, Fleet Fountain Pen, No. 1 (16s. 6d.). Further coupons, up to 13, will each count as 4c. off the price of the pen. Say whether you require a ballpoint pen or broad nib. This pen is made to introduce the fountain pen to Canada, where it has never been sold in England. Write to Fleet Pen Co., 119 Fleet Street, London, England.



"MADE IN CANADA"

Ford Touring Car
Price \$530

Ford Runabout
Price \$480

Ford Town Car
Price \$780

The above prices f. o. b. Ford, Ont., effective Aug. 2, 1915. No speedometer included in this year's equipment, otherwise cars fully equipped. Write for catalog E.



FREE LAND

FOR THE SETTLER IN
New Ontario

Millions of acres of virgin soil, obtainable free, at a nominal cost, are calling for cultivation. Thousands of farmers have responded to the call of this fertile country, and are being made comfortable and rich. Here, right at the door of Old Ontario a home awaits you.

For full information, as to terms, regulations and settlers' rates, write to:

HON. JAS. S. DUFF, Minister of Agriculture
H.A. MACDONELL, Director of Colonization
Parliament Buildings, TORONTO, ONT.



Synopsis of Canadian North-West Land Regulations

THE sole head of a family, or any male over 18 years old, may homestead a quarter-section of available Dominion land in Manitoba, Saskatchewan or Alberta. Applicant must appear in person at the Dominion Lands Agency or Sub-Agency for the District. Entry by proxy may be made at any Dominion Lands Agency (but not Sub-Agency), on certain conditions.

Duties—Six months residence upon and cultivation of the land in each of three years. A homesteader may live within nine miles of his homestead on a farm of at least 80 acres, on certain conditions. A habitable house is required except where residence is performed in the vicinity.

In certain districts a homesteader in good standing may pre-empt a quarter-section alongside his homestead. Price \$3.00 per acre.

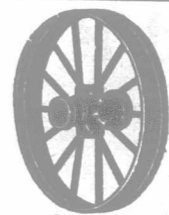
Duties—Six months residence in each of three years after earning homestead patent; also 60 acres extra cultivation. Pre-emption patent may be obtained as soon as homestead patent, on certain conditions.

A settler who has exhausted his homestead right may take a purchased homestead in certain districts. Price \$3.00 per acre. Duties—Must reside 6 months in each of three years, cultivate 60 acres and erect a house worth \$300.

The area of cultivation is subject to reduction in case of rough, scrubby or stony land. Live stock may be substituted for cultivation under certain conditions.

W. W. CORY, C.M.G.,
Deputy of the Minister of the Interior.

N.B.—Unauthorized publication of this advertisement will not be paid for.—64388.



\$19 Per Set
Delivered to Nearest
Railroad Station
in Ontario

28-inch and 32-inch diameter, 4-inch by 3/4-inch axle, grooved or plain, made to fit any axle. Write for Catalogue.

NORMAN S. KNOX
47 Wellington St. East, Toronto, Ont.



BOOK ON DOG DISEASES And How to Feed

Mailed free to any address by the author.

H. CLAY GLOVER, V. S.
118 West 31st Street,
New York.

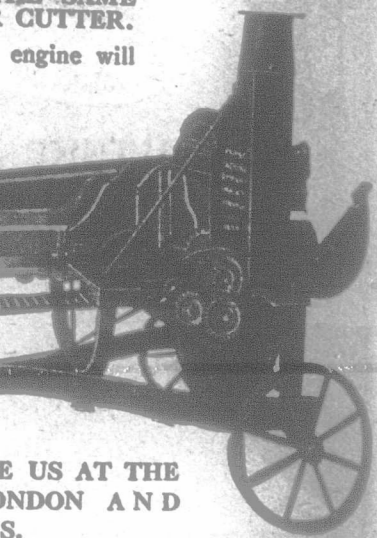
FILLERS

FOR in filling your silo

GILSON AND GILSON ENGINES are the buyer, whose motto is "Safety Like Sixty" Engines and Ensilage and ensilage cutter construction.

Gilson Engine is the most sensational placed on the market for the individual ANTEE ANY GILSON ENGINE, a BLOW ENSILAGE PERPENDIC- ENSILAGE CUTTER TO THE THE SPEED OF THE CUTTING L. F. M. Furthermore WE GUAR- ENSILAGE CUTTER TO CUT AND THE SAME CUTTER.

engine will



US AT THE LONDON AND S.

Synopsis of Canadian North-West Land Regulations

sole head of a family, or any male over 18 years old, may homestead a quarter-section of arable Dominion land in Manitoba, Saskatchewan or Alberta. Applicant must appear in person at the Dominion Lands Agency or Sub-Office for the District. Entry by proxy may be made at any Dominion Lands Agency (but not in person), on certain conditions.

Six months residence upon and cultivation of the land in each of three years. A homesteader may live within nine miles of his homestead on a farm of at least 80 acres, on certain conditions. A habitable house is required where residence is performed in the year.

In certain districts a homesteader in good standing may pre-empt a quarter-section of arable land. Price \$3.00 per acre.

Six months residence in each of three years after earning homestead patent; also 60 days extra cultivation. Pre-emption patent may be obtained as soon as homestead patent is issued and erect a house worth \$300.

Area of cultivation is subject to reduction in case of rough, scrubby or stony land. Live stock may be substituted for cultivation under certain conditions.

W. W. CORY, C.M.G., Deputy of the Minister of the Interior.

Unauthorized publication of this advertisement will not be paid for.—64388.

\$19 Per Set Delivered to Nearest Railroad Station in Ontario

28-inch and 32-inch diameter, 4-inch by 1/4-inch grooved or plain, made to fit any size. Write for Catalogue.

NORMAN S. KNOX Wellington St. East, Toronto, Ont.

BOOK ON DOG DISEASES And How to Feed H. CLAY GLOVER, V. S. 118 West 31st Street, New York.

His house has 9 rooms—yes, but he can live in only one!

Can your neighbors say that about you in the winter months? Is it true that you and your women folk get old before your time and lose your health, to say nothing of comfort, because your HOME is a cheerless, dreary, wintry-cold place for five months in the year?

You want to stop and think about your health. Remember, a cold house runs up the doctor's bills, it drives away hired help, it injures the young folk more than you, a strong man.

You can't heat a farm house by out-of-date methods. You may get one or two rooms "tolerable" for a few hours out of the twenty-four, while with HOT WATER heating you certainly will get every room, every hall, every corner from attic to cellar warm, cozy and absolutely comfortable. Why is every good city home now equipped with HOT WATER heating? Only one answer. Hot water delivers more heat of the right kind and delivers more comfort, more efficiency and more convenience at a less cost.

And why is the GURNEY OXFORD Hot Water System by far the biggest seller in Canada? Because our patented system of boiler construction

and temperature control through our "Economizer" has never been equalled.

We want you to consider putting a GURNEY OXFORD Hot Water system in your home. Don't make up your mind that you can't afford it. Wait until you find out what it costs. It costs NOTHING to know that.

A GURNEY OXFORD Hot Water Heating System can be installed with astonishingly little trouble and carpentry. It means a water boiler in the cellar that will burn either coal or up to 40-inch wood, as you prefer. Radiators are put into every room you want them in, and pipes connect the whole. No "water system" needed. A few buckets of water last all winter. The boiler keeps the hot water circulating all through the house. One fire only does all the work—no carrying fuel into and ashes out of two or three rooms. Means a warm, snug dining-room, kitchen, bedroom at 6 in the morning. Means solid comfort all over the house.

The cost certainly is not high looked at from any standpoint.

We have just published a booklet, "City Comfort for Country Homes," that tells all about the GURNEY OXFORD Hot Water Heating System. Shows how it is installed. Pictures and letters from farm homes now using it. Answers pretty nearly every question.

We want you to write to-day for your copy. Now is the time to plan for GURNEY OXFORD Hot water comfort.

Address:



The Gurney Foundry Company, Limited, 502-550 West King Street Toronto

Also at Montreal, Hamilton, Winnipeg, Calgary, Edmonton, Lethbridge, Vancouver



SARNIA FENCE

The Fence of Quality Sold Direct to the Farmer



PRICES

Owing to the fact that the spelter situation has eased considerable in the past few weeks wire has dropped back to almost nominal price—consequently we are enabled to reduce the price of fence quite materially. This drop in price is also our regular off season reduction and is a very close price. As the market on black wire is very stiff, owing to the steel companies using large quantities for war munitions, the price of wire may advance again which will of course compell us to advance our price again.

We would therefore suggest that you order your requirements at the earliest possible moment in order to take advantage of these prices.

ALL FULL No. 9 WIRE

No. Line Wires	Height in Inches	Stays per rod	Spacing of Horizontals	Weight per rod (lbs.)	PRICE Less than cartload in Old Ontario	PRICE Less than cartload in New Ont., Que., Mar., Provinces
5	40	9	10, 10, 10, 10	6 1/2	\$0.19	\$0.21
6	40	9	7, 7, 8, 9, 9	7 1/2	.22	.25
7	40	9	5, 6, 6, 7, 7 1/2, 8 1/2	8 1/2	.25	.28
7	48	9	5, 6, 7, 9, 10, 11	9	.26	.29
8	40	12	3, 4, 5, 6, 7, 7, 8	10 1/2	.31	.34
8	48	12	4, 5, 6, 7, 8, 9, 9	11	.32	.35
9	48	9	3, 4, 5, 5, 6, 8, 8, 9	11	.32	.35
9	48	9	6, 6, 6, 6, 6, 6, 6	11	.32	.35
9	48	12	3, 4, 5, 5, 6, 8, 8, 9	12	.35	.39
9	52	9	4, 4, 5, 5 1/2, 7, 8 1/2, 9, 9	11 1/4	.33	.36
10	50	12	3, 3 1/2, 3 1/2, 4 3/4, 5 1/2, 6, 8, 8, 8	13 1/4	.38	.42
11	52	12	3, 3, 3 1/4, 3 1/2, 4 3/4, 5 1/2, 6, 7, 8, 8	14 1/2	.42	.46
POULTRY AND HOG FENCES—No. 9 and 12 Wire						
7	26	30	3, 3 1/4, 3 1/2, 4 3/4, 5 1/2, 6 1/2	6 3/4	.21	.26
15	50	24	1 1/2, 1 7/8, 1 7/8, 1 7/8, 2, 2, 2 1/4, 3, 4, 5, 5, 6, 6, 7	12	.40	.44
18	58	24	1 1/2, 1 7/8, 1 7/8, 1 7/8, 2, 2, 2 1/2, 3, 3, 3 1/2, 4, 4, 4 1/2, 5, 5, 6, 6, 13 1/2	14	.44	.48
STAPLES GALVANIZED, 1 3/4 in., per box of 25 lbs.					.75	.85
BRACE WIRE, No. 9, Soft, per coil 25 lbs.					.75	.85
GATE PRICES					\$2.50	\$2.75
3 1/2 x 48					3.75	4.00
12 x 48					4.00	4.25
14 x 48					4.25	4.50
16 x 48					4.75	5.00

SERVICE

This year with our extensions to our formerly enormous plant, we are able to adhere very closely to our rule of making shipment the same day the order is received.

QUALITY

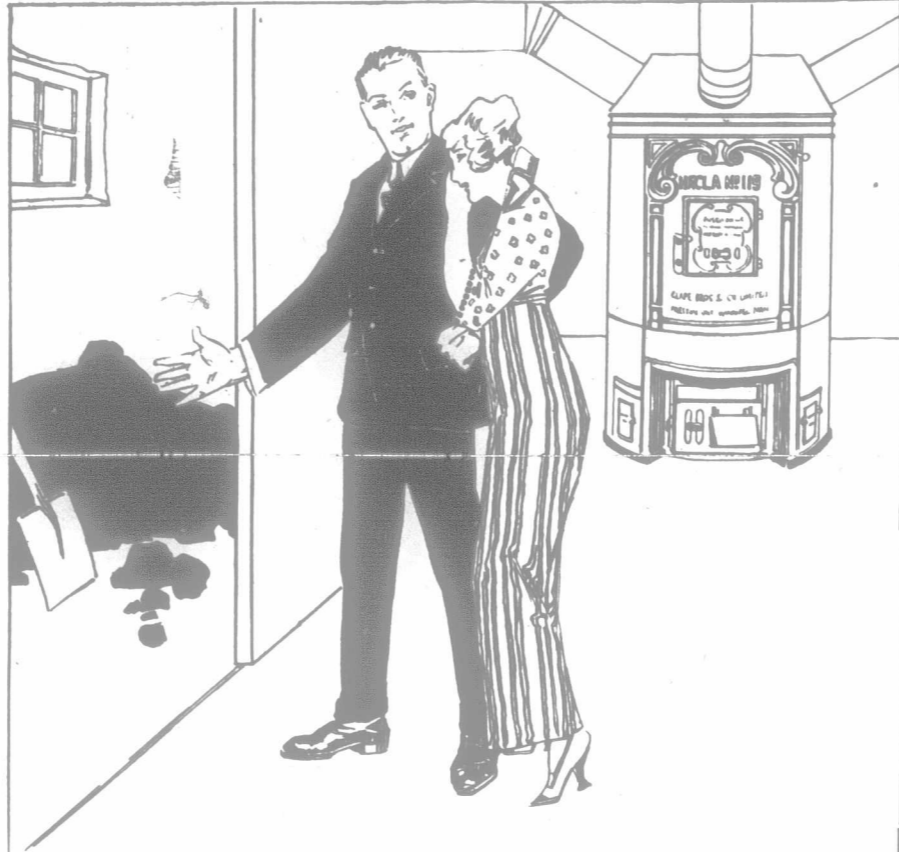
Sarnia Fence is the best known fence in the Dominion of Canada to-day, which is due largely to the fact that it has lived up to every claim we have made for it. From the first we have used a most rigid system of inspection, which insures our customers of getting the most perfect fence possible.

This year we are selling the farmers of Canada the best fence ever placed on the market at the best price possible.

GUARANTEE

We guarantee our fence to be made from the best galvanized hard steel wire, both stay, line wire and knot, and to be the most perfectly woven fence on the market, and of full Government gauge No. 9 wire.

The Sarnia Fence Company, Limited, Sarnia, Canada



Saved!!

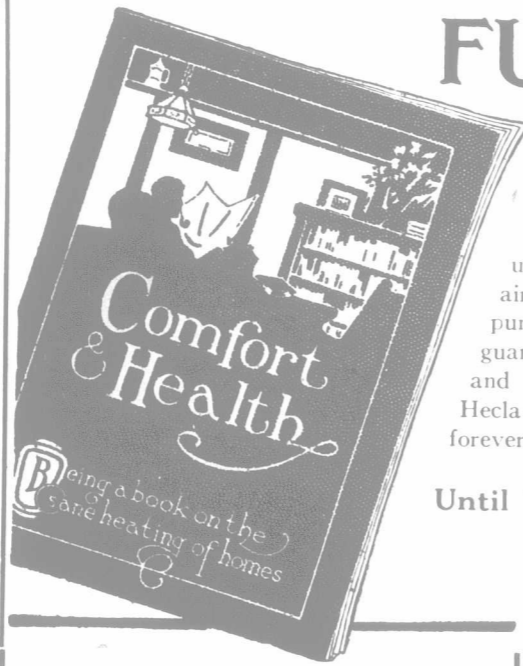
"That little Booklet was right. It said we would save one ton in seven—and there's the coal to prove it."

There's nothing surprising about this. The Hecla has a firepot that saves coal because of its triple heating surface. This firepot is ribbed with steel flanges. Every winter thousands of Hecla Furnaces prove that the Steel Ribbed Firepot gives greater heat from the coal.

Every winter Hecla owners are able to reckon a big saving in coal because of this patented Firepot.

The reasons are clearly shown in our Booklet.

HECLA WARM AIR FURNACE



Clean Air Healthful Heating

No matter how long you may use a Hecla Furnace the warm air it supplies will always be pure and mellow. The Hecla guarantees air free from gas, dust, and soot. This is because the Hecla has Fused Joints, that are forever sealed against dust, and gas.

Until You Read This Book

you will never know the utmost in heating with a warm air furnace. We will send a copy free to anyone interested, and will answer questions or give advice on any heating problem.

Write to-day.

CLARE BROS. & CO.,
Limited, Preston

Coupon

Clare Bros. & Co., Limited, Preston.
Send Free Booklet "Comfort and Health." F.A.

"Finest Butter and Cheese We've Seen in Years"

Is what the experts say about the Dairy Products shown at the Exhibitions this year.

And the Prize Winners all used

WINDSOR

DAIRY SALT

CHEESE SALT

MADE IN CANADA

The Canadian Salt Co., Ltd.
WINDSOR, ONTARIO

utter and
e've Seen

t the experts
out the Dairy
ts shown at
hibitions this

e Prize Win-
used

SOR

RY

LT

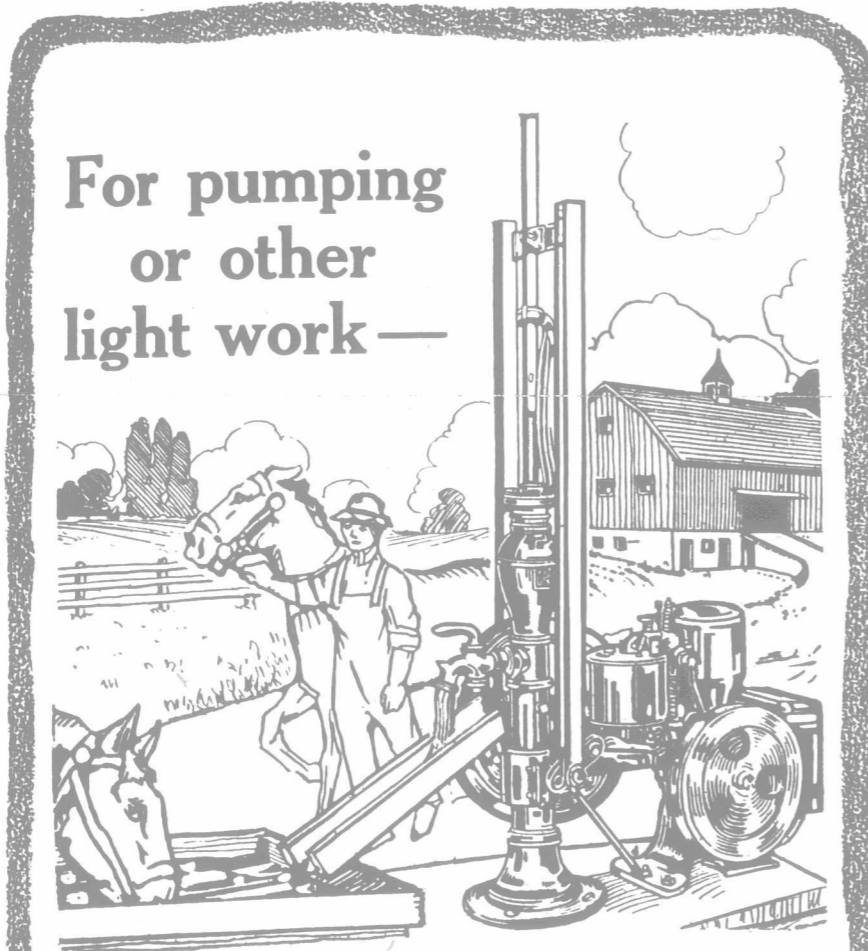
ESE

LT

ANADA

alt Co., Ltd.

NTARIO



For pumping
or other
light work —

the engine you need is a
Fairbanks-Morse Eclipse

It cuts chore time in two and eats up the bigger half.

The Eclipse is a healthy, husky little engine that can do a lot of good hard work. It can be moved easily from place to place, and put to work pumping, grinding, hoisting—dozens of jobs—and it's ready in a few minutes.

Every element of the perfect farm engine is built into the Eclipse. It is simple, powerful and durable.

And economy is a very strong point—the original cost is low (\$48.00 without pump f.o.b. Toronto factory), fuel consumption is light and the cost of up-keep is practically nothing. Repairs are few and far between.

Everything is explained fully in "Power on the Farm," an interesting booklet, which will be sent free immediately upon request. Address :

37 Fairbanks-Morse Building (any branch).

The Canadian Fairbanks-Morse Company Limited



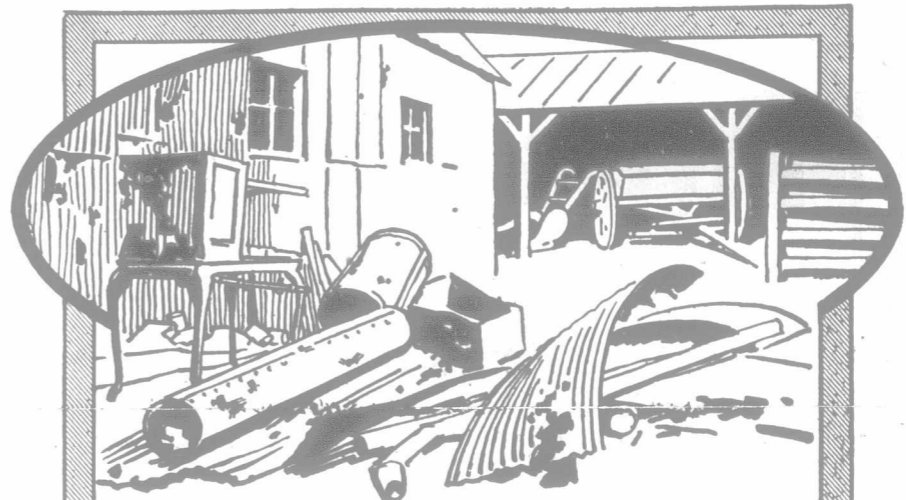
MONTREAL OTTAWA TORONTO
ST. JOHN QUEBEC WINNIPEG
HAMILTON CALGARY SASKATOON VANCOUVER



The Bissell Steel Roller
With Three Drums and Strong Rigid Steel Frame.
Some improvements are: Heavy Steel Axle.
Thick, Heavy Steel Plate, Drums Riveted.
up to stand any strain, Roller Bearings
Runs like a bird. Full particulars free
by mail, or ask your dealer. None
genuine without the name "BISSSELL."
Look out for it. This Roller will
stand hard work and lots of it.
Write Dept. W for free catalogue

T. E. Bissell Co., Limited, Elora, Ont.

Don't fail to call and see us at the Toronto, London and Ottawa Exhibitions.



**Stop This Loss—Don't Pay
Tribute to Rust**

Rust piles up the junk heaps around your farm. Your roofing, siding, silo, water tanks, stoves, furnace, fence posts and wire fencing—all these and other articles should be of Armco Iron because—

ARMCO IRON Resists Rust

Get these Armco products and you'll get many times the service you now do. Rust, and not wear, destroys your sheet metal.

An Armco Roof is more than durable. With conductor pipes properly grounded it gives absolute protection against lightning and possible fire.

Armco Iron resists rust not merely because it is the purest iron made but because it is most nearly perfect in respect to evenness and all other features that form the basis of rust-resistance.

You can buy Armco roofing from your hardware dealer or tinner. You can get many Armco Iron products. For instance, Page Wire Fencing, manufactured by the Page Woven Wire Fence Co. of Monessen, Pa., is made of rust-resisting Armco Iron. Tell us what you want and we'll tell you who makes it of Armco.



Clip the Coupon for Free Books

Send the coupon for "Iron Roofs that Resist Rust" and "A Journey to Armco Farm." These books, fully illustrated, tell the Armco story. Send for them now, to-day.

The American Rolling Mill Company
Licensed Manufacturers under Patents granted to The International Metal Products Company

Box 731, Middletown, Ohio

The trade mark ARMCO carries the assurance that iron bearing that mark is manufactured by The American Rolling Mill Company, with the skill, intelligence and fidelity associated with its products, and hence can be depended upon to possess in the highest degree the merit claimed for it.

The American Rolling Mill Company
Box 731
Middletown, Ohio

Please send me the Armco Books and tell me who uses

Armco Iron in _____

Name _____

Town _____

R.F.D. _____ State _____

Send to Page Woven Wire Fence Co., Monessen, Pa., for catalog of rust-resisting Armco Fences

FARM BOYS

What are Your Plans For the Future?

Do you intend to run your own farm; to practice the best farm methods; to raise better crops and better stock; to keep your farm in the highest state of fertility; TO MAKE THE FARM PAY? Unless you do, what satisfaction is there in farming? NOW is the time to lay the FOUNDATION of your life's work; to learn something of soils, fertilizers, drainage, plant and animal diseases, insect pests, varieties of grains, roots and fruits, breeds and types of animals, marketing of farm produce, methods of cultivation, carpentry, blacksmithing, etc. Get an insight into the innumerable problems that every farmer has to face and should know about.

HOW?

By taking the Two-year Course at

THE ONTARIO AGRICULTURAL COLLEGE GUELPH

This course is designed to meet the requirements of our country boys.

You can come to College for two years.

BECAUSE ordinary public school education is sufficient for admission to the course.

The College year begins September 17th, and ends April 15th, so that boys from the farm may return to their homes to assist in the spring and summer work. During this period many boys can earn sufficient funds to defray College expenses for the following year.

Tuition fee for Ontario students is only \$20.00 per year, while board and room in residence is obtained at the rate of \$4.00 per week.

A portion of the cost during the first year is defrayed by work on the farm and at the various departments of the College.

N. B.—If you wish to continue to the work of the Third and Fourth Years for the degree of B. S. A., you are not required to have matriculation standing. Students are accepted for this course if their standing on Second Year examinations warrants it.

College Opens September 17

For further particulars write for regular course calendar

G. C. CREELMAN, B.S.A., LL.D., President

GRAND PRIZE PANAMA-PACIFIC EXPOSITION

Awarded to

DE LAVAL CREAM SEPARATORS

as the Highest Award has been at every International Exposition since the invention of the Centrifugal Cream Separator in 1878.

And likewise as at all previous expositions, all higher dairy product awards at San Francisco have been made to users of the De Laval machines.

DE LAVAL DAIRY SUPPLY CO., Ltd.

MONTREAL PETERBORO WINNIPEG VANCOUVER
50,000 BRANCHES AND LOCAL AGENCIES THE WORLD OVER

CAN YOU IGNORE FACTS?

Do you know that out of 1,000 physically perfect men 35 years old—men who have passed the severest kind of medical examination—5 die within one year and 42 within five years?

This statement is an established fact.

You have an equal chance with each of the other 999 of being one of the 5 or one of the 42.

Can you afford to take this chance? Should you not do everything possible to protect your family, to safeguard your estate, against accident or the ravages of disease?

The only sure way to accomplish this is to provide for a heavy payment at your death—to insure your life in other words.

Negligence and procrastination on your part may result in much hardship or even misery for those you leave behind—the home you have struggled so hard to pay for may be swallowed up by the mortgage.

A suitable insurance policy would absolutely prevent anything of this kind.

Insurance is your most urgent necessity without the shadow of a doubt, and the

NORTHERN LIFE ASSURANCE CO. OF CANADA

would like to supply your needs. It offers the very highest type of security, and is one of LONDON'S leading financial institutions.

POLICIES of all kinds are sold at rates suited to every purse. The Head Office is in the

DOMINION SAVINGS BUILDING.

Total Assets Over \$2,500,000

When writing advertisers, will you kindly mention "The Farmer's Advocate."

FOUNDED 1866

PRIZE
EXPOSITION

AVAIL
AM
ATORS

has been at every
since the invention
Separator in 1878.

previous expositions,
award at San
made to users of
machines.

SUPPLY CO., Ltd.
WINNIPEG VANCOUVER
AGENCIES THE WORLD OVER

YOU
FACTS?

0,000 physically perfect men
passed the severest kind of
thin one year and 42 within

shed fact.
with each of the other 999
the 42.
chance? Should you not do
your family, to safeguard
the ravages of disease?
nplish this is to provide for
th—to insure your life in

tion on your part may rem-
isery for those you leave
ruggled so hard to pay for
mortgage.
would absolutely prevent

rgent necessity without the

RN LIFE
OF CANADA

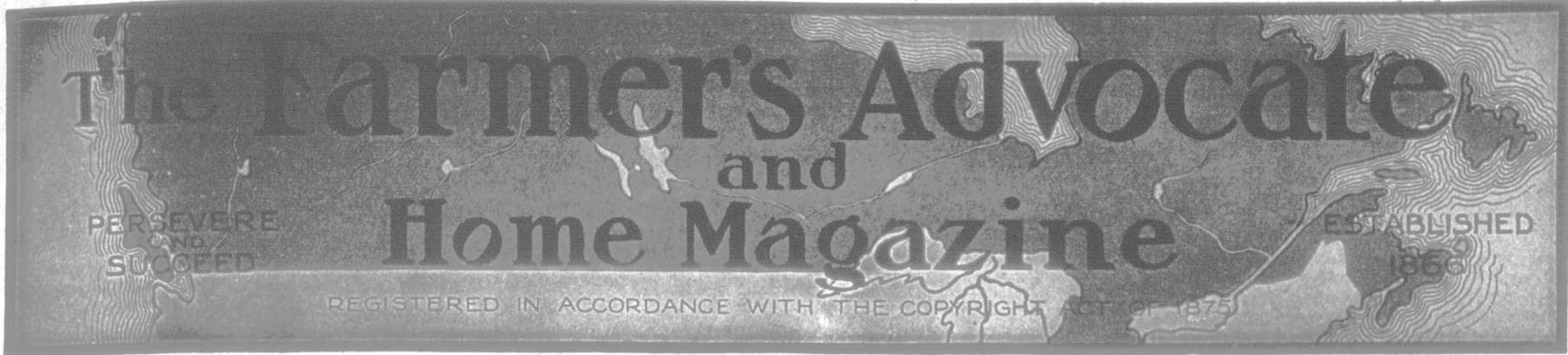
s. It offers the very high-
ne of LONDON'S leading

old at rates suited to every
he

GS BUILDING.

er \$2,500,000

ention "The Farmer's Advocate"



Vol. L.

LONDON, ONTARIO, SEPTEMBER 2, 1915.

No. 1197

EDITORIAL.

Meet us at the Fair.

This is truly a patriotic year.

New Ontario is a big country ready for the settler. Read about it in this issue.

It is late in the season, but a weedy root field should be cleaned if at all possible.

That field of rank, poorly-flowered clover may be worth more for hay than for seed.

If you are at the Exhibition study the stock; if not study the types depicted in this issue.

With the call for men for the army and for the farm, valid excuses for unemployment must be difficult to find.

Can anyone outside of a dyed-in-the-wool politician produce any solid reason why an election should be held this fall?

Attending the fair is a holiday, but time and attention enough should be given that something of real value is carried away.

Do not let your patriotic spirit vanish with the subsiding of the cheering and hat-swinging at the fair. Everyone can continue to help in some way.

Some of the Eastern buyers of horses for army purposes seem to have been working on the basis of wearing out the old, the halt and the blind first.

We draw the attention of all our readers to the special articles dealing with timely topics in this, our annual Exhibition Number. Read every one of them.

We are pleased to note that the live-stock entry at Toronto is larger. Our live-stock breeders play an important role in the destiny of Canadian agriculture.

Uncle Bije says instead of rushing hot foot for the doctor to cure him when he gets down sick he engages a capable family physician to keep him well.

The people have shown that they are not in favor of mergers. Evidently "The Farmer's Advocate's" stand on banking and big business is receiving practical support.

A wet harvest does not mean that after-harvest tillage should be neglected. Plan to conserve moisture for the climate generally goes from one extreme to the other.

Many farmers whose wheat sprouted in the fields were pleased with the information given in our Stock Department last week regarding the feeding value of sprouted wheat.

Let the boy attend the nearest big exhibition and your own county fair as well. He will work better for the rest of the fall, and will think more of farming as an occupation. And let him take his steps.

The Security of the Farm.

In time of crisis the fact is brought out that farming, production of the necessities of life is really the thing which matters most in the economics of the world. When everything is running smoothly and boom times are in evidence everywhere, there is a tendency to forget the farm and all that it stands for and turn all energies toward money making by what then appears to be the easier and quicker route of city employment and urban investment. A change comes when the slump appears. An American magazine, which pays special attention to investment announcements, in a recent issue had no less than two dozen advertisements, some of them full page, and all appealing to those having money to invest to play safe and put it in farm lands and farm mortgages. City and town real estate booming has received a set back. The man with all his money in town lots is having a hard time to make ends meet. The man who chose the safer investment—farm property—is doing as well as, if not better than, ever.

There is another point of safety in the farm, there is always work there for the willing and competent. There is never any need of providing charitable soup kitchens in the country. The farm, properly worked, looks after all those who attend to their duties.

The farmer's business is built on a much better foundation than many city enterprises. There is always a good living in it, and generally a little besides. Dull times and world crises may come and go, but the farm goes on forever. City business may flourish for a time and then dwindle into bankruptcy because of conditions beyond the control of those engaged in it, but the farmer works along and his fields pay his way through it all. All this should be a good lesson to young men. The farm may seem slow, but it is sure and safe. It stands secure through all the ups and downs of finance, and the bulls and bears of Wall Street never make farmers millionaires or paupers. Farm land is the best security always.

Why Thousands Read "The Farmer's Advocate."

If the large clientele of readers could be questioned as to why they read "The Farmer's Advocate" no doubt a great variety of answers would be drawn out, for in their favorite farm paper they find so many features which appeal to readers in a farm home and directly interested in agriculture that each has his and her own reason. It has been truthfully said that experimental work is never done, and such is the case on every farm whether the owner thinks it or not. Things are done the same, or differently, because some practical experience, either by the farmer himself, or his neighbor, or some other farmer, or experiment station has found a certain practice most profitable. It has been demonstrated time and again that individual experience is not enough and that the findings of others are valuable. It is here that "The Farmer's Advocate" proves a helpful medium. Its columns carry information regarding practical experience from one farmer to another—from thousands of farmers to thousands of other farmers. A farm is operated in connection with the paper, and the results of practical experience gained thereon is passed on to readers. The twentieth century farmer cannot farm unto himself. He must know what others are doing, and how they do it. "The Farmer's Advocate" tells him all this in

readable form, and he finds it profitable and pleasant reading.

There is a reason for everything in farming and the most interesting part of the occupation after the "knowing how" has been mastered is the "knowing why." Perhaps this order should be reversed, but at any rate the up-to-date, getting-on farmer must know "why" farming operations are carried on as they are. "The Farmer's Advocate" tells him why.

As time goes on the problems confronting the farmer become increasingly difficult. Farming today is much more of a technical occupation than it was years ago when the land was new and only needed its back scratched to produce abundantly. "The Farmer's Advocate" informs its readers on the technique of agriculture as advancement is made.

The home must be supplied with instructive, and wholesome literature. The Home Magazine Department of "The Farmer's Advocate" is read and prized by men, women and children alike. Its helpful, uplifting effect makes it a favorite in every home to which it goes. There is more in life than work, worry and money.

The farmer and his family must, to keep abreast of the times and make the most of their calling and life generally, read the best periodical literature, particularly that dealing with the things in which they are most interested. "The Farmer's Advocate" is the oldest and best, so they read it.

Over-Worked Royal Commission.

Under fair pretensions the public is led to expect from the almost endless succession of Royal Commissions large and beneficial results which too often do not accrue. In some cases the intentions are well meaning but needless. Others appear to be a worked-up and thinly disguised plan of bestowing compliments and compensations for political ends. The Railway Commission of Canada, a permanent, quasi-judicial body, entirely different, exercises functions evidently beyond the scope of a government department and has justified its existence. There are occasions and circumstances like the extraordinary situation lately developed in Manitoba where a temporary commission with ample powers independent of the administration, is clearly the proper means to bring rascality to light and clean up a bad political mess. The proof of the efficiency of the work of the two commissions in that province was evident when the people went to the polls and throwing old party ties to the winds swept one crowd away and authorized another to complete the job of giving decent government. At Ottawa a parliamentary committee proved futile in handling the gang of war contract grafters and the probe of Sir Chas. Davidson as a commissioner soon resulted in the resignation of an M.P. and the refunding of a lot of loot to the Dominion treasury. When Pasteur evolved his treatment for rabies, at his request the government of France very properly appointed a commission to report upon the method and confirm to the nation and the World his splendid achievement.

What was probably the first Royal Commission on record ended in a disastrous fizzle. Twelve spies were commissioned by Moses to report on the Promised Land which was found rich beyond all conjecture but the courage of ten of them oozed out and precipitated a panic among the people who went back to die on a forty years'

The Farmer's Advocate AND HOME MAGAZINE.

THE LEADING AGRICULTURAL JOURNAL IN THE
DOMINION.

Published weekly by
THE WILLIAM WELD COMPANY (Limited).

JOHN WELD, Manager.

Agents for "The Farmer's Advocate and Home Journal,"
Winnipeg, Man.

1. THE FARMER'S ADVOCATE AND HOME MAGAZINE is published every Thursday.
It is impartial and independent of all cliques and parties, handsomely illustrated with original engravings, and furnishes the most practical, reliable and profitable information for farmers, dairymen, gardeners, stockmen and home-makers, of any publication in Canada.
2. TERMS OF SUBSCRIPTION.—In Canada, England, Ireland, Scotland, Newfoundland and New Zealand, \$1.50 per year in advance; \$2.00 per year when not paid in advance. United States, \$2.50 per year; all other countries, 12s. in advance.
3. ADVERTISING RATES.—Single insertion, 25 cents per line, agate. Contract rates furnished on application.
4. THE FARMER'S ADVOCATE is sent to subscribers until an explicit order is received for its discontinuance. All payments of arrearages must be made as required by law.
5. THE LAW IS, that all subscribers to newspapers are held responsible until all arrearages are paid, and their paper ordered to be discontinued.
6. REMITTANCES should be made direct to us, either by Money Order, Postal Note, Express Order or Registered Letter, which will be at our risk. When made otherwise we will not be responsible.
7. THE DATE ON YOUR LABEL shows to what time your subscription is paid.
8. ANONYMOUS communications will receive no attention. In every case the "Full Name and Post-office Address Must be Given."
9. WHEN A REPLY BY MAIL IS REQUIRED to Urgent Veterinary or Legal Enquiries, \$1.00 must be enclosed.
10. LETTERS intended for publication should be written on one side of the paper only.
11. CHANGE OF ADDRESS.—Subscribers when ordering a change of address should give the old as well as the new P. O. address.
12. WE INVITE FARMERS to write us on any agricultural topic. We are always pleased to receive practical articles or such as we consider valuable we will pay ten cents per inch printed matter. Criticisms of Articles, Suggestions How to Improve "The Farmer's Advocate and Home Magazine," Descriptions of New Grains, Roots or Vegetables not generally known, Particulars of Experiments Tried, or Improved Methods of Cultivation, are each and all welcome. Contributions sent us must not be furnished other papers until after they have appeared in our columns. Rejected matter will be returned on receipt of postage.
13. ADDRESSES OF CORRESPONDENTS ARE CONSIDERED AS CONFIDENTIAL and will not be forwarded.
14. ALL COMMUNICATIONS in reference to any matter connected with this paper should be addressed as below, and not to any individual connected with the paper.

Address—THE FARMER'S ADVOCATE, or
THE WILLIAM WELD COMPANY (Limited),
London, Canada.

tramp in the desert. Under the guise of wanting information some commissions are simply a dodge of politicians to gain time and avoid troublesome issues. When the anti-alcohol movement was gathering strength in this country a Dominion Prohibition Commission was sent out. The result was a dual report. The majority like the ten spies were unfavorable but probably made just about the brand of a report that was wanted. The proposal of some old-time commissions would provoke a smile now-a-days. A gilt-edged tribunal once perambulated Ontario to find out if dehorning was not too painful for the cows and had not better be stopped. The commission to enquire into the state and prospects of Ontario agriculture over thirty years ago gathered a vast storehouse of information of historical use and a guide to the then legislators. In other cases that might be recalled a live officer from a department of agriculture could bring to light just as much knowledge without all the frills and at one-tenth the expense. A good deal of the knowledge reported is often already well known through the press. When the cost of living began to get troublesome because of reasons for which several governments, federal and provincial, were largely responsible, a couple of our most capable publicists were forthwith commissioned to tour the country on a still hunt but the result appears to have fallen into a Rip-Van Winkle sleep from which it may never awaken.

Early in July the outline of another elaborate national commission was announced to promote production in Canada. What is worrying the Canadian farmer now is to handle what he has produced and he might not be helped very much by loading another Royal Commission on his back. In 1910 a Royal Commission on industrial training and technical education began its labors in Canada and accumulated an invaluable fund of

data with carefully worked out recommendations to give the report effect. Unfortunately one government began the undertaking and their successors would not touch it with a forty-foot pole but shoved the volumes into dusty pigeon holes where they will probably lie till the crack of doom.

Seriously, this Royal Commissions idea, usually on "behalf of the farmer," has been worked to death and as the country comes face to face with the appalling responsibilities and burdens of the war it is about time to initiate economies in government which public men are now recommending the common people to practice. In federal affairs we have ministers and deputies drawing stipends amounting to about \$200,000 annually with assistants as thick as horn licks in August. Suppose they tackle the work themselves instead of turning it over to Royal Commissioners with so much official fireworks. Then if political partisans will cease setting the people by the ears this country will probably weather the gale.

Pasteur Versus Kaiser.

Louis Pasteur, Kaiser Wilhelm II.—These two men are cited representing humanity at its best and at its worst. Benefactor and Destroyer! One becomes immortal as the alleviator of suffering and a savior from loss, whose spiritual life was no less admirable than his scientific career. The other has drenched the world with blood and agony. These two types are the product of two distinct ideas of life which as worked out either ennoble or curse. The Kaiser need not be held wholly responsible for the World conflict, other war lords and his armament makers are relatively culpable. Science and philosophy have been harnessed to the hideous car. The world now sees in German ethics a mere shell with everything cast out that will not warrant force and fraud. When Prussia crushed France in 1870, Pasteur resolved to exalt his country in beneficent science. This would be his revenge—a noble triumph and he achieved it. Out of the labors of this peerless Frenchman grew the diphtheria-antitoxin which up to a year ago had saved over a quarter of a million lives. As an achievement, contrast this with all the past year's destruction in Europe and the butchery of Lusitania innocents. Pasteur gave the world the treatment for rabies, officially described as "magnificent," "highly honorable to French science and conferring upon him a new title to the gratitude of humanity." By his discovery of the cause and course of the silk worm disease he rescued that great industry from ruin and brought it back to prosperity. His work with anthrax, chicken cholera and rouget (swine disease) gave results of incalculable benefit to farmers and stockmen the World over. To Pasteur more than to anyone else is due the advancement of the principles of veterinary science and the levelling up of the study and treatment of animal diseases with the study of human diseases. All nations are to-day grateful to this eminent savant over whose vault in France are four great white angels, Faith, Hope, Charity and Science, a tribute to one who brought blessings to mankind. Though dead, Pasteur lives as a liberator; Kaiserism would enshackle all in a deadly bond of blood and iron. After which model will the young men of Canada pattern their careers.—Pasteur or Kaiser?

A Cold Water Douche.

It has been said that you can tell a Harvard University man anywhere you see him but you cannot tell him anything else. This sort of jibe is occasionally levelled at the school man, but it is facetious rather than serious. Thinking folk know that colleges worthy the name do not instil inflated notions of mere learning without proved capacity and character. It was likely a college man who remarked "We are not infallible, not even the youngest of us." At this time of year as young people of the farm here and there set out for the schools it is best to give them a heartening word and later on when they return remember to be sparing with the cold water douche. If used at all save it for heady blusters. The chilling experience of stern life will come soon enough. Nothing is more discouraging than cheap sneers at youthful ardor. If the young man would achieve something new and worth while on the farm let him have a fair and encouraging trial. We have youth but once. The trick is to lengthen it out through life. Apart from the ways of right living, this will be best accomplished by having in harness a safe and going team called Enthusiasm and Experience. Preserve the youthful outlook and the boyish heart and some day you may be able to say: "I'm the youngest old man in the county."

The Future of Canadian Agriculture.

AFTER THE WAR—WHAT?

By Dr. G. C. Creelman, B.S.A., L.L.D.

There is food for thought in the plain fact that while the British Empire has been at War spending millions every day Canada, perhaps her most important possession, has scarcely felt the "pinch" at all. Merchants in many towns inform me that business is better than last year, and that even real estate transactions are going on, not as usual—for real money is being used in transfer. Our banks are sound and have plenty of money. No sane person doubts for a moment that the Empire will win out in the long run, and therefore we must think of its future.

OUR NEED. When things have settled down again Canada will need four things at least.—

(1) CAPITAL—Our undeveloped natural resources will surely attract money. Our cheap lands, great waterways, healthy climate, timber resources, and manufacturing possibilities, will bring to our shores men of wealth. To me one of the most astounding things about this War is the tremendous financial resources of Great Britain. With a daily expenditure of fifteen millions of dollars she still has money to loan to her allied nations. This wealth will later turn to new countries for reinvestment and ours should prove an attractive field.

(2) IMMIGRATION—As Europe supplies the great bulk of our newcomers, then easy transportation facilities and cheap rates give us a very great advantage. Australia, New Zealand, South Africa are all handicapped in this regard, and when you add the natural resources enumerated above, Canada certainly stands out in the limelight. We will get immigration. Perhaps we may learn something during this lull in immigration affairs that will help us to assimilate our foreign emigrants better and quicker. We easy-going Canadians are apt to forget that while "Canada for the Canadians" is splendid in sentiment and theory yet we are becoming more and more dependent on foreign labor. Let each of us stop now and think of our duty towards the individual foreigner admitted to Canada by our Immigration Authorities. If they are to become as good Canadians as our fathers did, then we must quit calling them "Dagos" and "tramps" and instead extend a sympathetic hand of real friendship, teach them our way of living and farming, and try as early as possible to make them feel so much at home that they will one and all desire to learn our ways and our language and become important assets in our body politic.

(3) MARKETS—This question must receive our very best attention. Our Governments appreciate the importance of an economic study of markets. The Ontario Department of Agriculture has a Bureau of Markets which is gathering statistics and studying the question inside the Province, while the Dominion Government has just appointed a "Market Commission" with a wide scope. We may soon expect, therefore, to know at least the facts regarding our present limitations and our need for better market facilities. It is a crying shame that our own West is not economically supplied with fruit from the Eastern Provinces. It is a crime that thousands and thousands of barrels of good apples are allowed to rot on the ground in Ontario nearly every year because there is no market for them.

(4) CO-OPERATION—I do not propose to go into a scientific or exhaustive economic discussion on the subject. I do hope, however, that the awful war will bring us closer together; as farmers, in the best interests of everybody. We seem to be waiting for all the neighbors to get into the same frame of mind before we put into actual practice what we nearly all believe.

WHAT 20 MEN CAN DO.—I believe that 20 men in any farming community, if they would put their heads together could do almost anything. They could:—

(1) Unite the different churches in the neighborhood and have one meeting-place with a strong, virile, forceful, influential Preacher in charge.

(2) They could build a mile of first-class road in every school section.

(3) They could get Bank credit for any reasonable amount of money for developing their section.

(4) They could handle the entire fruit crop of the district.

(5) They could explain the drainage act, and by example and precept, encourage the draining of all low land in the neighborhood.

(6) They could stand behind buying and selling organizations and so ensure "fair dealings."

(7) They could back up the District Representatives and demand short courses in the study of agriculture, demonstrations of spraying, school fairs, school gardens and a thousand other good things.

(8) They could build up a new sentiment in school affairs, engage the best teachers and after fulfilling the requirements of the Department of Education, could have every boy taught the rudiments of

of Canadian Agriculture.

FOR THE WAR—WHAT?

C. Creelman, B.S.A., L.L.B.

for thought in the plain fact British Empire has been at War every day Canada, perhaps her possession, has scarcely felt the Merchants in many towns in business is better than last year, real estate transactions are going for real money is being used in banks are sound and have plenty. One person doubts for a moment will win out in the long run, must think of its future.

When things have settled down will need four things at least.—

Our undeveloped natural resources attract money. Our cheap railways, healthy climate, timber manufacturing possibilities, will draw men of wealth. To me one of the things about this War is the financial resources of Great Britain. The daily expenditure of fifteen million dollars still has money to loan to us. This wealth will later turn to our advantage for reinvestment and ours should be a wide field.

As Europe supplies the market for newcomers, then easy transportation and cheap rates give us a very

Australia, New Zealand, South Africa and the West Indies are handicapped in this regard, and our natural resources enumerated certainly stands out in the line of immigration. Perhaps we may during this lull in immigration help us to assimilate our foreign population and quicker. We easy-going people must not forget that while "Canada" is splendid in sentiment and are becoming more and more dependent on foreign labor. Let each of us stop and think of our duty towards the individual who comes to Canada by our Immigration they are to become as good as our fathers did, then we must quit our "tramps" and "tramps" and instead of a synthetic hand of real friendship, a way of living and farming, and make it possible to make them feel so that they will one and all desire to stay and our language and become part of our body politic.

This question must receive attention. Our Governments appearance of an economic study of the Ontario Department of Agriculture and Markets which is gathering information regarding the question inside the Dominion Government has just set up a "Market Commission" with a wide scope, therefore, to know our present limitations regarding our present limitations for better market facilities. It is a crime that thousands and thousands of good apples are allowed to rot in Ontario nearly every year because there is no market for them.

I do not propose to go into an exhaustive economic discussion but I do hope, however, that the Government will bring us closer together, as the best interests of everybody. We must get for all the neighbors to get some of mind before we put into effect what we nearly all believe.

WHAT CAN WE DO.—I believe that 20 million people, if they would work together could do almost anything.

different churches in the neighborhood one meeting-place with a powerful, influential Preacher in

to build a mile of first-class road

to get Bank credit for any reasonable amount of money for developing their

to handle the entire fruit crop of

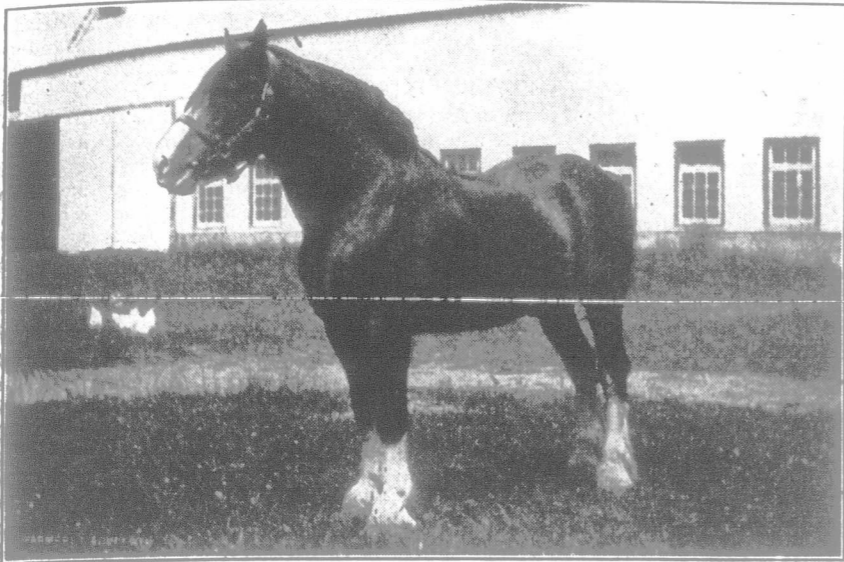
to explain the drainage act, and to precept, 'encourage the draining of the neighborhood.

to stand behind buying and selling and so ensure "fair dealings."

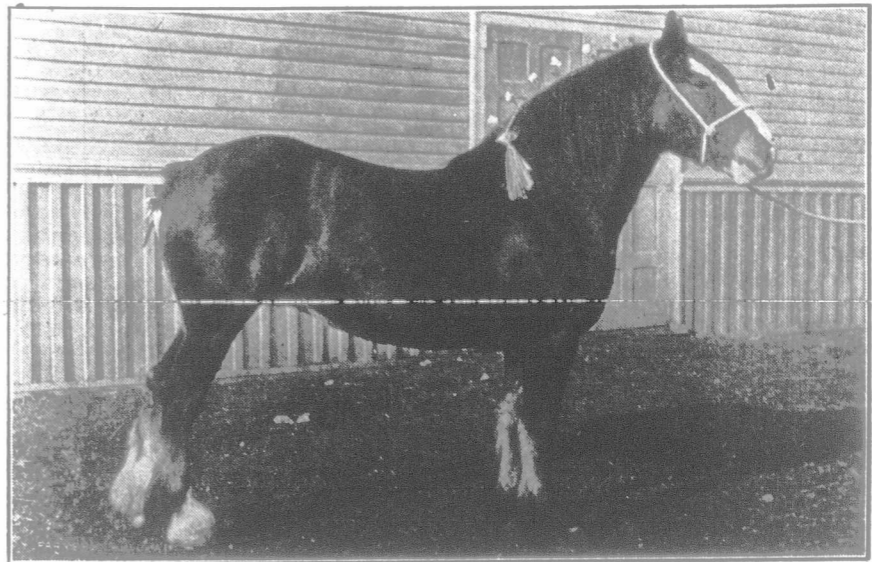
to back up the District Representative and short courses in the study of the various strata of spraying, school buildings and a thousand other good

to build up a new sentiment in the neighborhood the best teachers and after the efforts of the Department of Education have every boy taught the rudiments

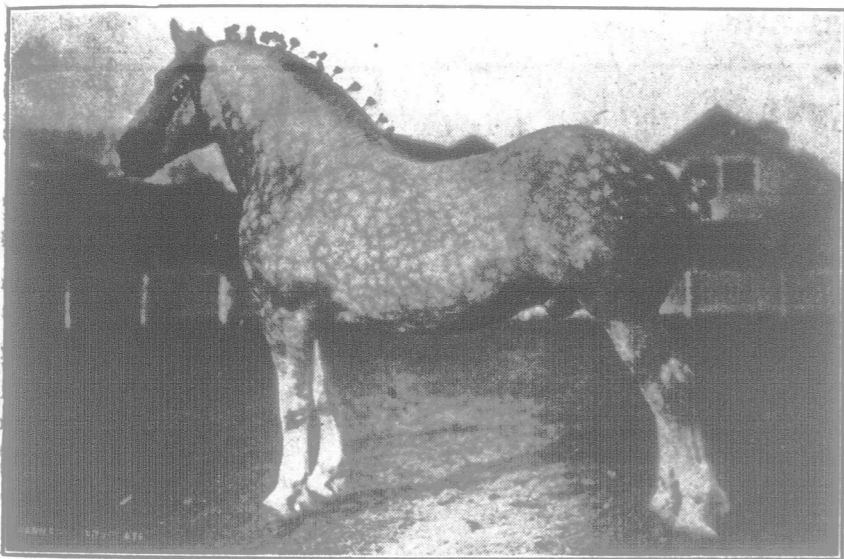
Some Former Champions.



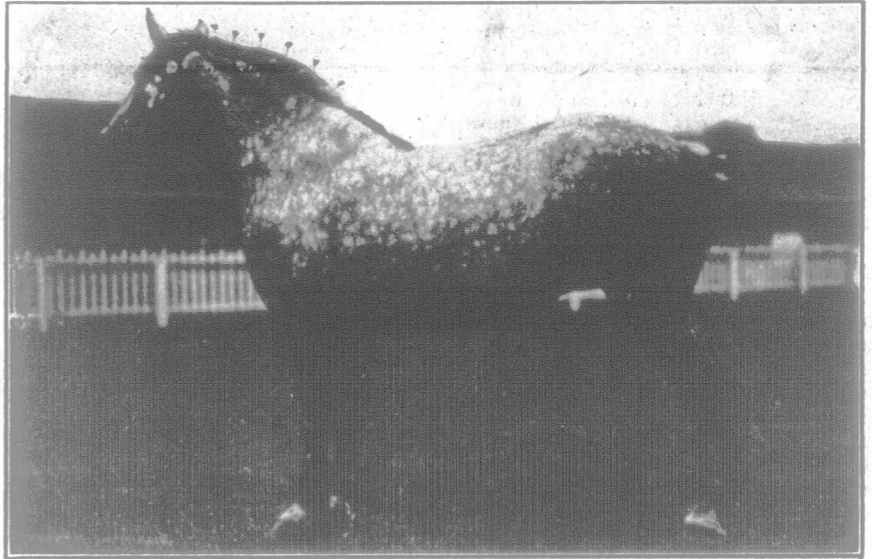
Sir Spencer.



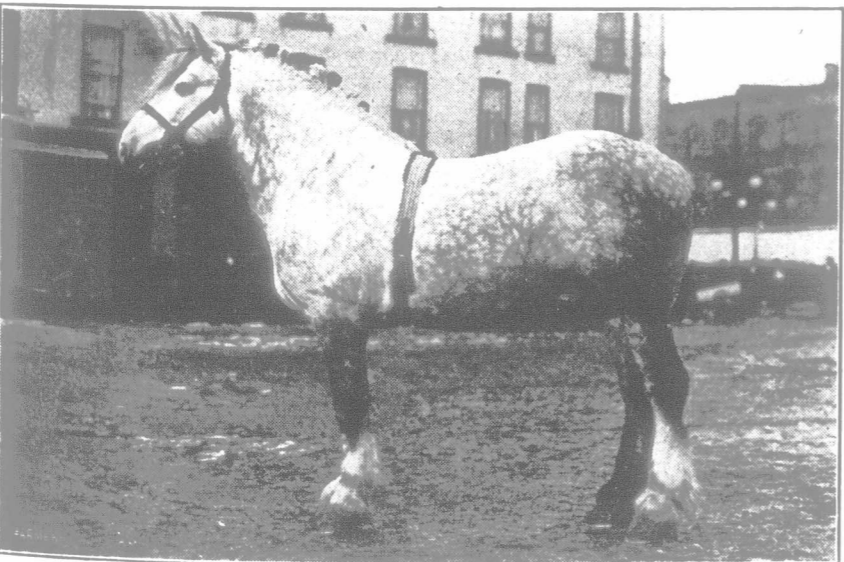
Castle Belle.



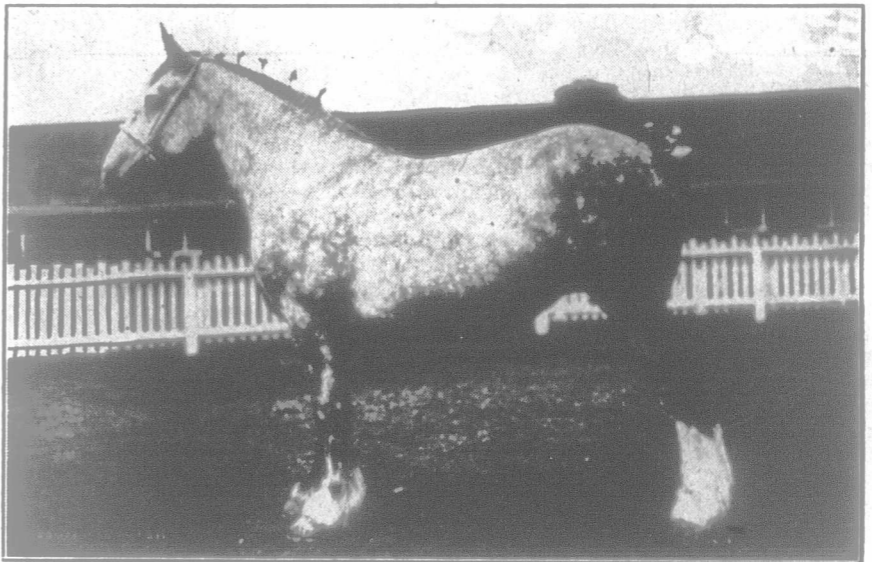
Ichnobate.



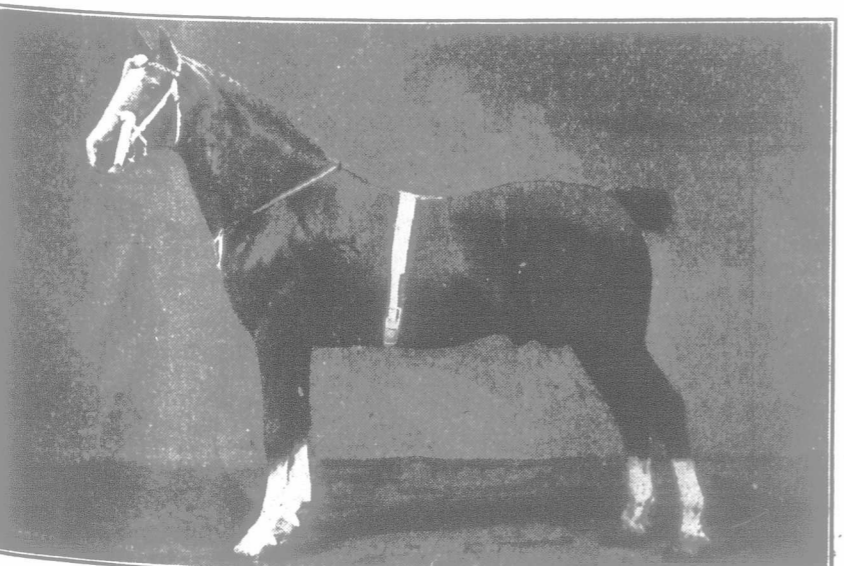
Kanaille.



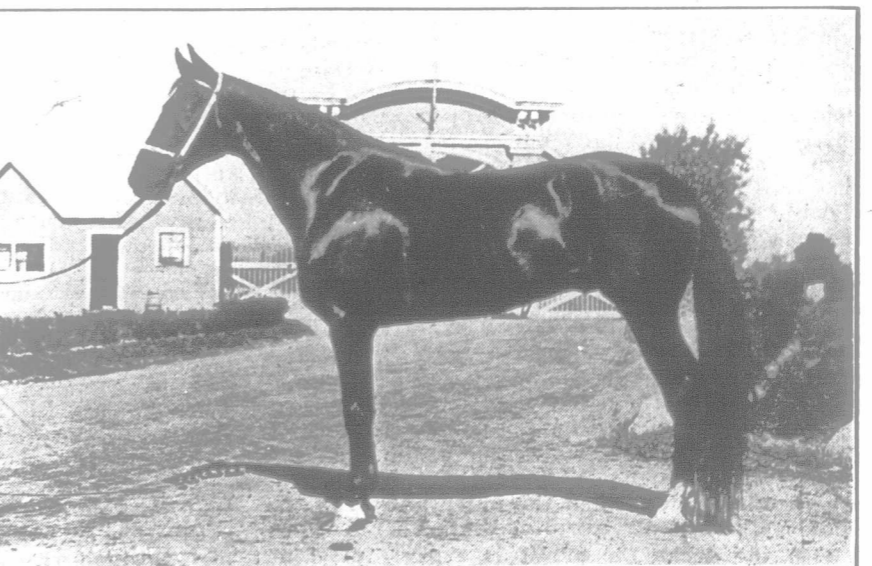
Proportion.



Rokeby Halo.



Rosador.



Uhlan.

ments of agriculture, and every girl the practice of Household science.

Oh! for twenty good men in every section in Ontario, meeting every two weeks and working together. They could control the Political, Religious, Economic and Educational affairs and under such conditions, weeds and insects would be fought intelligently and to a standstill; only pure-bred live stock or stock of outstanding merit would be tolerated. "A fair square deal for every man" should be the watchword, and a social awakening would bring farmers to a sense of their power and influence, that would shake our whole social fabric.

My prayer is, therefore, that through the suffering and tribulations of these most anxious days we may all be brought to see the folly of each farmer trying to stand alone, and the many many benefits that may arise from standing back to back forgetting local jealousies and former differences and looking forward to the grander Province in that greater Canada that is to be.

Nature's Diary.

A. B. Klugh, M.A.

It is now moulting time for a great many of our birds. Some species moult in July, and some in September, but the great majority renew their plumage in August.

The process of moulting is a very interesting one, and one which varies much among the different families of birds. All birds undergo one complete moult in the late summer or early autumn each year, but a large number of species also have partial moults at other times.

In the great majority of our birds the feather loss at the time of the moult is so compensated for by feather gain that they do not lose either the power of flight or the protection of their plumage. The plan on which a moult proceeds is a perfectly definite one. Old feathers or rows of feathers tend to remain until the new feathers adjacent have matured sufficiently to assume their function, when the old ones fall out and their places are taken by the new ones which develop from the same papillae. This systematic replacement of feathers shows most plainly in the wings where not only do the flight-feathers fall out one after another in definite sequence and almost synchronously from each wing, but the greater coverts are regularly replaced before the fall of the secondaries beneath them, and the under wing coverts are usually replaced after the moult of the upper surface of the wings is completed. On the body the protective sequence is less obvious, but the moult regularly begins at fairly definite points in the feather tracts and radiates from them in such a manner that the outer rows of feathers where the tracts are widest are the last to be replaced. To understand the moult as it occurs on the body one must study the way in which feathers grow on a bird. Though a bird appears to be feathered all over, we find on careful examination that the feathers really grow only on definite tracts, and that between these tracts are bare spaces which are covered by the feathers which overlap from the feather tracts. There is for instance a feather tract down the middle of the back and the feathers of this tract overhang the sides of the back, there is another tract on each side of the breast, and the feathers which grow on it overlap the centre of the breast. This is the reason why a bird appears to be moulting at irregular spots all over, because moult starts at the same time at the centre of each of the tracts.

In most of our small birds, such as the Sparrows, Finches, Buntings, Vireos, Warblers, etc., the longest quill-feathers of the wings, (known as the primaries) are nine in number. At the beginning of the moult the ninth primary is the first to fall out, and this feather falls from each wing at the same time. As soon as this primary falls the follicle or envelope containing the new-forming feather pushes into view, often reaching one-quarter the length of the old feather before the feather itself breaks from the apex of the sheath. Before this has happened the next primary (the eighth) falls out, by the time that the next adjacent primary (the seventh) falls the ninth is about half grown. Thus the moult of the main flight-feathers proceeds, so that at no time is a gap left of more than one or two whole feathers and one or two partially grown, and consequently the bird is but little hampered in its flight. The moult of the primaries proceeding thus slowly occupies from a month to six weeks. At about the time that the fifth primary is lost the moult of the main tail-feathers begins. They are moulted in pairs, beginning with the inner pair, and followed by the feathers next adjacent on each side. The moult of the tail-feathers is, unlike that of the main wing-feathers, very rapid, so that when the outer pair falls the middle pair are only about half grown.

With the ducks the moult is entirely different from what it is among the land birds. All the flight-feathers are moulted at the same time, so that for a time they can swim and dive, but are

incapable of flight as a turtle. They pass their critical period in some secluded pond with margins of high reeds.

In connection with the moulting of birds a point of much interest which comes up is the way in which some species, in fact most species, change the color of some parts of their plumage without a moult. It has been frequently asserted that the feathers themselves become re-pigmented. But we know that a fully-developed feather is a dead structure, and that the only change which can take place in its color is in the nature of loss of color or fading, so that such brightening as takes place cannot be due to re-pigmentation. What really occurs is that the feathers when they develop have edgings of a different color from that of the main portion of the feather, and that as these edges only show the portion of the plumage on which such feathers are found appears to be the color of the edgings. In course of time these edges wear off, due to abrasion against other objects and against other feathers, and reveal the main body of the feather. Thus many birds which appear dull-colored in the fall become much brighter by spring entirely because of the loss of the dull-colored edges of the feathers.



At the Fair.

Saved to the Farm.

One of the greatest works that a District Representative of the Department of Agriculture can do is to educate and encourage boys raised on the farm to stay on the land and make farming their life work. There recently came to our notice the case of a particularly bright farm boy who had become, as most boys do at a certain age, rather unsettled as to his future. He was raised on a good farm, knew farm work well because he had grown up with it, but no particular interest being displayed and efforts put forth to keep him on the farm, he decided to try banking for a while. He spent one year as a clerk in a bank when a District Representative came to his home county and began his work in interesting the boys in farming and live stock. A Short Course was put on one winter in his home town and the boy attended. He became interested in live stock, and for a young man, a fairly good judge of the different classes and breeds of stock kept in this country. From advice given at the Short Course he became interested in seed selection work, and at the present time he is back on the farm with all the old inclinations toward city employment dispelled and thoroughly convinced that farming is the best life work for him. Besides this, he learned to do a little public speaking through the Short Course work, and has since accomplished very good literary society work in his neighborhood. He has developed into a debater of some force and was invited, dur-

ing the past winter, to no less than three outside points to take part in debates.

Among the young men he is now one of the best live-stock judges in his section of the country. He is producing more and better seed through the inspiration received at the Short Course; but, best of all, he is a farmer and not a bank clerk. It is work like this that will make the District Representative solid in his community and indispensable in his county. His efforts are not so much in the direction of a return to the land as in saving the boys to the farm. Canada cannot afford to allow her rural-raised young men all to drift cityward when they would be of far more use to themselves and to their country on the farm. We mention this one case simply to prove to any doubters that the District Representative can do and is doing a profitable work in this particular, and that, with the young men alone, the work is invaluable. Every such boy saved to the farm means increased production, more satisfied farmers, a bigger, better and richer Canada. What are you doing to encourage the farm boy? Has he a call, a pig, a lamb or a colt of his own? Has he a few bred-to-lay chickens? Has he a little experimental grain or potato plot upon which he is improving the seed? If not, why not? If the boy is only a chore boy, he will never make a satisfied farmer. Fathers and mothers can help. School teachers can help and District Representatives do help. Which would you rather your boy would be, a good farmer or a bank clerk?

THE HORSE.

How to Show Horses.

By "Whip"

The exhibition of high-class horses at "high-class" horse shows is practically a business in itself, and is conducted, in most cases, by those who thoroughly understand the game, hence to exhibitors of this class we do not presume to dictate, as they are better posted on "the tricks of the trade" than we are, but a few hints to the ordinary horse owner, farmer or farmer's boy who exhibits only at small fairs may be seasonable.

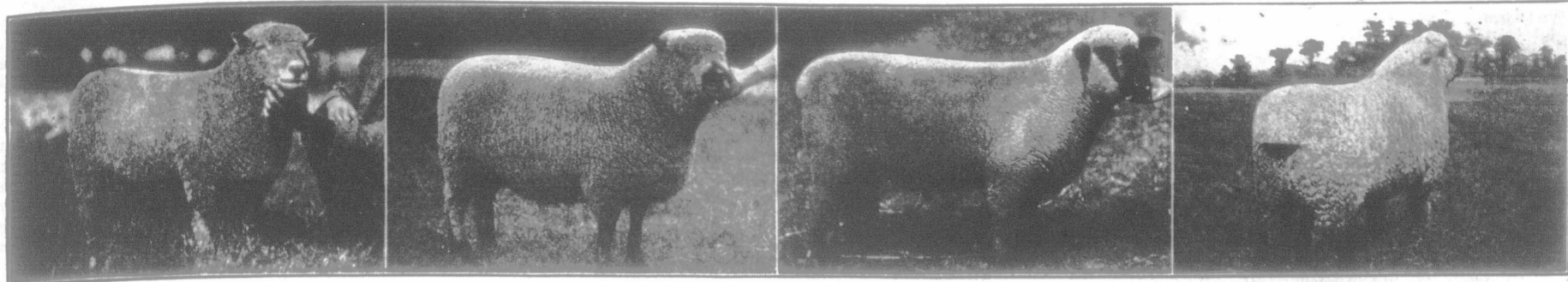
It would probably have been more correct to have entitled this article "How to Prepare Horses for Show Purposes." The showing of a horse is comparatively an easy matter if he has been properly prepared. Horses of all classes should receive sufficient education before being taken into the showing to enable them to perform the functions demanded from animals of their class in such a manner as to reflect credit upon themselves and their attendants. The exhibitor should always remember that the show-ring is not the place to train or educate his exhibit whether he is to be shown in hand, in harness or in saddle. Good manners on the part of both the animal and the exhibitor are necessary for success. The judge knows (or is supposed to know) how a horse of any class should act on the halter, in harness or under saddle, and other things being equal, the animal that most nearly comes up to his ideal in this respect is the one that will win the best place.

Unfortunately there is often seen an evident want of training or education of any kind, and this is especially noticed in the classes of young horses shown on the halter. Many exhibitors evidently think that so long as their colts can be got into the ring in any way it is all right and nothing further should be asked for. They are not even taught to stand to allow the judge to look them over carefully, and when the attendant is asked to walk or trot his entry, the colt often refuses to move without urging (often rather forcibly) from behind, or will commence to rear and plunge in all directions, or in some cases will run around in a circle, the extent of which depends upon the length of the lead rein, but positively refuses to go in a straight line either from or toward the judge at either a walk or a trot. Others go sideways or backwards, while some can with difficulty be induced to move at all. This is provoking to the judge, aggravating to the audience, and disappointing to the exhibitor, especially in a case where his entry is really a better animal than the better-fitted and better-trained colt that wins. The judge in such cases is often very severely criticised and credited with either incompetency or dishonesty. He knows that the awards have not gone to the animals that under more favorable conditions would probably have won, but he is also aware of the fact that a little trouble is necessary to fit and train a colt for exhibition and that each animal must show his action and gaits to enable any person to judge correctly of his relative qualities. He also should thoroughly recognize the fact that his judgment of the animals before him must be influenced by what they are at the time, not what they probably would be under different conditions. The general appearance of the unfitted and untrained colt may indicate that if fitted and trained he would be a better animal

FOUNDED 1866

Former Champions in Beef and Sheep.

...inter, to no less than three out-
 ...take part in debates.
 ...young men he is now one of the
 ...judges in his section of the coun-
 ...producing more and better seed
 ...inspiration received at the Short
 ...est of all, he is a farmer and not
 ...it is work like this that will
 ...strict Representative solid in his
 ...indispensable in his county. His
 ...so much in the direction of a re-
 ...nd as in saving the boys to the
 ...cannot afford to allow her rural-
 ...en all to drift cityward when they
 ...r more use to themselves and to
 ...n the farm. We mention this one
 ...prove to any doubters that the
 ...tentative can do and is doing a
 ...in this particular, and that, with
 ...n alone, the work is invaluable.
 ...y saved to the farm means in-
 ...ion, more satisfied farmers, a big-
 ...richer Canada. What are you do-
 ...re the farm boy? Has he a call,
 ...or a colt of his own? Has he a
 ...chickens? Has he a little experi-
 ...potato plot upon which he is im-
 ...nd? If not, why not? If the
 ...chore boy, he will never make a
 ...Fathers and mothers can help.
 ...can help and District Representa-
 ...Which would you rather your
 ...good farmer or a bank clerk?

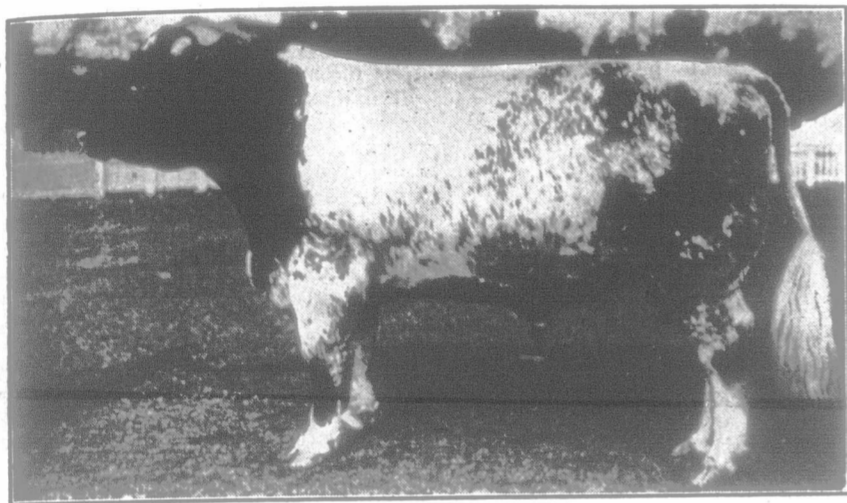


Southdown.

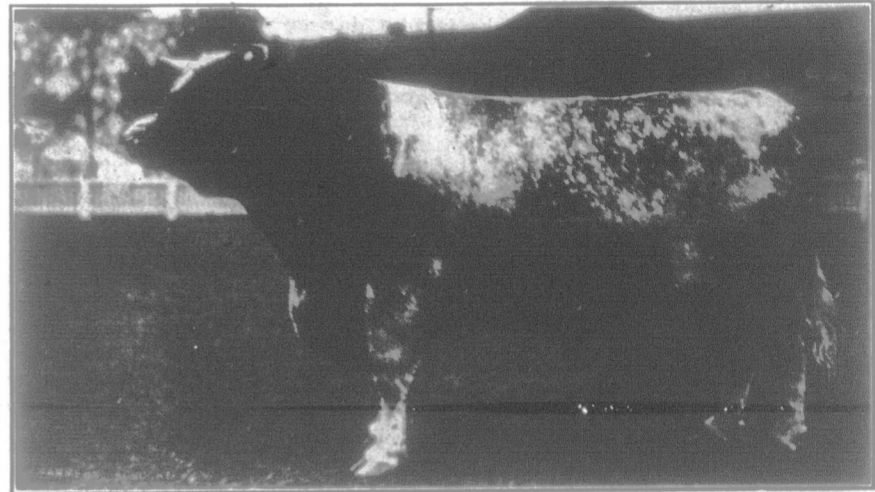
Shropshire.

Hampshire.

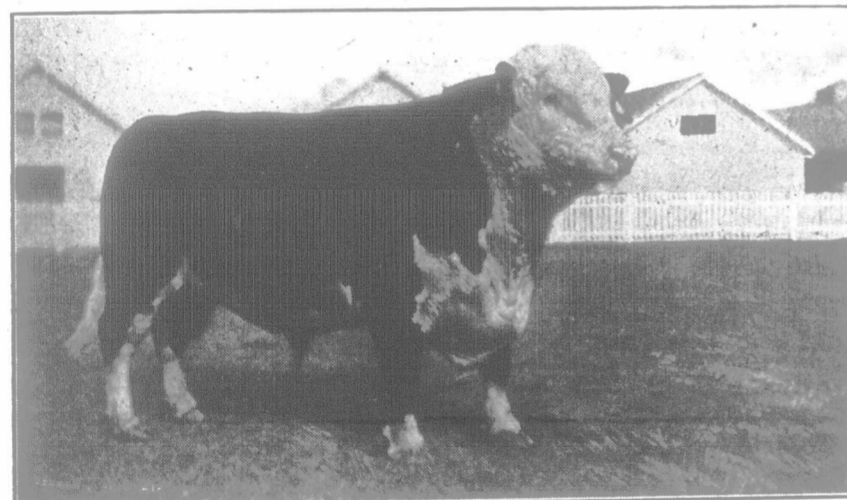
Oxford.



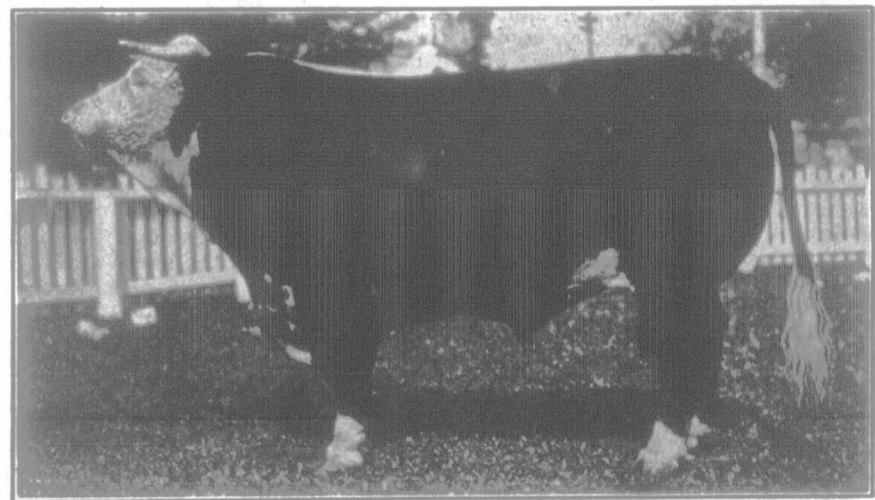
Gainford Marquis.



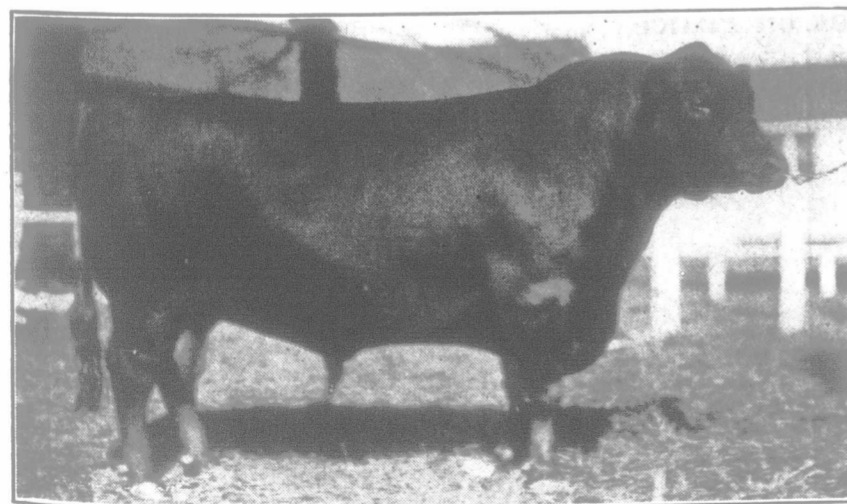
Meadow King.



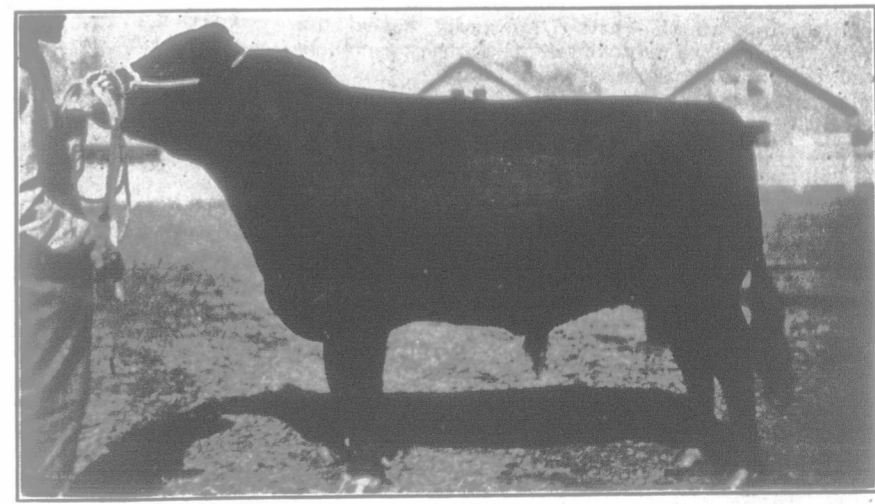
Bonnie Brae 21st.



Refner.



Black Abbot Prince.



An Angus Winner in 1913.



Cotswold.

Leicester.

Lincoln.

Dorset Horn.

THE HORSE.

How to Show Horses.

By "Whip"
 ...on of high-class horses at "high-
 ...ows is practically a business in
 ...nducted, in most cases, by those
 ...y understand the game, hence to
 ...his class we do not presume to
 ...are better posted on "the tricks"
 ...han we are, but a few hints to
 ...rse owner, farmer or farmer's boy
 ...ly at small fairs may be reason-
 ...bably have been more correct to
 ...is article "How to Prepare Horses
 ...ses." The showing of a horse is
 ...an easy matter if he has been
 ...d. Horses of all classes should
 ...education before being taken into
 ...o enable them to perform the
 ...ded from animals of their class in
 ...as to reflect credit upon them-
 ...attendants. The exhibitor should
 ...r that the show-ring is not the
 ...r educate his exhibit whether he
 ...in hand, in harness or in saddle.
 ...n the part of both the animal and
 ...e necessary for success. The judge
 ...pposed to know) how a horse of
 ...act on the halter, in harness or
 ...nd other things being equal, the
 ...st nearly comes up to his ideal
 ...s the one that will win the best
 ...there is often seen an evident
 ...g or education of any kind, and
 ...noticed in the classes of young
 ...on the halter. Many exhibitors
 ...that so long as their colts can be
 ...g in any way it is all right and
 ...should be asked for. They are not
 ...stand to allow the judge to look
 ...ully, and when the attendant is
 ...or trot his entry, the colt often
 ...e without urging (often rather
 ...hind, or will commence to rear
 ...in all directions, or in some cases
 ...in a circle, the extent of which
 ...length of the lead rein, but
 ...to go in a straight line either
 ...the judge at either a walk or a
 ...sideways or backwards, while
 ...difficulty he induced to move at
 ...voking to the judge, aggravating
 ...and disappointing to the exhibi-
 ...a case where his entry is really
 ...than the better-fitted and better-
 ...wins. The judge in such cases
 ...severely criticised and credited
 ...ompetency or dishonesty. He
 ...awards have not gone to the
 ...nder more favorable conditions
 ...have won, but he is also aware
 ...a little trouble is necessary to
 ...olt for exhibition and that each
 ...w his action and gaits to enable
 ...judge correctly of his relative
 ...also should thoroughly recognize
 ...judgment of the animals before
 ...uenced by what they are at the
 ...they probably would be under
 ...ms. The general appearance of
 ...untrained colt may indicate that
 ...ned he would be a better animal

and have better action than those that he selects for the awards. At the same time the colt is neither fitted nor trained, and he (the judge) also knows that a colt of good conformation, and all indications of showing good action is sometimes a great disappointment when moved, and as he is judging entirely by what he sees, not from what he probably would see under different conditions, he is practically compelled to give the prizes to the colts that show what they can do. Then, again, the exhibitor who has spent time and money in training and fitting his exhibit so that he may appear at his best before the judge, deserves some recognition over him who has taken no pains or expense to train his colt, often simply bringing his colts direct from the pasture field to the show ground. Such an exhibitor takes no pride in his horses, but simply exhibits for the money he may win, and his winnings seldom reflect glory upon either himself or the exhibition. Even sucking colts should be taught to lead and stand well before being taken into the ring. When this is done there is less danger of accidents, it gives the judge a much better opportunity to judge correctly, and the exhibit a better opportunity to show just how good it is. It will be noticed in this class that the colts that are trained to the halter generally win over those that are running loose. In horses of all ages and all classes action is a most important factor, and in order that a judge may be able to correctly judge action he must see the animal go from him and come towards him in a straight line at any gait he may ask for. Hence the person who expects to show colts or horses of any age on the line should teach them to go well in this way before taking them to the exhibition.

Colts or older animals of the heavy classes should be taught to stand well to attention and allow themselves to be handled and should be taught to walk and trot well. Of course where convenient it is well to have two or more colts take lessons at the same time in order to get them accustomed to company, but this is not always expedient and we notice that a colt that has been taught to perform well when alone seldom causes much trouble in company. The too common practice of teaching a colt to go around in a circle is no use for show, or we might say, for any other purpose. He should be taught to go straight, at any gait required.

Colts of the lighter classes should of course be taught to show the peculiarity of action demanded in the class to as great an extent as possible. Especially in the heavy harness or carriage class shoeing helps action, and it may often be noticed that the colts that are shod win over those that are not, even though their general appearance does not indicate that they should.

In fitting and training horses to show in harness or saddle the same remarks apply to the training and fitting before the day of the show in order that when the animal or animals are taken before the judge in the ring he or they may be able to show the very best that is in them. In the heavy classes, in either single or double harness a good walker is essential, hence they should be taught to walk well and to go at a slow trot, to stand well and back well. Many horses that look well when standing (probably out-look all others in the ring) have such a poor way of going at all gaits (in many cases due largely to want of education) that they must be placed behind their competitors.

Proper classification of heavy horses should be carefully observed. There are, of course, but two classes, viz. draft and agricultural. The general type and characteristics of the two classes is identical, the difference being only in weight. Some Agricultural Societies make 1,600 lbs. and others 1,500 lbs. the minimum for a draft horse and 1,300 or 1,350 lbs. the minimum for an agricultural horse. The horse of a draft type that is below the minimum for an agricultural horse has no class for show purposes. He may be a serviceable and valuable animal but is not "a show horse." Many claim that he is "a general purpose horse" but this is a mistake, a general purpose horse is a clean-lined fellow, reasonably active that will give reasonable service and not look particularly out of place hitched to a plow, binder or other farm machine, a heavy wagon with a reasonable load, a carriage, buggy or cart or under saddle, a horse, we may say of the heavy carriage, heavy road or heavy saddle type. One that is not good enough to win in good company in the class for which he has been bred but is good for general work. Under no process of reasoning can an undersized horse of the draft type be properly called a "general purpose horse."

In the lighter classes of horses we have the heavy harness or carriage horse, the light harness or road horse and the saddle horse and hunter. Of course in high-class horse shows there are other classes, as the runabout, the combination horse, etc., but the classes mentioned are usually all that are mentioned in the prize list in the smaller exhibitions. Proper classification in the light classes is as essential, and often more difficult than in the heavy classes. In some cases action goes farther than breeding and

general conformation in classifying between the heavy harness and light harness horse. This is particularly noticeable in some Standard-breds, which of course are by breeding and should be by conformation, light harness or road horses, but they have the excessive action both fore and rear that is demanded in the heavy harness horse and undesirable in the roadster, hence for show purposes they must go in the carriage class. Some horses have the desirable actions of each class to a certain extent, but those of neither marked to an extreme extent, hence the owner is at a loss to know how to classify them. Horses of this kind cannot be expected to win in good company in either class. Hence it is necessary for the prospective exhibitor to study the desirable characteristics both as regards general conformation and action of the different classes to enable him to properly classify his horses for show purposes and then he must be careful to intensify the action to as a great degree as possible before the day of the show. He must also remember that in these classes manners count for a great deal, this particularly applies to the carriage horse that is essentially a pleasure horse. He must have good manners and act well under all conditions. He must stand well, back well and show flash and high, straight action both fore and rear, and the faster he can go the better, provided he retains the quality of action. The light harness horse or roadster also should have good manners. Like the carriage horse he should be a good walker and when trotting should go straight and reasonably high, but the excessive action of the carriage horse is objectionable. He must go fast, not necessarily at a racing gait, but the faster he can go the better, but must not require boots or protection of any kind of this nature. The saddle horse should be largely of the Thoroughbred type, with good manners, the gaits required being the walk, trot and canter, all of which should be performed with a light, springy tread and rather close to the ground, but not low enough to cause danger of stumbling. Many judges now want more flash and height of action than the Thoroughbred shows, but this must not be too well marked. As regards the hunter the nearer he approaches the Thoroughbred in type and action the better and in addition he must be able to carry weight according to whether he be a light, middle or heavy-weight fellow and be able and willing to negotiate obstacles of different kinds and like other classes have good manners. A saddler or hunter should promptly obey the wishes of his rider whether they be expressed by word, heels, knees or reins and no horse of any class should bear too heavily upon the reins, but at the same time go with a reasonably tight rein.

In a few words to sum up what should be known about "How to Show Horses" consists in knowing what is required in horses of different classes, teaching them to perform the functions of their class in the highest possible degree, and when in the show-ring avoid getting them rattled or excited in order that they may then perform as they have been taught.

LIVE STOCK.

The Live Stock Outlook on Prince Edward Island.

By W. R. Reek.

The rearing of high-grade live stock was fostered by the early settlers of Prince Edward Island, and carried on so successfully that only a few years ago much healthy rivalry existed among the large breeders. Various influences caused the dispersion of some herds, and a waning of the enthusiasm resulted. However, there are several fine herds, still upon the Island, and scattered throughout are to be found individuals, or the descendants of the earlier noted herds; these will aid in forming the foundation in the near future. Every period of depression is generally followed by an awakening and Prince Edward Island is on the threshold of an extensive progressive movement in live-stock raising; agricultural education has had its influence, but it is largely due to the realization that there is money to be made when live stock are properly cared for.

Isolation, due to improper communication with the mainland, exerts an incalculable influence upon the activities of the breeders simply because markets upon a proper basis are not available at any time, and at certain seasons there are none but the home markets. Cattle and sheep shipments are made under the handicap of loading and unloading several times, en route to market, which entails expense and loss in weight. Live hogs are not shipped at all; the packing plant at Charlottetown handles large numbers and the building of another will stimulate trade very much. Last winter breeders were unable to exhibit on the mainland because the boats could not force passages through the ice. The car ferry, which will be in operation shortly and which will save direct communication at all times of the year, and several times per day, ought to aid the movements of live stock very much and is bound

to react favorably on the industry as a whole. Co-operative marketing, which is becoming popular will be fostered; already one section sells all the lambs to a firm in Boston at enhanced prices and cannot supply the demands. Several sections are seriously considering the adoption of such a method and there is every indication that more than lambs will be included in the selling list.

The markets for live stock are all comparatively near—Boston, Halifax, St. John, Sydney and Newfoundland. Market reports show that large quantities of meats from other districts are annually sent to the Maritime Provinces and are sold in direct competition with Island produce, several reasons other than lack of production at home will account for this situation. The demands on the several markets make it possible to dispose of all the output, sometimes regardless of the quality, which is a decided advantage until the industry can be so built that inferior material is of small import. However, any who have the opportunity to visit Charlottetown market and more especially at the Easter season, will find meat which compares favorably with any.

Climatic conditions are, during the warmer months somewhat like those in Great Britain. Diseases, however, appear to be more easily controlled; no outbreaks of contagious diseases occur, which may be accountable to the impossibility of carrying them in cars and bedding, but this is a danger which must be carefully guarded in the near future. The fly season is short and not so intense as in most sections. Frequent showers assure good pasturage during the grazing season, and in conjunction with a very responsive soil favor the growing of large hay, grain and root crops.

The population is largely agricultural. During the years from 1901 to 1911, a decrease of 9.2 per cent. was noted, many going to U. S. A. and Western Canada, and it is quite safe to assume that most of them came from the farms. The same period witnessed a large decrease in the sheep population but an increase in other classes of live stock as shown by the following table:

Class of stock	Number in 1900	Number in 1911	Decrease	Increase	Per cent.
Sheep	125,546	91,232	34,314	—	27.3
Horses	33,731	35,985	—	2,254	6.5
Cattle	112,779	120,396	—	7,617	6.7
Swine	48,007	56,377	—	8,370	17.43

The tendency to keep more stock is very marked under a decreasing population. Many very fine animals are being imported by individual breeders, and the Dominion Department of Agriculture has during the past two years placed many pure-bred sires in several localities. Everywhere the demand for quality is becoming more insistent and many sections, acting co-operatively, are securing sires independent of the Government.

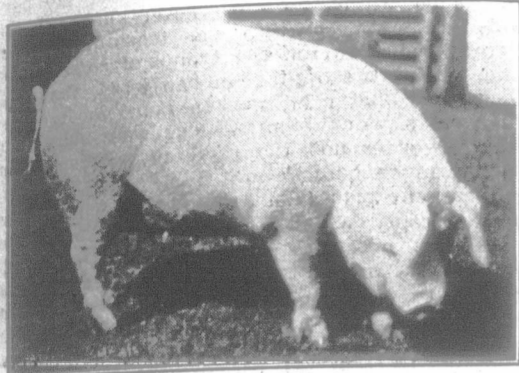
Probably in no other part of Canada is the light horse appreciated as on the Island; everyone loves a good horse and the majority own excellent horses. Prominence is given to speed trials on the track and ice whenever the seasons permit. The interest is so acute, and the quality of the stallions so high, that this industry is not likely to wane under the present generation. Draft horses are represented principally by Clydesdales, but there have been of late some very fine importations of Percherons. Type, weight, scale and quality are frequently found as the result of years of carefully breeding or good choice in the importations.

Beef cattle were monarchs in the olden days, but since the dairy industry has made such rapid strides the former has to remain within bounds. The dispersing of herds gave the beef industry a check, but many have been started of late and give promise of excellent development, and already the mainland show circuit is familiar with Island live stock. A few very good Angus cattle are to be found but the Shorthorn is the favorite.

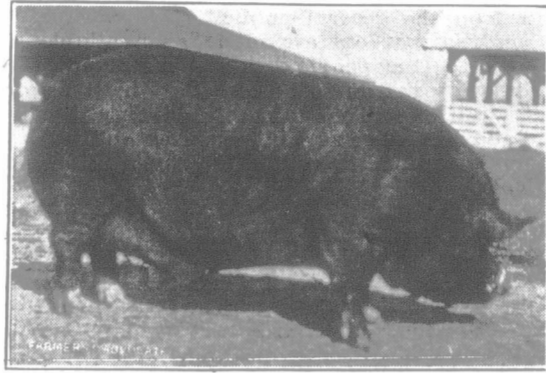
Dairying is of more recent years, but it is now very creditably represented by some noted Ayrshires, Holsteins and Jerseys. Records have been made that have given the breeders world-wide distinction. Small herds of pure-bred animals are being built up, and many grade herds are rapidly coming into prominence, particularly in the districts where creameries are situated. Quality is being emphasized very strongly. The beef and dairy industries for many years suffered from cross breeding but this will, due to educational activity and to the influence of cow testing associations, gradually die out. Selling of hay and grain is the greatest drawback in some parts; it is true that in many instances farmers have a surplus but when cattle come out in the spring scarcely able to walk, then feed cannot profitably be sold. This is the greatest and most difficult problem facing the Department of Agriculture; it not only involves poor cattle, but also the question of soil mining. Fortunately this extreme condition is present in but few sections.

The swine industry is being fostered by the

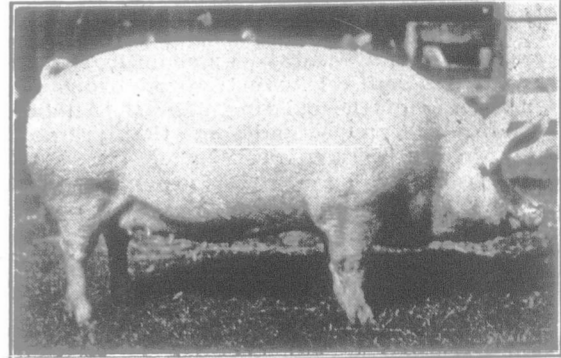
Past Winners in Dairy and Swine.



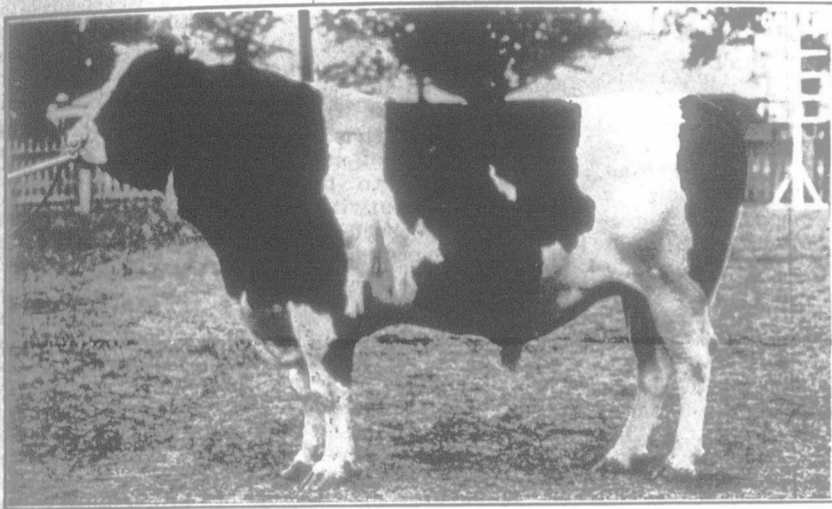
Chester White.



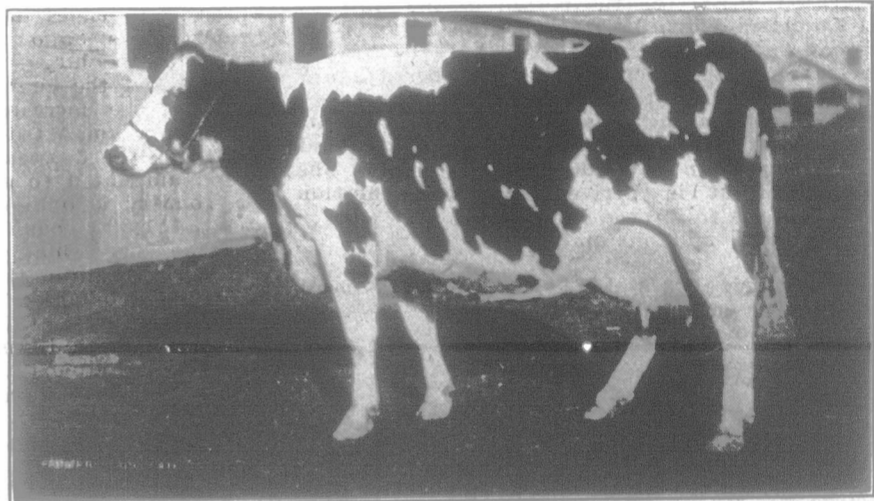
Berkshire.



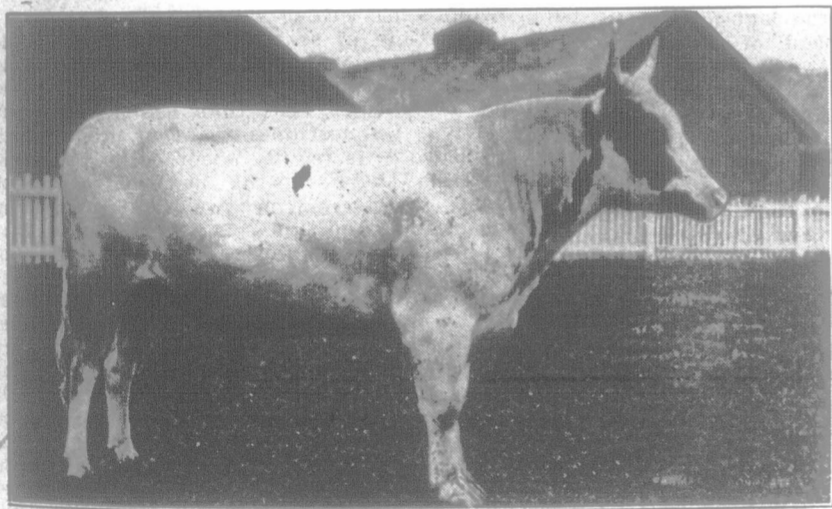
Yorkshire.



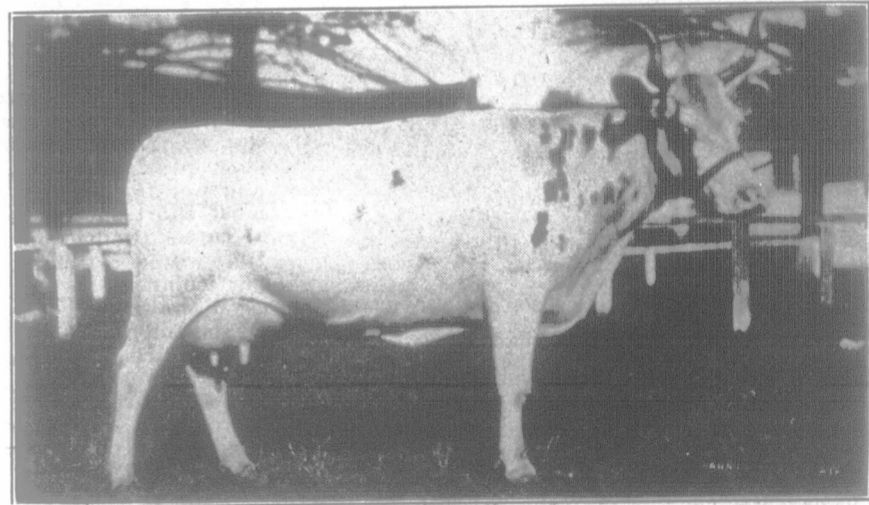
Artis Mercedes Posch.



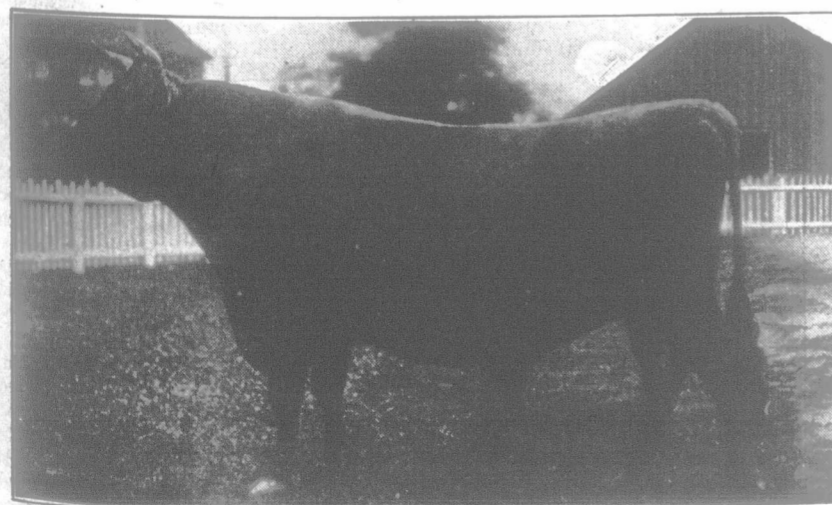
Cora Countess Echo.



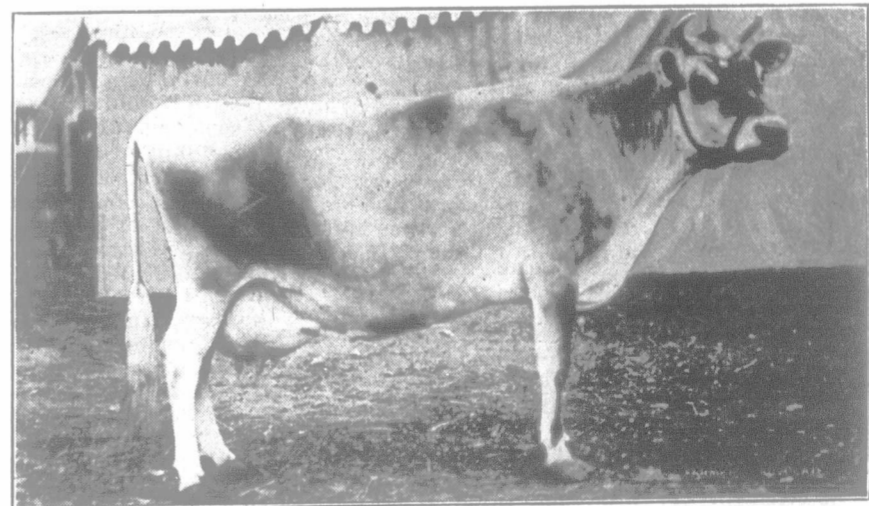
Hobsland Masterpiece.



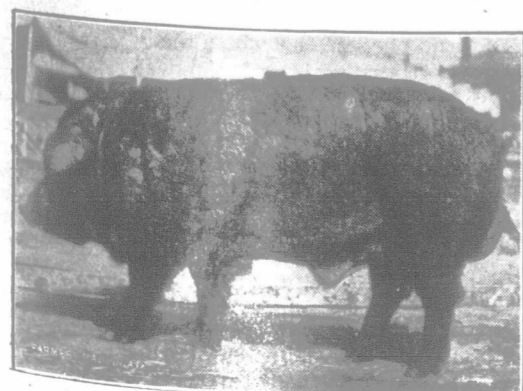
Snowdrop.



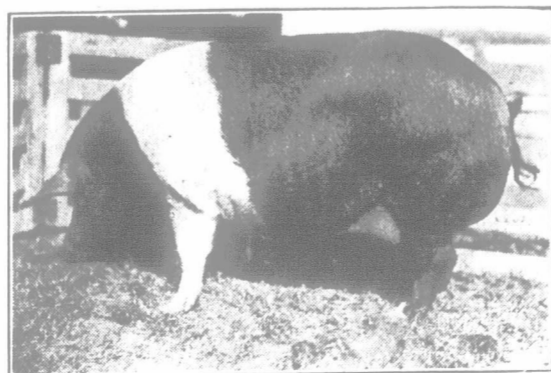
Sultan's Raleigh.



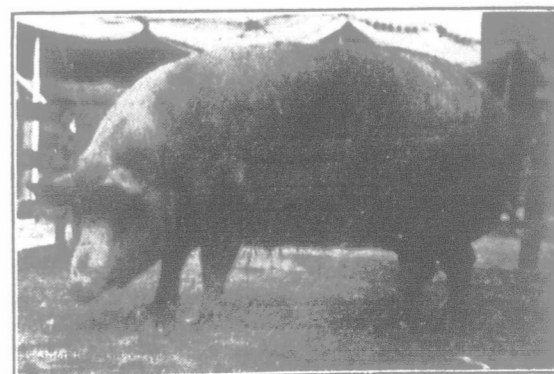
Twylsh II.



Duroc Jersey.



Hampshire.



Tamworth.

on the industry as a whole, which is becoming popular; already one section sells all in Boston at enhanced prices the demands. Several are considering the adoption of there is every indication that will be included in the selling

live stock are all comparative-Halifax, St. John, Sydney and market reports show that large from other districts are the Maritime Provinces and are with Island produce, other than lack of production at for this situation. The general markets make it possible to output, sometimes regardless which is a decided advantage can be so built that inferior import. However, any who to visit Charlottetown especially at the Easter season, will compares favorably with any.

ions are, during the warmer like those in Great Britain. appear to be more easily contacts of contagious diseases of accountable to the impossibility in cars and bedding, but which must be carefully guarded. The fly season is short and in most sections. Frequent and pasturage during the grazing junction with a very responsive wing of large hay, grain and

is largely agricultural. During 1901 to 1911, a decrease of 9.2 ed, many going to U. S. A., ada, and it is quite safe to of them came from the farms. witnessed a large decrease in ion but an increase in other back as shown by the following

Number	Decrease	Increase	Per cent.
91,232	34,314		27.3
35,985		2,204	6.5
120,396		7,617	6.7
56,377		8,370	17.43

to keep more stock is very decreasing population. Many are being imported by in- and the Dominion Department during the past two years bred sires in several localities. demand for quality is becoming and many sections, acting securing sires independent of the

other part of Canada is the ated as on the Island; every- horse and the majority own ex- rominence is given to speed and ice whenever the seasons est is so acute, and the quality high, that this industry is not under the present generation. represented principally by there have been of late some tions of Percherons. Type quality are frequently found as of carefully breeding or good rtations.

monarchs in the olden days. industry has made such rapid has to remain within bounds. herds gave the beef industry a have been started of late and excellent development, and al- show circuit is familiar with A few very good Angus cattle but the Shorthorn is the

more recent years, but it is now presented by some noted Av- and Jerseys. Records have been ven the breeders world-wide dis- orders of pure-bred animals are many grade heids are rapidly inence, particularly in the dis- eries are situated. Quality is very strongly. The beef and or many years suffered from at this will, due to educational e influence of cow testing as- ally die out. Selling of hay eatest drawback in some parts: many instances farmers have a cattle come out in the spring alk, then feed cannot profitably the greatest and most difficult Department of Agriculture: it poor cattle, but also the ques- ing. Fortunately this extreme t in but few sections. stry is being fostered by the

ever growing dairy herds and will likely attain much greater proportion as the markets improve, because the breeds for the production of excellent bacon and hams are on the Island in goodly numbers.

Sheep husbandry declined very fast for a time, but the retrograde movement seems to be checked. New markets and new methods of marketing are responsible in many cases. Freedom from disease and dogs and suitable climatic conditions favor the increasing of the existing flocks. All breeds well known in Canada, and some that are not so well known are represented.

The scrub sire, as in other provinces, is still

to be found, but the efforts of the Departments of Agriculture are becoming felt and many of them are disappearing. Market demands are making it more difficult every year for the farmer to continue his use without courting heavy loss. The need for quality is becoming more firmly stamped on the general public.

When the markets are made as available as they are to the people on the mainland, then there is every reason to believe that the live-stock industry will steadily and surely advance, because the Island has the natural requisites and already the foundation has been ably laid by men of wide experience.

is one of the most profitable by-products of the farm.

The following paragraph casts an interesting sidelight on existing market conditions,—

"The clothing makers of Manchester are paying out such wages as were never known in the trade before. A girl who was machining bright red trousers braces for the troops of some nation told me without stopping in her work that she and her older sister had taken home for the previous week's work 57s., which was more than they had ever earned in their lives before, her normal earnings being about 14s."

Will current prices be maintained? The most suggestive reply which perhaps can be made to this question necessitates a reference to prevailing conditions in Australia. This country is the largest source of supply for the British market and is accustomed to forward annually to Great Britain in the neighborhood of 600,000,000 lbs. of wool. Australia, at the present time is suffering so seriously from drouth that losses of stock by death are likely to be enormous. One authority estimates that in New South Wales alone the losses in sheep will amount to little short of fifteen million head. In South Australia, Queensland and certain other of the States, similar conditions exist. Not only will heavy losses in sheep occur but the ewes will die with young and there will thus be little natural increase. The short supplies of stock have induced one or more of the States to place an embargo on meat exports and notwithstanding the high level which has already been reached, further increases in price are expected.

What these facts suggest as regards the output of wool needs little further comment. Authorities confirm the opinion that, in view of existing conditions and in face of the current demand, the World's supply of wool is likely to be seriously short next year. It is altogether unlikely that relief is to be expected from other sources of supply not here considered and one is led, therefore, to venture the statement that the tone of the wool market will, in all probability, remain very firm for some time to come.

Apart altogether from a review of market conditions and national and imperial needs, there is a growing sense throughout Canada of the utility and advantage of sheep farming as a profitable part of our regular farm operations. The whole industry from a purely commercial point of view exhibits a healthier time than has been apparent for years. Unquestionably, the product—both meat and wool—is readily absorbed by the market and perhaps, therefore, the suggested change of sentiment, while confirmed and safeguarded by existing trade conditions, is based, in part at least, upon a tardy though genuine realization of the economic value of sheep in the country. Improvements in methods of marketing wool, frequently leading to an increase in price of from 4, 5 to 6 cents per pound, is placing the industry upon a firm, businesslike footing. Improvement in methods of marketing lambs, which will provide against the unreasonable glutting of the market in the fall, is likely to follow. The general campaign of instruction and demonstration which is being undertaken by the Federal and certain of the Provincial Departments of Agriculture, is making a live issue of sheep keeping in Canada. The war is giving the needed "push" and stimulus to the whole propaganda. Organization will perfect what the war has begun. The industry will never again die.

The Sheep Industry in War Time.

By H. S. Arkell.

It is announced that the Minister of Agriculture for France has agreed to the importation annually for the French army of 120,000 tons of refrigerated meat for the period of the war or until December 31st, 1916. Such an importation represents an amount equal to fully twice the quantity of meat which would be rendered available by the immediate slaughter of all the sheep in Canada. Speaking conservatively, it represents at least four times the quantity of mutton and lamb consumed in Canada in one year. The latter statement is arrived at by calculation based upon the following facts,—

inspected houses—1914	453,618 head
Mutton, representing 75 per cent., averaging 75 lbs. per carcass, yields	25,516,050 lbs.
Lamb, representing 25 per cent., averaging 35 lbs. per carcass, yields	3,969,140 lbs.
	Total 29,485,190 lbs.
Estimate mutton and lamb slaughtered in other manner than through inspected houses, representing, it is believed, two-thirds that amount	19,656,793 lbs.
Mutton and lamb imported, 1914	4,178,908 lbs.
Mutton and lamb exported, 1914	1,056,287 lbs.
Balance available Canadian consumption	3,122,671 lbs.
Sheep imported, 1914.	131,931 head
Sheep exported, 1914.	42,075 head
Balance available Canadian consumption ...	89,856 head
Estimate yield meat at 60 lbs. per carcass	5,391,370 lbs.
	Total consumed 57,656,614 lbs.

In order to avoid any misunderstanding, it should be made clear at once that mutton and lamb are not used at all extensively for army supplies. This fact is substantiated by inquiries, addressed by Australia to the British Government, which elicited the reply that "all lamb from Australia and all mutton and lamb from New Zealand, then on the market for sale, was for the civilian population. It was also stated that part of the mutton from Australia would probably go in the same direction." As is well known, all mutton and lamb forwarded overseas must be supplied in a frozen state and as, when take out of refrigerated storage, it deteriorates very rapidly, much more rapidly than in the case of beef, the explanation of its non-suitability for army use is sufficiently obvious.

The effect of the war, therefore, upon the consumption of mutton and lamb is indirect. Its use and its market status is dependent upon the utilization of other meats for the commissariat and upon the extent to which a shortage may occur through the diversion of the normal meat supply into consumption outlets created by the war. The situation in this regard is reflected in part at least by the following table of statistics respecting market prices in Canada and Great Britain.

AVERAGE MARKET PRICES—CANADA.

	Mutton (live)		Lamb (live)	
	July 1914	July 1915	July 1914	July 1915
Toronto	5.19-6.00	5.25-6.31	6.63-	8.50-
Montreal	5.19-5.56	5.81-6.19	5.94-6.69	5.58-9.15
Winnipeg	5.00-5.50	7.15-7.62	6.31-7.25	6.00-8.63

WHOLESALE PRICES—SMITHFIELD MARKET—LONDON.

	Mutton (dressed)		July, 1st week, 1915.
	July, 1st week, 1914.	July, 1st week, 1915.	
Scotch	16 to 17 cts. per lb.	19 to 20 cts. per lb.	
Australian	7 1/2 to 8 cts. per lb.	13 1/2 to 13 3/4 cts. per lb.	
	Lamb (dressed)		July, 1st week, 1915.
Now Zealand	12 to 12 1/2 cts. per lb.	16 1/2 to 17 cts. per lb.	

The situation, as regards the use and supply of meat, which has developed as a direct result of the war, is now too well understood to warrant any extended statement here. One illustration will serve the purpose. Take the case of France. In times of peace the consumption in France was about 2,068,000 tons per year. Owing to the large rations distributed to the soldiers and the quantity of foodstuffs supplied to refugees, the increase in consumption to August 1, 1915, amounted approximately to 286,000 tons. As the decrease in the yield for that period amounted to something like 125,000 tons, the country is obliged to make up a deficit of about 411,000 tons. It is estimated that this shortage has already reduced, by one-fifth, the number of head in the national herd. Moreover the herds and flocks in the war district of France and of Belgium will have to be replenished. Faced with this situation France has been obliged to resort to importation. Orders have been given by the French Government in England, covering 240,000 tons of frozen meat, to be delivered between February 1915 and February 1916. This supply is exclusively reserved for the army. In addition, the French Government, as above noted, has authorized the importation annually, for a period of five years, of 120,000 tons of frozen meat. It may be interesting to note further that there have been exported to France from the port of Montreal practically within the last month, in the neighborhood of 8,000 head of Canadian cattle. More are yet to go forward.

These facts illustrate, and without exaggeration, the direction which is being given by the war to the demand for meat in Europe. It may be argued, of course, that the demand is for beef and not for mutton and that, therefore, our utmost effort should be directed to the development of cattle production. Such a view of the situation would clearly, under the circumstances, be a particularly short-sighted one. It has already been shown and it is widely recognized that small meats fully share with beef the increase in demand and the rise in price immediately resulting from the war. This fact alone should be admitted as sufficient argument. The relative rapidity, however, with which the farmer is able to increase his flock, particularly as compared with cattle, pointedly suggests the profit and advantage to Canada of a definite but intelligent increase of its sheep supply. Bearing in mind the resources of his land for sheep keeping, the limits of which should never be transgressed, every farmer may do "his bit" a little bit better by keeping or adding to his flock. This, no less than shells for the guns, represents munitions of war. I know of few ways by which the country may more thriftily, more profitably and with less effort increase the product of its farms than by adding to its supply of sheep.

It must be remembered that sheep farming as a fighting machine is a double-barrelled weapon. People of every class have been led during the winter months to realize the value and the use of wool. Wool for soldiers' socks has been difficult to obtain in any quantity and yarn has increased in price from 75 cents to \$1.25 a pound. Wool has been used to line soldiers' coats much in the same manner as the Russians in Western Canada use the sheep skin to fashion jackets which they wear as protection against our, north-country winters. Wool is used to such an extent in manufacturing underwear and khaki garments for the army, that mills are working overtime to keep abreast of war office orders and in Canada wool has increased in value, within a year, by 12 to 13 cents a lb. At the price now realized, wool

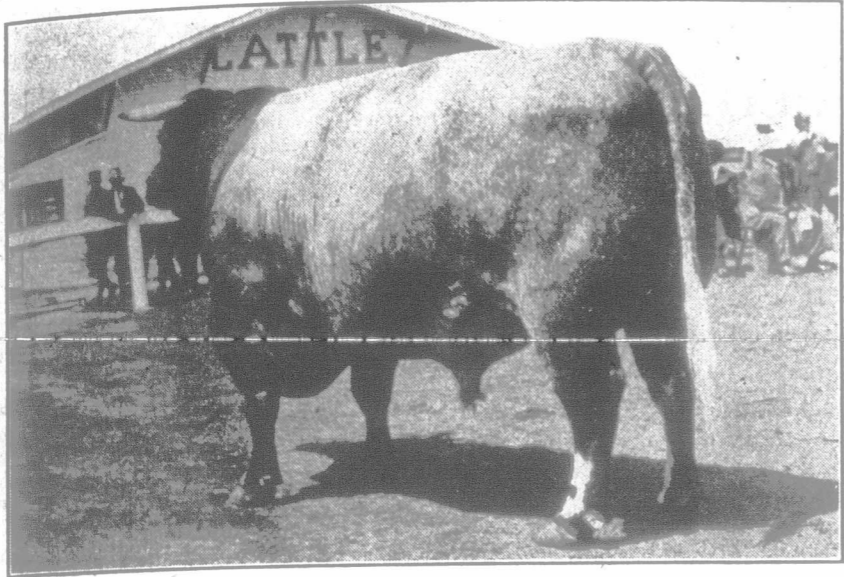
Cleaning Stables in Wet Weather.

Editor "The Farmer's Advocate":

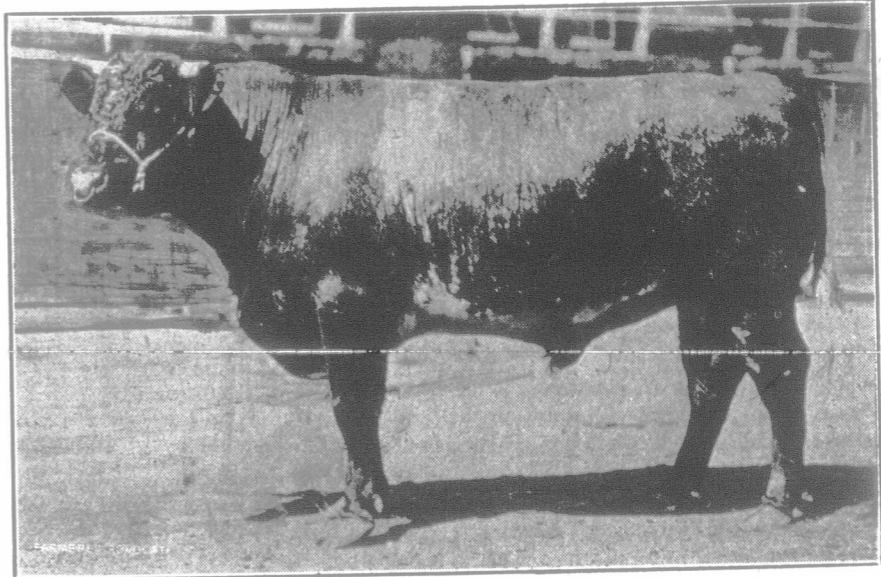
Having completed a new poultry house and having removed the birds to the same we decided to thoroughly clean all the stables through which they had been rambling. This decision was somewhat clinched by an editorial which we read in "The Advocate" some time ago which suggested that the webs be cleaned from the stable windows.

To begin our cleaning we took out all the old, badly-shaped and patched up boards and replaced them with straight ones of the proper length. Next we took an old broom and swept down all the ceilings, walls and windows. We then cleaned and scraped out all the manure, mildewed straw and dirt from the floors, after which we mixed up our whitewash, which was made strong with good lime, got our small spray pump into position, filled it and began the white-washing operation. We sprayed thoroughly all the walls, around the windows, doors and posts, the mangers, stall-boards and all boards in the building. We sprayed some of the ceiling and floor too. Then when that had dried we took some warm water in an old pail and washed down the windows inside and out, using an old cloth. As we washed a window we dashed cold water on it with a dipper to clear it of dirt, and so on till all the windows were done. One would really be surprised at the sweet, cool and refreshing smell which greets a person when entering the stables instead of the old dirty, musty smell, and it looks a hundred per cent. better. True, it takes time, and time is money, but what lovely weather the first two

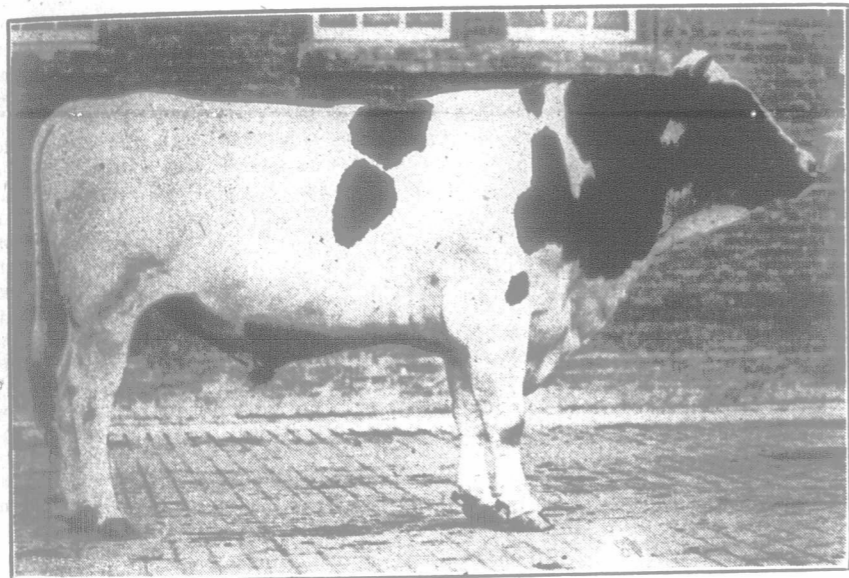
Some Western Champions in 1915.



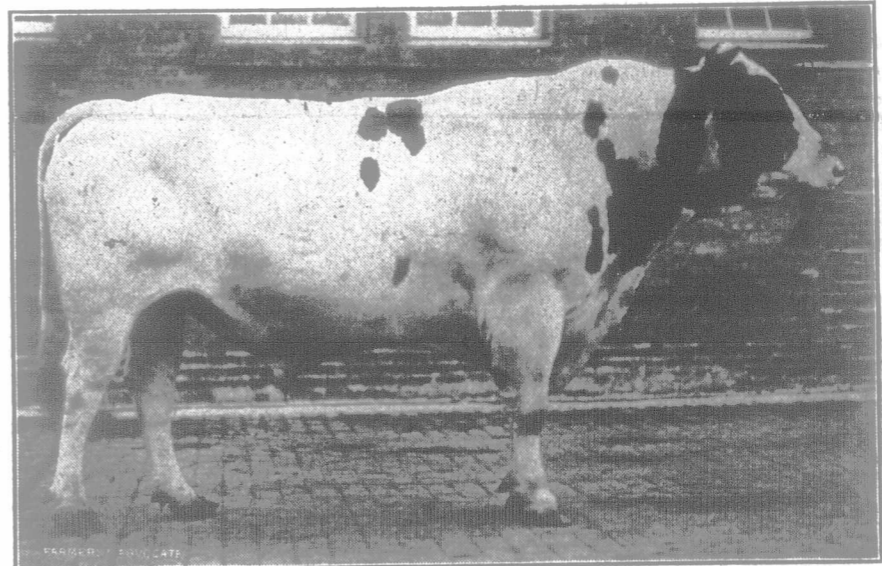
Oakland Star.



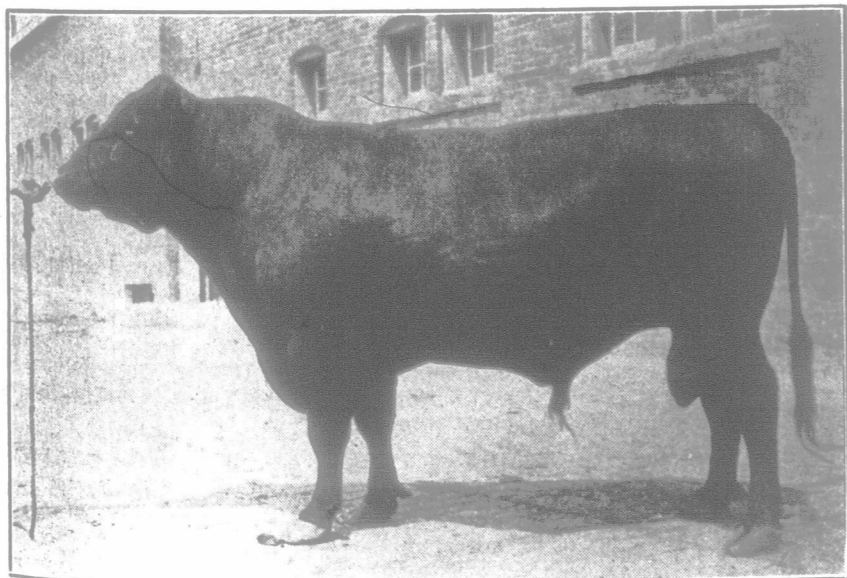
Opportunity.



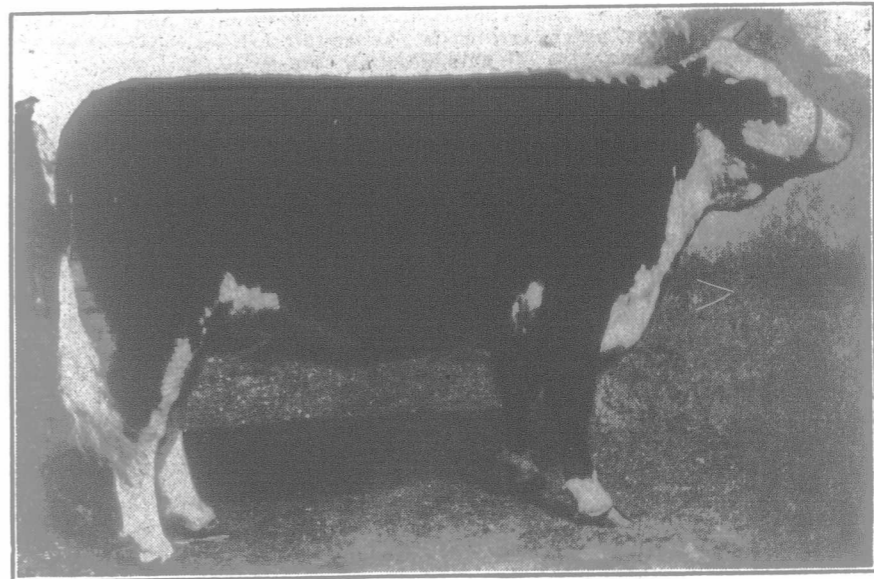
Sir Fayne of Golden West.



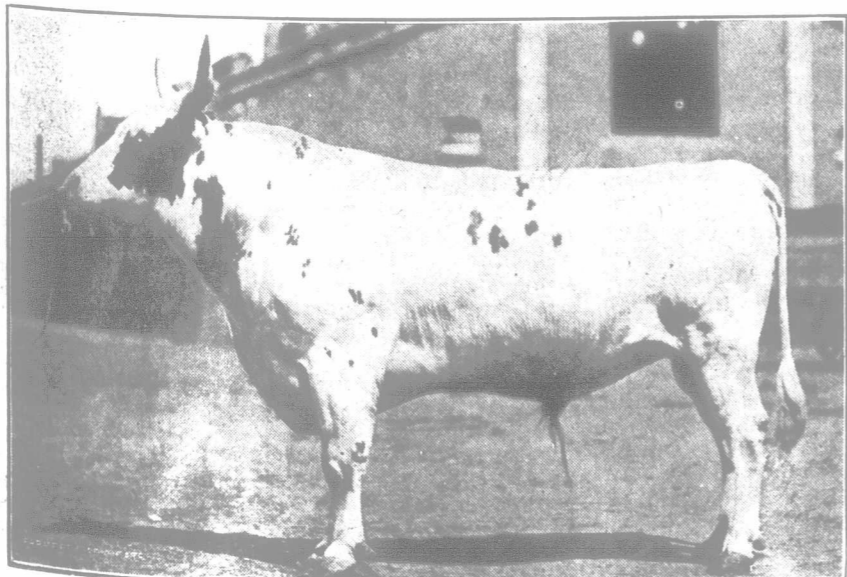
Count Tensen A.



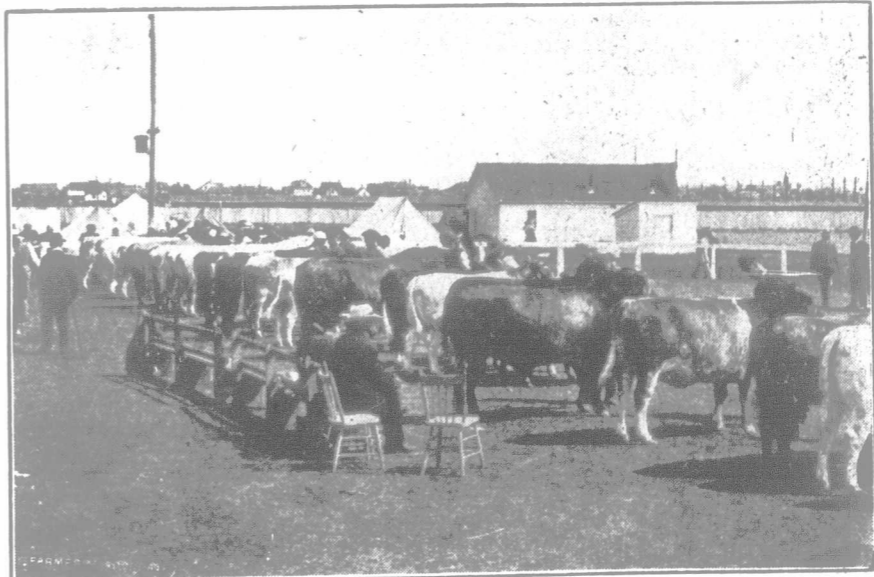
Elm Park Ringleader 7th.



Beau Fairy.



Morton Mains Planet.



A Shorthorn Line-up at Brandon.

profitable by-products of the paragraph casts an interesting market conditions,— makers of Manchester are pay- as were never known in the r who was machining bright for the troops of some nation opping in her work that she had taken home for the pre- 57s., which was more than ed in their lives before, her ng about 14s.”

es be maintained? The most hich perhaps can be made to itates a reference to prevail- ustralia. This country is the apply for the British market o forward annually to Great borhood of 600,000,000 lbs. , at the present time is suffer- m drouth that losses of stock to be enormous. One author- n New South Wales alone the amount to little short of In South Australia, Queens- other of the States, similar ot only will heavy losses in e ewes will die with young e little natural increase. The ock have induced one or more lace an embargo on meat tanding the high level which reached, further increases in

suggest as regards the output further comment. Authorities that, in view of existing ce of the current demand, the ool is likely to be seriously t is altogether unlikely that ected from other sources of sidered and one is led, there e statement that the tone of ill, in all probability, remain me to come.

from a review of market con- l and imperial needs, there is oughout Canada of the utility sheep farming as a profitable arm operations. The whole rely commercial point of view me time than has been appar- tionably, the product—both eadily absorbed by the market ore, the suggested change of nfirm and safeguarded by itions, is based, in part at hough genuine realization of of sheep in the country. Im- oods of marketing wool, fre- an increase in price of from pound, is placing the industry essage like footing. Improvement arket ing lambs, which will e unreasonable glutting of the l, is likely to follow. The f instruction and demonstration ertaken by the Federal and rincipal Departments of Agricul- tive Issue of sheep keeping in is giving the needed “push” e whole propaganda. Organiza- hat the war has begun. The again die.

bles in Wet Weather. er's Advocate” : ed a new poultry house and o birds to the same we decided all the stables through which lling. This decision was some- n editorial which we read in me time ago which suggested e cleaned from the stable

aning we took out all the old, atched up boards and replaced ones of the proper length. Next oom and swept down all the windows. We then cleaned and manure, mildewed straw and s, after which we mixed up our was made strong with good ll spray pump into position. the white-washing operation. ghly all the walls, around the d posts, the mangers, stall- ds in the building. We sprayed r and floor too. Then when ook some warm water in an d down the windows inside and loth. As we washed a window ater on it with a dipper to d so on till all the windows ould really be surprised at the freshing smell which creets a ng the stables instead of the smell and it looks a hundred me, it takes time, and time is lovely weather the first two

weeks of August were for such chores. Then just the looms of the stables will repay one let alone the small. It doesn't take half the time one would think as two of us did ours, all but repl. c. ing the boards, in about six hours or less and our barn wall is 34 feet by 50 feet and is divided

into horse and cow stables, turnip bin and pig pens and has nine windows. Try cleaning the s.a.s.s., if you haven't already done so, and you will be more than pleased with the results.

ONE WHO HAS TRIED.

£52—proof that the dual-purpose Shorthorn is popular in Britain. The highest price paid was 240 guineas given by Sir Gilbert Greenall for Barrington Constance, full of Cranford blood.

Farmers in many of our sport-loving counties have protested loudly against the stoppage of racing by the Government, because, they declare, they are losing money upon the Thoroughbred colts they have produced this year and last year. These are rendered useless on account of racing stoppage. The Government has been urged to make purchases of young stock or to induce owners of breeding establishments to retain them in private hands, by offering prizes at agricultural shows. As if the Government hasn't enough of its own worries ahead!

In the parent Aberdeen-Angus Cattle Society there are now 542 members and a bank balance of £2,287. Captain Claud Ralston, Glamis, is the new president.

To the R. A. S. E. fund that is to help the French farmers in the stricken lands 'twixt Marne and Meuse, H. M. King George has given five Southdown Rams. A big shipment of ram lambs of that breed given by lovers of the Southdown are being urgently shipped to France.

George Leigh, a one time big buyer of the Hereford, when the game boomed on two continents, has begun to get busy again, consequent upon our country being declared free of foot and mouth disease. He has just secured for a Kentucky lover of the white-faced breed, four bulls, thirteen cows and their thirteen calves, and ten heifers. The Royal Show winning bull Remova, and the 1915 Royal Show Champion cow, Olive Iris 3rd are among the crowd—some best!

One of the very few sows left in the Old Country this year was the Royal Lancashire, held at Baccara, in the heart of an industrial centre, and responsible for a big "gate" and a fine all-round exhibition. The Shorthorn bull championship fell to C. W. Kellock's Jack Tar, a white, thin ly-fleshed, and full of character. Here a bull can win a championship at this exhibition, he must be shown and retained by his breeder. This gives the rich man who buys everything he sees a rare knock. J. C. Toppin's Bright Pearl was the champion Shorthorn cow and her dam, Bright Jewel was reserve. The champion dairy cow was Lord Lucas' Charity 23rd, placed before Primrose Gift, the Royal heroine. Charity 23rd gave 41 lbs. 9 ounces of milk in the ring.

The premier Shire mare was J. G. Williams' Halstead Duchess VII, which headed a ring full of brood mares with foals at foot, making one of the finest sights ever seen in the North of England.

Draft gettings made a fine array and the Liverpool corporation took chief spots with Shires of immense proportions. One gelding shown was a Totton-bred one that cost his original buyers at that sale £2,000. He turned out useless as a stallion and was "altered" to work in the shafts of a farmer's cart! Hunters aren't coming out strong but breeding Hackneys were missing from the breeding classes but there were several harness classes and Mrs. J. Putman, a newcomer from Aylesbury was loaded with honors by the judges.

W. Parlin-Moore, a Cumberland breeder, has been elected President of the English Shorthorn Society.

The London Smithfield Show is to be held as usual in December.

CLAIM FOR CANADIAN CATTLE IN ENGLAND.

An agitation is taking place, all over England and Scotland, as I write, in favor of Canada being allowed to send store cattle to Britain, where the zealots for the scheme, fear, there will soon be a shortage of beef supplies keenly felt. The claimants for Canadian cattle have gone so far as to ask the President of the Board of Agriculture to receive them and he has sanctioned the parcel. In the House of Commons too, the subject has been raised and Mr. Acland relying on behalf of the Government there stated that the President was not, at the moment, prepared to introduce the legislation that would be necessary to remove the existing bar on against store cattle admitted from over the seas.

But there was one important statement made and that was in regard to the importation for slaughter at the port of landing of fat cattle from Canada. Mr. Acland declared that there was nothing against that. The President was carefully considering what arrangements could be made for the re-creation of foreign animal wharves for the reception of such cattle, this form of trade having practically ceased during recent years.

The subject of cattle disease is the honey at the back of the whole thing. British traders of pedigree stock are afraid that contagion may be brought over. The contiguity of Canada to the United States, America, is the biggest bar that will have to be lifted.

At a big farmers' meeting held in Norwich, England, it was declared by G. Cobon, that

The Story of the Live-stock Records.

By J. W. Brant.

It would indeed have been strange if, considering the stress under which the World is striving at the present time, the registration of pure-bred live stock had continued this year in the same even and progressive way that had characterized it since the organization of the Canadian National Live Stock Records System. Yet the disturbance has not been so noticeable as might have been expected. In fact, while the aggregate is rather less than in some former years, on the whole the deficiency is anything but striking, except in one or two instances. Indeed, the result can be said to show the stability both of the system and of the live stock interests of the country.

Every year there are naturally variations, and this year in that respect has not been vastly different from any other. Importations have been fewer, but that can be traced rather to the disturbed state of affairs in Europe than to any disruption in Canada. As far as the registrations are concerned, statistics compiled up to as late as August indicate, as has been suggested, little discrepancy in the work. Indeed, the two leading beef breeds, the Shorthorns and the Herefords, each show a slight increase from January to August this year compared with a similar period in 1914. Of the leading dairy breeds the Ayrshire, in the first instance, shows an increase, but the Jerseys exhibit a decline. This latter, however, is nothing remarkable, for it might mean, as in other years, that records are a little late in coming in. In other breeds the Galloway and Aberdeen-Angus, on the one hand, and French Cattle and Red Polled, on the other, there is a decrease, but Guernseys show a slight improvement. A noteworthy feature is that for the first time, Brown Swiss this year make an appearance on the records, the number being 22.

Swine and sheep both exhibit a decrease, the former to a marked extent, due undoubtedly, to the rush to market that characterized the latter part of last year and the early part of this.

Turning to horses we find that while Clydesdales, Shires, Belgians, Standard-breds, Thoroughbreds and Ponies have fallen off this year as compared with last, Hackneys, which have always shown variation from year to year, Percherons, which fell away in 1914 and the French Horses have increased.

To make a long story short here are the figures of the records from January to August of this and last year:—

Table with 3 columns: BREED, 1914, 1915. Rows include Shorthorn, Hereford, Ayrshire, Jersey, Aberdeen-Angus, French Cattle, Red Polled, Galloway, Guernsey, and Brown Swiss.

The numbers for sheep were 1,824 for the first seven months of 1914 as compared with 1,578 in 1915. Of swine the numbers for the same period in 1914 were 8,294 against 5,198 this year, a deficiency of upwards of 3,000. Both sheep and swine may pick up before the year is out.

Of horses the records from January to August in the two years stand:—

Table with 3 columns: TYPE, 1914, 1915. Rows include Clydesdale, Percheron, Shire, Belgian, Suffolk Punch, Hackney, Standard Bred, Thoroughbred, Pony, French Coach, and French Horses.

The total of all live stock records from January to August this year is 21,598 against 25,504 in 1914, a deficiency of 3,906, for 3,342 of which swine and sheep are responsible.

The transfers for the same periods, indicating as they do to some extent the volume of business, will also be found interesting. From January to August in 1914 they totalled 10,741 against 8,865 this year as follows:—

Table with 3 columns: BREED, 1914, 1915. Rows include Shorthorn, Hereford, Ayrshire, Jersey, Aberdeen-Angus, Guernsey, Galloway, French Cattle, Red Polled, Brown Swiss, Swine, Sheep, Clydesdale, Shire, Percheron, Suffolk Punch, Belgian, Hackney, Standard Bred, Thoroughbred, Pony, French Horses, and French Coach.

The importations for the same periods show a distinct falling-off for 1915, owing to the war. In cattle only one Shorthorn, 6 Ayrshires and 62 Jerseys, have come in up to August 1915. In the same time, 1914, there were imported 3 Shorthorns, 172 Herefords, 4 Ayrshires, 47 Jerseys, 31 Galloways, 41 Aberdeen-Angus, 5 Guernseys, 2 Red Polled and 1 Brown Swiss. In 1915, 89 sheep have been imported as against 10 in 1914; and 1 pig has come in this year as against 25 last season. The horse importations have shown a distinct falling-off. In 1914, 128 Clydesdales were imported up to August; this year only 13. Last year, 135 Percherons came in, this year only 51. There were 6 Shires imported in 1914 and 5 in 1915. Thirty-nine Belgians came into the country up to August 1914; only 6 this year. No Hackneys have come in this year, but 67 Standard-breds, 17 Thoroughbreds, 19 ponies, 2 French Coach, and 1 Morgan and 1 German Coach, are listed as coming in up to August, in 1915.

It is interesting when discussing the records to know just how many of all breeds of stock have been recorded at Ottawa. The total records of all breeds of cattle and horses to the end of 1914 were:—

CATTLE.—Shorthorn, 208,558; Ayrshire, 51,813; Hereford, 17,331; Jersey, 5,547; Galloway, 2,107; Aberdeen-Angus, 8,828; Guernsey, 902; French Canadian, 3,493; Red Polled, 2,136.

HORSES.—Clydesdale, 50,862; Shire, 2,225; Hackney, 1,824; French Canadian, 1,549; Percheron, 9,076; Belgian, 793; Standard-bred 1,683; Thoroughbred, 1,743; Pony, 952; Suffolk Punch 327; French Coach, 101.

The total number of swine record to the end of 1914 was 129,371; the total number of sheep was 28,986.

English Live Stock News and Views.

Editor "The Farmer's Advocate":

Sales of sheep and hirings of pedigree rams of all kinds of breeds are the chief events of the period as I write. For the hire of a Hampshire Down ram, J. H. Ismay, the shipping magnate, has paid 105 guineas and that has been an average figure, while 60 guineas and round about have been paid for rams bought outright.

At Totnes, the South Devon sheep have been selling freely and when a ram owned by E. W. Pody, Lis eard, went for 60 guineas, that breed established a record.

Suffolk sheep are in universal request and are selling freely to Scotland, where they are making admirable crosses for mutton purposes. At the Suffolk Society's sheep sale in Ipswich, 90 guineas were paid for Herbert Smith's ram that was second at the Royal Show. A neighbor bought it and Smith bought his neighbor's best ram—a sort of official inter-change of blood.

Oxford Down rams are selling at 61 guineas and prices like that.

The 792 head of Hampshire Down sheep owned by the late Lord Rothschild at Tring Park realized £3,183, or an average for the lot of £4. The 66 ram lambs fetched £571 14s. 6d.

Beef Shorthorns are selling well at public auction. Thirty-one head of Gloucestershire-bred ones, owned by F. A. Beauchamp, at Bath, realized £1,588, or £51 apiece. Eighty-three Cheshire-bred dairy Shorthorns auctioned by Robert Heath, realized £4,271, or an average of

Britain were so Canada stated be rais to the greed s to be h called

Th We I in spit which absence of wha have h Glas, o at Edi Kincarc first re another doned. shows existence are ver and al that t crisis. everywi stantly ever an in the less ex with it campu the Ro Dublin both b because demanc all th tempta them f every k within high in The la equal seven the pre able to With no ind finding section throug horses scarcit militar doubt in one far a sales o and q driving difficul reason Hackn

the dual-purpose Shorthorn is n. The highest price paid was on by Sir Gilbert Greenall for a pair, full of Cranford blood. Many of our sport-loving counties study against the stoppage of government, because, they declare, money upon the Thoroughbred produced this year and last year, and useless on account of racing government has been urged to of young stock or to induce establishments to retain them by offering prizes at agricultural Government hasn't enough of head!

Aberdeen-Angus Cattle Society 22 members and a bank balance—main Claud Kilston, Glamis, is

S. E. fund that is to help the stricken lands 'twixt Marne and King George has given five A. A big shipment of ram lambs sent by lovers of the Southdown shipped to France.

a one time big buyer of the game boomed on two continents to get busy again, consequently being declared free of foot and he has just secured for a Kennebec white-faced breed, four bulls, their thirteen calves, and ten at Show winning bull Renown, Royal Show Champion cow, Olive, and the crowd—some beef!

very few shows left in the Old was the Royal Lancashire, held the heart of an industrial possible for a big "gate" and a exhibition. The Shorthorn bull to C. W. Kellock's Jack Tar, finished, and full of character. In a championship at this exhibit shown and retained by his lives the rich man who buys a rare knock. J. C. Toppin's the champion Shorthorn cow might Jewel was reserve. The cow was Lord Lucas's Charity the Primrose Gift, the Royal 23rd gave 41 lbs. 9 ounces of

mare was J. G. Williams' VII, which headed a ring full of foals at foot, making one of ever seen in the North of

made a fine array and the nation took chief snobs with proportions. One gelding cotton-bred one that cost his that sale £2,000. He turned stallion and was "altered" to a farmer's cart! Hunters strong but breeding Hackneys the breeding classes but there less classes and Mrs. J. Putman, the Aylesbury was loaded with

res. breeder, a Cumberland breeder, has ident of the English Shorthorn Smithfield Show is to be held as

ADIAN CATTLE IN ENGLAND.

taking place, all over England I write, in favor of Canada send store cattle to Britain, for the scheme, fear, there will be of beef supplies keenly felt. Canadian cattle have gone so President of the Board of Agriculture and he has sanctioned the House of Commons too, the sub-ed and Mr. Acland relying on government there stated that the at the moment, prepared to station that would be necessary existing bar up against store from o'er the seas.

one important statement made regard to the importation for port of landing of fat cattle r. Acland declared that there inst that. The President was ng what arrangements could be re-creation of foreign animal re-ception of such cattle, this wing practically ceased during

cattle disease is the honey at whole thing. British breeders of afraid that contact may be e contiguity of Canada to the verica, is the biggest bar that

ers' meeting held in Norwich, declared by G. Cobon, that

Britain was running short of cattle and stores were scarce and commanding exorbitant prices. Canada had a large supply of young cattle, he stated further, and if the embargo could be raised plenty of stores would be shipped to the country. That is exactly what our pedigreed stockmen do not want! A big debate is to be held in London, the gathering having been called together by "The Free Importation of

Canadian Cattle Association of Great Britain." It has a high-sounding name this—but I feel sure it will fall at the first hurdle. Brokenhead with its lairages is still available for Canadian cattle sent over for immediate slaughter.—"Thus far and no further" say the pedigreed stockmen of England! Can you really blame them after all?

London, England. G. T. BURROWS.



A Modern Sanitary Stable.

The War and the Scottish Show Season.

We have had quite a successful show season in spite of the War and its distractions. The fact which impresses everyone is not so much the absence of exhibits or the public, as the absence of what may be termed "The Show Spirit." We have held most of the principal shows except the Glasgow Show in May, and the H. and A. S. Show at Edinburgh, the Stirling, Perth, Forfar and Kincardineshire Shows, all county events of the first rank, some for one reason and some for another connected with the War have been abandoned. Generally the disposition not to hold shows is most marked in districts in which the existence of the War and its more serious aspects are very patent. Thus in the north of Scotland and along the east coast it is not easy to forget that the country is passing through a serious crisis. There are soldiers and training camps everywhere. Warships in large numbers are constantly moving to-and-fro on the North Sea, and ever and anon rumors are abroad of movements in the Fleet which tell of doings of a more or less exciting nature. The Glasgow Show Yard with its full equipment of buildings is a military camp. So also is the splendid show ground of the Royal Dublin Society at Bell's Bridge, Dublin. The Dublin Horse Show, the great event of the Dublin season, is for the second year abandoned, both because of the fact now stated and also because there are few horses to show. The demand of the War Office having swallowed up all the spare horse flesh, men are under no temptation to put expense upon horses to fit them for the show-ring. All surplus horses of every kind have met a ready market and possibly, within living memory, horses have not been so high in price as they are at the present hour. The last time values were anything like being equal to those now ruling was during the "seventies" after the Franco-Prussian War. But the present high prices are more directly traceable to War demands than these were.

With such a demand as now prevails there is no inducement to show horses for the purpose of finding a market for them. Consequently the sections of the shows which have been weakest all through this season are those for light-legged horses—Hunters, Hackneys and Riding Hacks. The scarcity of the first named is directly due to military demands. The second class have no doubt been put out of fashion by motor traction in one form or other, and the Hackney is not so far a special favorite for military purposes. Some sales of Hackney Studs have taken place recently and quite good prices have been realized. Good driving horses are higher in price and more difficult to obtain than they ever have been. The reason is not far to seek. Not only are fewer Hackneys being bred, but breeding mares of the

better class are dying out and for the past ten years there has been a gradual reduction in the number of studs of the first rank. Several first-class stallions are still available but these cannot breed the highest class of animal out of second class mares. The extinction of this class of horse seems to be within measurable distance. There is now no market for the misfits and the absence of such a market is fatal to the continued prosperity of any breed.

Draft horse sections in the shows, which have been held, have been quite as well-filled as ever and indeed in some cases the exhibition has been the best held in the history of the associations concerned. This was very much the case at the Edinburgh show. It was originally intended that the show of 1915 should not be held because it was arranged that the H. and A. S. Show should have been held in Edinburgh during the week now ended. But when it was decided not to hold the H. and A. S. Show the directors of the Edinburgh Agricultural Association were placed in a

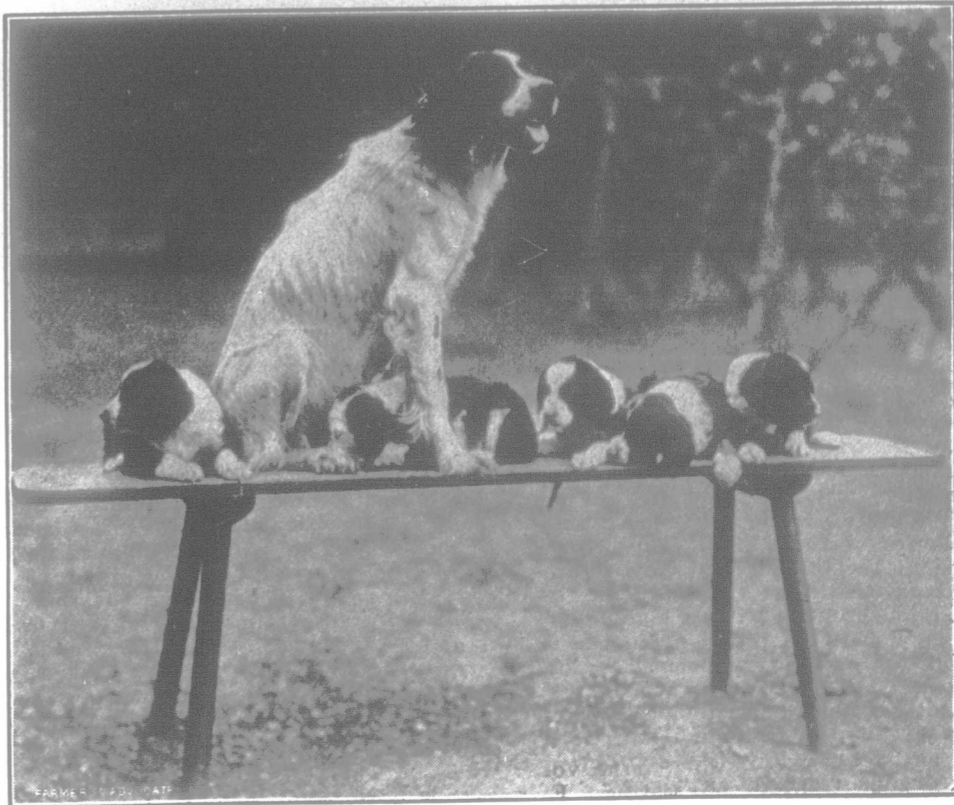
dilemma. If they followed a like policy in 1916 when in all likelihood the National Show would be held in Edinburgh the difficulty would arise of the Edinburgh Association having no show for two years in succession, a contingency almost fatal to the existence of the Association. It was therefore determined to hold a one-day show in the middle of the week on which the H. and A. S. Show was to have been held. The National Society came forward handsomely with a grant of £100 and as it turned out the show proved an unqualified success. The gate money was over £440 as compared with £185 last year and something like

£200 of an average; the exhibits were of an exceptionally high-class order and on the whole the weather set little to be desired. Mr. Richardson exhibited the Royal Champion Short-horn bull, a marvellous animal; the Doonablin herd of Aberdeen-Angus cattle sent forth some very fine specimens, and took most of the first prizes for the breed; Shetland Ponies were a fine display, but when all is said, the Clydesdale section was the prime attraction. Nearly all the best representatives of the breed were on exhibition. Champion honors went to the unbeaten champion, Baron's Seal from the Montgomery Studs, and the Royal champion female Andrew Brooks' Lady Betty by Apukwa, a great mare, won the Cawdor Cup. There was a very fine show of Clydesdale geldings.

A feature of the effect of the War on agriculture has been the great demand for Clydesdales for transport purposes. Thousands of medium weight and medium quality horses have been bought up by army agents and we believe these horses have given great satisfaction in the field. They are used in shifting batteries and are indeed indispensable in artillery warfare, but to a still greater extent are they employed, we believe in the transport service. They are hitched on to the great wagons which convey supplies and stores to the front. After the point is reached at which the motors must be silenced the Clydesdale draft horses are hitched on, and in the darkness they convey stores and supplies to the trenches. It is a wild job at times, but the horses do their part well.

The effect which the War has had on shows, has a bearing on agricultural education and exhibits connected therewith. During the past ten or twenty years these departments of the great shows have become increasingly popular and interesting. The colleges have made exhibits which in respect of educative value leave nothing to be desired. But the War has exacted a heavy toll of those employed by the colleges and they have therefore been compelled to curtail the extent of their exhibits or not to exhibit at all. In either case the show-going public are losers. At the Royal only one College made an exhibit—the Midland Institute at Kingston, Derbyshire. This is one of the most successful colleges in England and for practical value the exhibit at Nottingham was very difficult to beat. The average farmer who visited that stand was bound to come away a better-informed and more intelligent man. He could not but learn much that he did not have at his finger-tips, although the information was almost indispensable to his success as a farmer. When colleges show this side of their activities to the average farmer he is disposed to view them and their teachers with a more kindly eye.

The scarcity of labor and high price of horses have had a marked effect in rendering more popular the department of shows in which anything in the nature of motor traction or mechanical substitutes for labor are to be found. Perhaps the two most clamant demands of farmers at present are for more milkers, and more steady forms of movement. The milking machines and motor tractors are full of intent, and there can be no doubt that the War will leave the farmer less dependent on horse traction than he has been in the past. The Highland and Agricultural Society means to hold a demonstration of motor tractors in October. The object is mainly to discover what likelihood exists of there being an extended area of land out under the plough in the coming winter and how the increasing demand for dairy



An English Setter and Her Progeny.

produce is to be met consistently with the decreasing supply of agricultural labor. At present the British farmer is being placed upon the horns of an agricultural dilemma. The Government calls for recruits. "Men, and still more men," as Lord Kitchener puts it, and the farmer is being soundly rated because there is a suspicion abroad that the agricultural element have not enlisted in anything like the same proportions as other sections of the community. On the other hand the farmer is summoned to grow more food for man and beast. He is told plainly enough that he must do much more than he is doing. His answer is sometimes difficult to counter. "I cannot do both things that you demand. I cannot let my sons and my servants enlist, and at the same time grow the increased crops that you demand. I cannot do both: which must I leave undone?" A doctrinaire finds the answer easy. But he usually forgets that agriculture is a

seasonal trade that its success is contingent upon weather conditions, and that neither Nature nor the Weather pay much attention to the ups-and-downs in the labor market. Agriculture largely employs skilled labor. This does not mean that a man needs to serve a long apprenticeship in order to plough and sow and reap and mow, but it does mean that he cannot do these things without being taught how to do them. Labor-saving implements of all kinds are in keen request, yet experience does not show that such implements should be taken up suddenly. Trials are much more useful than examinations of motors or other machinery at rest, and the proposal to hold such trials of motor tractors in the Perth or Edinburgh districts should meet with cordial approbation.

Implement makers as a rule are just as careless about attending and exhibiting at shows as any other class of the community. They have

great difficulty in getting forward their raw material and oftener greater difficulty in getting away their finished article, and always grave anxiety as to whether goods and machinery will reach their destination and when. It was really this question of transport which cast a gloom over the proposal to hold the H. and A. S. Show. It might be all right, but it could just as easily be all wrong. No one could tell what might have happened had there been a great battle and trains conveying wounded men been hurrying over the rails in all directions. Shows and exhibits and crowds would have got scant consideration under these conditions, and therefore it was perhaps wisest to abandon the great shows. It is easy being wise after the event, but that sort of wisdom is not available while the events to which it applies are still future.

SCOTLAND YET.

When the Herd Comes Home from the Show.

Feeders' problems are many; fitters' problems are more. It is one thing to get the herd ready for the exhibition; it is another to feed and manage it from one exhibition to the next. With plenty of feed and judicious care, it is not a difficult process to put flesh and finish on a beef animal of the right type. True there is a certain amount of what stockmen call the fine art in getting that extra quality of finish by which champions are known, but, as a general thing, a man with average intelligence and a love for live stock can soon learn to feed animals fat. It is not so easy to let these animals down in flesh and still preserve their general health and fecundity. Analyses show us that in actual constituents the animal is very little different from the plants upon which it feeds. Each has its combustible and incombustible materials differing very little from the other. Nature has prepared the complex feed which the animal requires and in letting the show stock down in flesh after the exhibitions are over the first thing to remember is to follow nature and feed the stock as closely as possible to the manner in which under natural conditions they would feed themselves—milk for the young stock and grass for the older animals. A good mixture of pasture grasses affords a complete ration and should form the basis of the food material used in bringing the animal back to field condition. There is a point also in the fact that mixed grasses are better than one grass alone. This should be remembered when compounding rations during the winter season of dry feeding, and variety and mixtures should be depended upon more than feeding from few or single plants.

After months of fitting, which has reached the climax in a superfluity of flesh when the animal enters the show-ring, some change must come when the fight is over and the victory won, otherwise the breeding value of the herd will deteriorate. Feeding young or older animals continuously as heavily as they are generally fed in preparation for competition in our larger show-rings would soon force them into a plethoric condition. Overloading with flesh, and particularly in this the case where it is practiced year after year, is bound to cause diminished fecundity, which must be counteracted by plenty of exercise, even though it is necessary to force the animals to move about. A smaller diet is also required but any change from heavy feeding to lighter feeding must be made gradually. Male or female animals which have been rendered impotent or barren being prepared for show purposes year after year, may sometimes be restored to normal condition through a judicious letting down in flesh, and thereafter, provided they are not again fitted to a high state, go on as regular and frequent reproducers of their kind. Any changes which are made in the feeding and care of the herd should be accomplished as gradually as possible. It is not good practice with a highly fitted, well-cared-for show herd to return from the shows, and be forced to look after themselves for the rest of the season. It is not conducive to increased fecundity to make such violent changes, and animals in an over-fat condition, non-breeders, are not as likely to have the activity of their generative organs restored as where careful, systematic and gradual reduction in flesh is accomplished through this class of feeding. The largest per-

centage of barren females and impotent males is found amongst animals which have been fitted and refitted and after each fitting let down rapidly in flesh.

We are discussing particularly the influence of care and attention after the show season upon the breeding propensities of the herd. Any herd of stock of show calibre should be more valuable as breeding stock than as exhibition or advertising stock. It is from this kind of topplers of their respective breeds that the stockman hopes to improve those breeds. One of the main things, then, especially with the younger stock, but also

and force it to remain in the pasture through cold, protracted rainy spells such as are more or less frequent after the shows are over.

A great deal depends upon the quality of feed given as to whether or not show animals become regular breeders. A very dry ration is unfavorable to impregnation. The breeding animals of the herd, after they have returned from the show and after grass is gone for the season, should get a diet containing sufficient succulence and one which tends to keep the digestive system in good order. There is a very close relation between nutrition and reproduction. Of course, care must be taken not to feed so much succulent feed that a pronounced laxative condition of the bowels is produced. Avoid, after the animals have been let down in flesh, feeds rich in carbonaceous materials and fats, and encourage the development of muscle and tissue by the use of plenty of nitrogenous feeds. If it is not desired to turn the cattle out to pasture they may be let down in condition to very good advantage by the use of soiling crops fed either inside or in a paddock. If this system is followed each animal should run loose in a box stall and have at least five or six hours outdoor exercise in a large paddock. During fly time, this outside exercise could be given to best advantage at night. Kept inside in this manner the cattle may get a little better attention as the stockman may find time to keep their coats in good condition by currying and rubbing down. This will help in the chance from show feeding to ordinary feeding for breeding purposes.

Gradually ease off on the grain fed and if the stock have been getting the heavier grains such as corn and wheat accompanied by the stimulative feeding of proprietary feeds or certain fatty by-products these should be gradually dropped and their place taken by some of the coarser grains, particularly oats. There is no better grain feed for cattle than oats. Especially in this true of the younger stock. An Old Country authority on feeding states that wheat bran, clover hay, and cut oats is one of the best combinations he has ever tried and this should be the basis of a very good ration in changing from show-yard feeding to ordinary breeding-herd feeding. Of course, pasture grass will very easily take the place of the clover hay and the oats could be fed rolled, or ground in place of the cut sheaves. As winter comes on, roots or silage or roots and silage should form the bulk of the ration, together with clover hay all they will eat, and the necessary grain feeds composed mainly of oats to keep them in good condition. Rape is a good fall feed as is also second-



A Quebec Macadamized Road, Lower Ormstown.

crop red clover. It is necessary for the stockman to know his cattle thoroughly and to study the requirements and the individuality of each and every animal composing the herd. What will suffice for one animal will not be enough for another and yet too much for a third. We have seen well-bred cattle actually gain in flesh on a heavy feeding of turnips and good oat straw, but of course, these cattle were not, in the beginning, in show-yard condition. We have seen other cattle that would make very little gain on a heavy feeding of roots and clover hay with a little grain thrown in. A great deal depends upon the animals, but we wish to again emphasize the fact that any letting down

with the older animals, is to see to it that they get sufficient exercise when they return to their home farms. The animals, while being fitted, are generally kept as quiet as possible in so far as this is conducive to their better condition when show time arrives. After the shows they are inclined to be lazy and may not move about sufficiently unless encouraged by force to do so. As a general thing, however, if they are given the free run of a pasture field they will take sufficient exercise. Care should be taken in turning them out if they have not been throughout the summer accustomed to feeding outside. They must be accustomed to the new conditions gradually. It would not do to turn a pampered animal out

getting forward their raw greater difficulty in getting article, and always grave er goods and machinery will on and when. It was really nsport which cast a gloom hold the H. and A. S. Show. t, but it could just as easily ne could tell what might have een a great battle and trains men been hurrying over the s. Shows and exhibits and ot scant consideration under d therefore it was perhaps e great shows. It is easy event, but that sort of wis- e while the events to which ture.

SCOTLAND YET.

Show.

ain in the pasture through y spells such as are more o e shows are over. nds upon the quality of feed or not show animals become very dry ration is unfavorable the breeding animals of the e returned from the show and or the season, should get a ient succulence and one which estive system in good order. e relation between nutrition f course, care must be taken feed so much succulent feed pronounced laxative condi- the bowels is produced. after the animals have been n in flesh, feeds rich in car- us materials and fats, and ge the development of muscle ue by the use of plenty of ous feeds. If it is not de- may be let down in con- o very good advantage by of soiling crops fed either r in a paddock. If this sys- followed each animal should e in a box stall and have at e or six hours outdoor exer- a large paddock. During fly is outside exercise could be o best advantage at night. side in this manner the cat- get a little better attention stockman may find time to eir coats in good condition ing and rubbing down. This o in the change from show to ordinary feeding for breed- poses. ually ease off on the grain if the stock have been get- heavier grains such as corn- meat accompanied by the ive feeding of proprietary r certain fatty by-products hould be gradually dropped r place taken by some of the grains, particularly oats. no better grain feed for cat- oats. Especially is this the younger stock. An Old authority on feeding states eat bran, clover hay, and is one of the best combina- e has ever tried and this e the basis of a very good n changing from show-yard to ordinary breeding-herd Of course, pasture grass y easily take the place of er hay and the oats could be d, or ground in place of the ves. As winter comes on, silage or roots and silage orm the bulk of the ration. with clover hay all they , and the necessary grain imposed mainly of oats to in good condition. Rape d fall feed as is also second-

the stockman to know his id to study the requirements y of each and every animal What will suffice for one ough for another and yet rd. We have seen well-bred n flesh on a heavy feeding of straw, but of course, these e beginning, in show-yard seen other cattle that would on a heavy feeding of roots a little grain thrown in. A, on the animals, but we wish e fact that any letting down

in flesh attempted should be done very gradually, as a rapid change from heavy feeding to light feeding and the consequent shock is liable to permanently injure the animal's digestive system as well as its reproductive system, and the general belief that all that is necessary is to thin an animal down quickly in order to overcome the tendency toward barrenness is in error. Ail changes should be made very gradually.

Warrington, in his book entitled "Cattle Breeding," says that "what the practical breeder most needs to learn as to feeding may be summed up in two words, liberality and self-restraint." This applies with greater force to the care of show stock when it returns from the exhibitions than to any other class of feeding. Here, the stockman cannot afford to stint his stock, neither dare he over-feed. He must feed with the same regularity as he did in preparing his herd to go before the judge. He must cut out all pampering and he must follow that "middle road" which no writer, be he theorist or practical man can define.

FARM.

Let the Man Feed Himself.

Editor "The Farmer's Advocate":

In a recent number of yer journal I notice that ye are as-in' for information in regard tae the idle man. Ye want tae ken wha is gaein' tae feed him. An' ye mention some suggestions that hae been made as tae gettin' him on tae land, wi' maybe a wee bit o' help frae the government in the way o' a loan that wad enable him tae buy his live stock an' implements an' get a fair start. Frae what experience I hae had wi' mankind I'm inclined tae agree wi' you, when you say that this experiment wad be a failure, in a probability. It warked a' richt about a hundred years ago when oor ancestors cam' oot frae auld Scotland an' the Government gae them free land an' some tools an' a wee puckle o' seed wheat an' so on, but I'm feared that wi' the changed conditions o' the present time we'd hae trou- ble gin we started oot giein' somethin' for naethin' tae anyone that wad tak' it. When oor fore- fathers landed in this country they had burnt their bridges behind them, an' there was no' turnin' back. They eadh had their hundred acres mair or less, an' it was mak' ypr livin' on it or die in the attempt, for there was naethin' else tae turn tae. There was no chance tae pull up stakes an' strike for the toon wi' the hope o' gettin' a job in a factory o' some kind or ither, for there was neither factory nor toon tae strike for in those days, an' as it turned oot they seem tae hae got along vera weel wi'oot them. They stuck tae their job an' it made men oot o' them, an' it cam' vera near makin' men oot o' the women as weel, for they warked as hard as ony- body in those days an' developed muscle an' char- acter that the present generation micht be proud to hae.

But times hae changed, an' as I said, I'm dootin' gin it wad be wise tae try the experi- ment o' free farms an' stock on the man o' to- day wha is oot o' a job. They tell me that the man wha learns tae swim by usin' a cork-belt or some support o' that kind, never mak's much o' a swimmer an' I hae an' idea that some o' oor idle city men wouldna' mak' vera succes-ful farmers gin they had tae be coaxed tae leave toon by a bait o' this kind frae the Government.

It has aye been my idea that there are juist three classes o' individuals in a free country like this, wi' a' its opportunities, that should get Government support. These three classes are invalids an' lunatics an' criminals. An' these last I wouldna' gie mair in the way o' their board than they could earn at a stone-pile in the jail- yard. But able-bodied men wi' twa hands an' a head hae na richt tae be worryin' the country wi' their troubles an' hard-luck stories. There's aye war' for the mon that's eneuch in earnest in his search for it. The country has it if the toon hasn't, an' while this is the case I dinna' think we hae ony call as a nation tae bother wi' the "problem o' unemployment." There's really juist the one way tae mak' men oot o' some o' the humanity that exist in oor toons an' cities, an' that is tae let them dae their ain hustlin' or tak' the consequences. Gin a mon doesna' think he's worth the trouble it tak's tae keep himsel' alive let him dee an' mak' room for a better mon. It's nature's way an' we needna' think we can improve on it.

There are several reasons why we are up against this problem o' unemployment, but there's none o' them that will tak' the solution o' it, oot o' the hands o' the unemploy'd himsel'. In nine cases oot o' ten it's stripes or drink or laziness that's at the bottom o' it a'. The first is only a passing condection an' will richt itself in time, but the ither twa are different an' rest entirely wi' the individual himsel'. Gin he willna' mak' the foor for existence that is part o' the law o' the Universe he will hae tae go under. It's an unce' hard thing tae say an' doesna' seem to hae vera mair o' Christian charity about it, but when we consider the fact that o' a' the

great men this World has ever seen, none o' them won their success wi'oot long-continued effort on their ain pairt, we canna' come tae ony ither conclusion. An' the failures are aye made up frae the class that is lookin' tae the World tae gie them somethin' for naethin'. The World does- na' owe onybody a livin' but as a rule she pays guid wages tae the mon wha is willin tae wark. But there may be times when he has tae be mair than willin'. This half-hearted lookin' for wark is about the next thing tae hopin' ye won't find it, an' a mon that canna' pit enthusiasm an' energy intae the effort tae get a job may hae to dae wi'oot it. What's worth gettin' is worth gaein' aifter an' the Government that provides temporary wark for a' the bums an' "unemploy'd" that are idlin' about the saloons isna' doin' them ony guid but is only makin' condections worse by encouragin' others tae depend on gettin' the same kind o' help. A mon is no mon that has tae be helped over a' the hard places an' the only way tae pit some backbone in him is tae let him help himsel'. It's like the auld story o' helpin' the chickens oot o' the shell. They never recover frae the kindness.

I mind hearin' of a couple o' young chaps that lived in this pairt o' the country some years

back. Their feyther died an' left them a guid farm, weel stocked an' free o' debt. It wisna' lang before they got intae the habit o' rinnin' store accounts an' lettin' it gae frae year tae year wi'oot settlin' up. It was the same wi' the blacksmith an' everyone else. Before they kenned it they were past help an' when the auld storekeeper died the farm went tae pay the store- bill. Weel there was naethin' for the boys to dae but to move tae a rented farm, an' it was a mighty poor farm at that. But they had got their lesson, an' it wasna' lost on them. They got doon tae wark an' tae rinnin' their business on different lines, an' it wisna' lang before they bought the farm they had rented, an' they hae been makin' money ever since.

It a' gops tae show that mair depends on the mon himsel' than on the chance he gets. Sae, gin there's a problem as tae who is tae feed the idle mon, I say let the idle mon solve it. He should be as muc'le interested in it as onybody, an' gin he isna' fed too soon na doot his interest will increase. About the only satisfactory way o' makin' men is tae pit the job in their ain hands.

SANDY FRASER.

What Exhibitions Accomplish.

By J. Lockie Wilson.

Much water has flowed down the Niagara River and past the historic old town bearing the name of Ontario's mighty cataract since a little group of pioneer farmers assembled there for the purpose of organizing their first agricultural fair. Little did they dream that the structure they com- menced would become one of the greatest and, perhaps, the most important organizations in the Dominion of Canada, not only from an educa- tional, but also a financial point of view.

In the earlier years of these Agricultural As- sociations the first to develop was the town-ship fair where the settlers proudly exhibited the first

Institutions, the farmers of Canada, and particu- larly those from Ontario, as competitors, more than hold their own.

Substantial grants from Governments and from municipal councils have been given for nearly one hundred years for Agricultural Exhibitions. The question is sometimes asked whether this ex- penditure has been justified by results. Thinking men who have watched the sometimes slow but sure and steady progress of these Agricultural Exhibition Associations in their upward climb, know of a surety that no expenditure of public funds has proved a better investment. As an evidence of this, in 1915, the Federal Minister of

Agriculture, realizing as he does the high educational value of fairs and exhibi- tions, has increased the subventions to a greater extent than was ever before done in Canada, and no dissenting voice was heard from either Govern- ment or Opposition. Not- withstanding the generous assistance gi'en, the mem- bers of these societies con- tributed three dollars for every one recei'ed from the sources before men- tioned.

The primary function of Fair Boards is the hold- ing of exhibitions, and, as the years go by, better systems tae the place of obsolete ones. An evidence of this is the adoption by nearly all the Societies in the Province of an im- proved form of fair books. These not only simplify the work of the officials, but prevent errors that frequently occurred under the older methods.

The Departmental Judges have proved a boon to exhibitors of live stock, and all progr sive fairs in the Province em- ploy these judges in the different classes, and each succeeding year shows a marked improvement in the work of these officials. Short Courses and Demon- strations for these judges are held a h year for the purpose of ariving at uni- formity of type in both animals and products



Some Winning Grain.

fruits of the virgin soil. Next in order was the county exhibition where, besides agricultural produce, live stock became a prominent feature. The prize-winning live stock and products from these county and township fairs was, in turn, exhibited at a Central Provincial Exhibition.

Under the Ontario Agriculture and Arts As- sociation, grants were given to the above-men- tioned organizations without taking into consid- eration the manner in which these grants were expended. In 1906 the law was changed, town- ship and county fairs, as such, ceased to exist, and grants are now apportioned according to ex- penditure by Societies for purely agricultural pur- poses.

In addition to the above there are in different parts of Canada large exhibitions, national in scope and open to the world, and at these greater

which they are expected to judge. When asked, judges are required to give reasons for their de- cisions, which is proving of educational value.

In previous years prizes were placed on farm products without giving any information as to the name and variety of the exhibi's. Now, well- conducted fairs supply cards giving necessary in- formation. This is especially valuable to the younger generation of agriculturists. Programs are also arranged, and the hour designated when each judging event will take place, and all are run on schedule time. This should be a universal regulation.

Another feature of importance is the bring- ing together of buyer and seller of improved horses, cattle, sheep and swine, and pure seed grain, and, in this connection, it is unlawful under the new regulations for an Exhibition Association to

offer a prize for any but registered male animals in the breeding classes. Boards of Directors are urgently requested to carefully re-see their prize lists, and to make awards only for such breeds of live stock and other lines of farm products as are best suited to the localities in which fairs are held. This idea of specializing is a most important one. If a fair is held in a dairy section, one outstanding breed should be selected and every dairy farmer in that locality should keep no other than that particular breed. Great economy would accrue from adopting this method, especially in the use and exchange of male animals. The same is true of grain and potatoes particularly. When a section becomes well-known for certain lines of stock and field crops, there buyers will congregate for the reason that car-load lots can be purchased at a minimum expenditure of time and effort.

Marked improvement has been seen in recent years in the grounds and buildings, and here it might be noted that from the time a visitor enters the gates of an exhibition nothing should meet his eye that would be offensive in any particular. The grounds and buildings should be bright, clean and attractive, ample seating accommodation should be provided for tired mothers with little children tugging at their gowns, and for the old pioneers whose fair days will soon be over.

A few years ago the gambler and thimble rigger were regular visitors at the fairs of Ontario, and thousands of dollars were fled from the pockets of unwary farmer boys who could ill spare them. But now this has all been changed, and through the hearty co-operation of the directors of fairs and exhibitions, these crooks have been curbed in their crookedness, and will no longer be allowed to work unchecked in various gambling devices. No Government grants will be given to exhibitions, the directors of which, allow these fairs to operate on their grounds or within 300 yards thereof.

Surprise is frequently expressed by visitors at fairs and exhibitions, especially in Ontario, that the old-time splendid exhibits of agricultural machinery have practically disappeared. Attractive indeed, were they in the past when they were continually surrounded by large crowds of interested spectators. While these exhibits no longer appear to any extent at Canadian exhibitions, there has scarcely been a show of any importance in Great Britain or on the Continent in recent years, at which there have not been large exhibits of Canadian farm implements. How is a Canadian farmer to select the best machine if he has no opportunity of comparing one make with another at an exhibition? As matters now stand he is at the mercy of glib-tongued agents, and the one who can put his case best is generally the one who makes the sale, and this at a time when men are requiring demonstrations to be made in every other line of industry before purchasing. The implement manufacturers of Canada should not, as in this connection, be found turning back the hands of the clock.

In recent years improvement is taking place in the putting up of grain and beef exhibits at the different fairs in the Province. Never before in the history of Ontario have exhibitors at fairs and exhibitions taken such an interest as they are now showing in having every department, particularly inside the main halls, neatly and tastefully arranged.

At fairs and exhibitions opportunities are given to compare different classes of stock, farm products and improved machinery, also many purchases of stock and, particularly, of pure seed grain are effected. The preparation of live stock and other agricultural products for exhibitions is itself of educational value, and watching the awarding of prizes by expert judges is of decided benefit to interested onlookers. The encouragement of children's exhibits of school work, chickens, grain, roots and flowers has a tendency to develop a pride in farming and its varied endeavors. Last, but not least important are the benefits that accrue from the assembling together at exhibitions of friends and others engaged in the same work who seldom meet at other times and who there exchange ideas and experiences. These all have an elevating tendency.

Never before in the history of this country have statesmen with a broadening outlook given more attention or shown greater interest in agricultural exhibitions than they are doing to-day, knowing as they do, the excellent work that is being done by the intelligent and progressive Boards of Directors of our several hundred fairs and exhibitions without remuneration or hope of reward other than the knowledge of work well done.

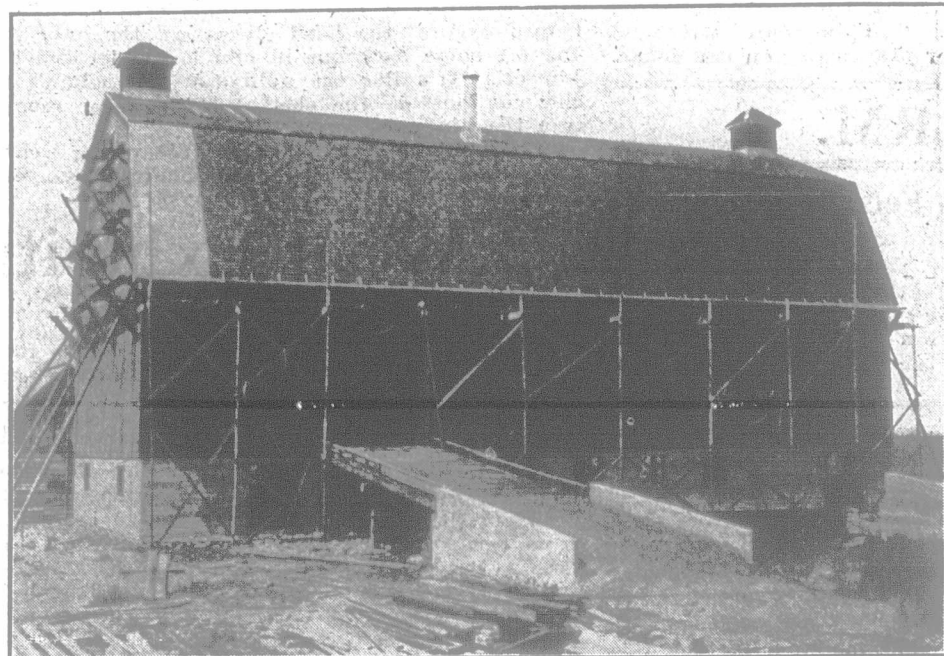
To save a few seconds time by beating the train at the crossing has lost many a life.

Stop—Look—Listen at the level railway crossing and avoid a tragedy.

Agriculture in Timiskaming District.

Between parallels 42 and 46 lies practically all of what is known as Old Ontario. Here for many years man has been plying his trade in all the devious ways that comprise the system of an organized community. Here hamlets have grown into villages, villages into towns and towns into cities, and such has been the development since the axe of the wood-man first rang in the wilds that the Province of Ontario with its 407,262 square miles is known by the proportionately small area which lies between the parallels already mentioned. Still mindful of the wonderful resources of Old Ontario our Governments have endeavored on the platform and through the

of the Prairie Provinces. Furthermore, a settler can eat his supper in his shack at home, take the train and arrive in the capital city of the Province in time for breakfast. These two facts are sufficient to link New to Old Ontario and dissipate the erroneous conception regarding the location of that part of the Province which offers virgin soil to the man who will give his efforts in return, and yields immense revenues to the country through its mills and mines. We of the older-settled districts have learned with wonder to the tale of our parents when they recalled their pioneering days and told of the hardships and battles for existence. The pioneer's fighting



An Up-to-date Barn in Timiskaming.

This barn, under construction, was photographed on the farm of A. J. Kennedy on July 29. When complete, it will be modern in every respect.

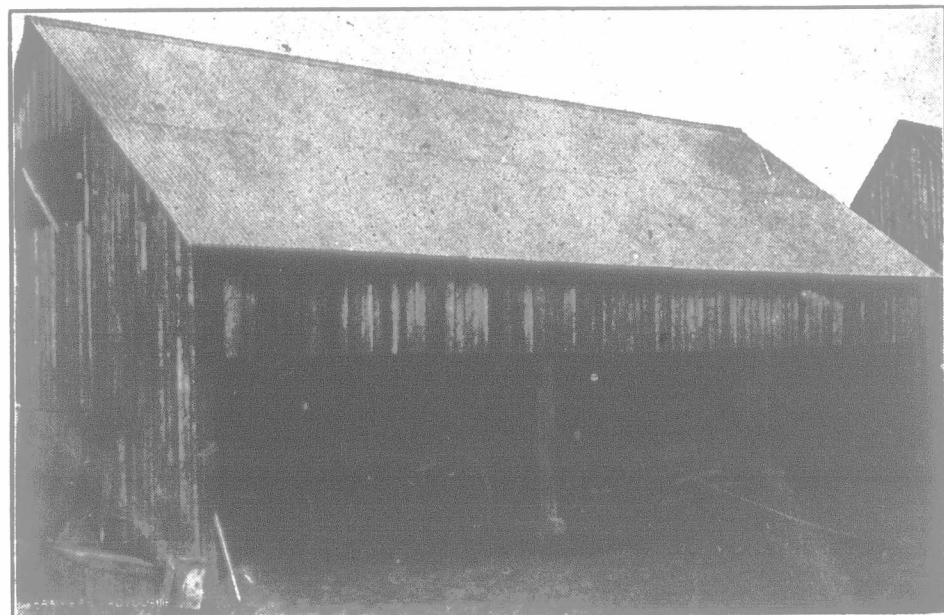
Press to bring to the attention of the world the marvelous and, as yet, uncomprehended possibilities which lie wrapt in the great country north and northwest of Lake Nipissing and the Great Lakes. Northern New Ontario, as it is frequently called, has an area of 330,000 square miles; the Government surveyors claim for it 20,000,000 acres of farm lands, unimproved wooded areas, and the richest silver and nickel mines in the world. Added to this is the power of the rivers in a well-watered, undulating country, making the resources available and uncomprehended in scope.

The expressions "Hinterland" and "Great North Land," which have been useful in bursts of

his battle in New Ontario, but there have been a few pioneer countries in which the settler might ride in a pullman coach and glide up the rivers in a canoe launch to his farm and home. The Timiskaming and Northern Ontario Railway with its branches operating between North Bay and Cochrane has lit the light into that country, and it, with modern inventions of all kinds in other lines, has altered the conditions under which a new country is being peopled and developed. Of the farm lands to the north, that part of the great "Clay Belt" which extends across the District of Timiskaming has attracted most attention. However, there are still Sudbury, Algoma, Thunder Bay, Kenora and Rainy River Districts, and to the north of them the District of Patricia large enough to be a Province in itself. This article is not intended to discuss at length the resources of New Ontario, for the writer has more particularly in mind the agriculture of the District of Timiskaming.

FARMING ON THE GREAT CLAY BELT.

After leaving North Bay one must travel 113 miles north through a wooded country, dotted with lakes connected by rivers, before New Liskeard is reached. This town is located on the southern limits of the clay belt on the T. & N. O. Railway, and around it, but more especially to the north, are some of the best farms to be found in New Ontario. The country is still very young and the settlers have done remarkably well to establish themselves as they have, but as years go by, there must be a tendency to keep more live stock and maintain the fertility of the soil. The writer is cognizant of all the obstacles that confront such a system of farming in the Timiskaming District, but farms now ten or fifteen years of age are conclusive evidence in favor of this



Protecting the Farm Machinery.

One of the two implement sheds on the farm of T. S. Loach, in the Timiskaming District.

oratory or journalistic efforts have tended to shroud the country in a veil of remoteness, separating it from the civilization which we, in Old Ontario, know so well, and causing readers or hearers to think of New Ontario as a vast country in the fastnesses of the north, a region "from whose bourne no traveller returns." The fallacy of this conception is at once apparent. Cochrane, at the most northerly point of the long steel line which the Provincial Government projected across the Timiskaming District, is practically one degree south of the city of Winnipeg, and on a line with the best agricultural country

argument. The best crops can not be obtained after selling hay and grain, and although the farmer might not procure the highest market price for his products when fed to live stock, yet the increased yields procured where manure is used, if only in small quantities, will more than balance the yearly operations in favor of the methods herein suggested.

There is a difference between the settler and the farmer. The former is clearing his land, selling pulpwood, and growing what crops he may find consistent with his work of making a living in a new country. All settlers do not make

farmers. and wood transforming soil is gets un... bushman... the routing goes before... labor, but... to the fa... as his on... developed... jority we... their fa... located t... from the... in this d... cance of... ultimately... Belt was... It is s... are consu... trict. C... would co... the reade... dispose o... there is... to handle... so the enc... two li... and they... board sup... ernments... become a... co-operat... farmer to... and stab... would rec... and sheep... pense, an... to the co... universal... trict at p... when th... Timiskam... is establi... Clover... pulpwood... stumps, Oats, spr... ceedingly... be seen t... also gro... potatoes... proper cu... oats and... crops, th... tario. One of... breaking... may be... Property... the land... a young... must of... homeste... home far... rious se... cause no... they are... hoping a... through t... increased... perhaps... way entit... developm... its power... tion the... Smaller... but they... give the... organizat... client lan... However... be taken... purposes... certain n... induce a... would be... A larg... ing is w... and bal... "white w... occur mo... The farm... have bee... tlers, an... of soil... and the... greater p... The fir... is cut an... the railr... has been... cutting a... tive settl... ance to... the rone... a good w... when cle...

ing District.

Furthermore, a settler in his shack at home, take the capital city of the Province. These two facts link New to Old Ontario and conscious conception regarding the part of the Province which offers man who will give his efforts to the mills and mines. We of the have I's end with wonder parents when they recalled the hardships and told of the pioneer's battle in New Ontario, but there have been few pioneer countries in which the settler might ride in a Pullman coach and glide up the rivers in a gasolene launch to his farm and home. The Timiskaming and Northern Ontario Railway with its branches operating between North Bay and Cochrane has let the light into that country, and it, with modern inventions of all kinds in other lines, has attracted the conditions under which a new country is being peopled and developed. Of the farm lands to the north, that part of the great "Clay Belt" which extends across the District of Timiskaming has attracted most attention. Howland, Sudbury, Algoma, and Rainy River Districts, of them the District of Patricia a Province in itself. This led to discuss at length the Ontario, for the writer has more of the agriculture of the District.

THE GREAT CLAY BELT.

North Bay one must travel 118 through a wooded country, dotted by rivers, before Newland. This town is located on the southern limits of the clay belt on the T. & N. O. Railway, and around it, but more especially to the north, are some of the best farms to be found in New Ontario. The country is still very young and the settlers have done remarkably well to establish themselves as they have, but as years go by, there must be a tendency to keep more live stock and maintain the fertility of the soil. The writer is cognizant of all the obstacles that confront such a system of farming in the Timiskaming District, but farms now ten or fifteen years of age are conclusive evidence in favor of this. Best crops can not be obtained and grain, and although not procure the highest market prices when fed to live stock, yet the manure procured where manure is used in large quantities, will more than make up for the loss. The operations in favor of the settlement between the settler and former is clearing his land, and growing what crops he may in his work of making a living. All settlers do not make

farmers. When the land is cleared, the timber and wood gone, and his 160 acres more or less transformed into a homestead where the chief pursuit, the settler sometimes gets uneasy and moves. This is the typical "bushman" who prefers clearing and braiding to the routine of actual farming, he is the one who goes before. Next will sometimes come the speculator, buying the partly-cleared farm and selling to the farmer who is to remain and till the land as his one occupation. All homes east are not developed in this tri-ownership manner; the majority we believe are not, for many have brought their families and their all into the country, located their homesteads, secured their patents from the Crown and prospered. We have indulged in this digression only to emphasize the significance of the word "farmer," for it is he who will ultimately prove that faith in the great Clay Belt was not misplaced.

It is stated that half a million bushels of oats are consumed annually in the Timiskaming District. Consider also the demand for hay that would correspond with this amount of grain, and the reader will realize at once the temptation to dispose of farm products directly. Furthermore, there is no organization of buyers and shippers to handle live stock as we have in Old Ontario, so the encouragement is slight indeed. At Matheson two live-stock associations have been organized, and they are using a pure-bred sharon, bull and boar supplied by the Provincial and Federal Governments. These organizations should in time become active enough to handle live stock in a co-operative manner, making it possible for the farmer to buy and sell to advantage. Buildings and stables also enter into the proposition and would require considerable capital, but beef cattle and sheep could be housed with reasonable expense, and they would undoubtedly be a benefit to the country. Although we cannot advocate a universal adoption of stock farming in the district at present, yet we look forward to the day when this system will be the practice in Timiskaming, as in any country where agriculture is established on a sane basis.

Clover is as native to this new country as pulpwood. Along the roadsides, between the stumps, everywhere, clover grows luxuriantly. Oats, spring wheat, barley and turnips do exceedingly well, and many were the good crops to be seen the last week of July. Fall wheat is also grown with considerable success, and potatoes thrive and yield heavily when the proper cultivation. The writer saw fields of oats and barley in Timiskaming, as well as other crops, that would shame like areas in Old Ontario.

One of the greatest hinderances to the speedy breaking up and settling of Timiskaming soils may be explained in one word—speculation. Property is held by parties who do not live on the land, neither are they developing it. When a young man wishes to launch out for himself he must often go some distance from his father's homestead before he can locate. Not because the home farm is always surrounded by other industrious settlers who are tilling the soil, but because non-resident locators are doing only what they are compelled to do by the regulations and hoping as the contiguous fields are improved through the sweat of other brows to profit on the increased value of the land so hogged, and thus perhaps reap a reward to which they are in no way entitled. Any Government looking to the development of New Ontario should do all within its powers to eliminate the element of speculation that tends to the scattering of homes. Smaller farms might have some disadvantages, but they would bring the people closer together, give them better roads, schools and social organizations, and at the same time provide sufficient land for many years on which to work. However, if the lots endowed upon veterans could be taken up and those held purely for speculative purposes could be "jumped" if the owner, after a certain number of years, did not settle on it or induce another to do so in his behalf, the country would benefit considerably.

ATTACKING THE RAW LAND.

A large proportion of the land in Timiskaming is wooded with spruce, balsam, birch, poplar and balsam poplar. The latter three are termed "white woods," and from observation appear to occur most commonly upon the more rolling land. The farms covered with spruce or mixed timber have been most easily cleared, according to settlers, and have revealed the most desirable kinds of soil. Spruce is the most valuable pulpwood, and the locator of such a homestead will reap a greater profit for his labors.

The first operation is clearing. The pulpwood is cut and floated down the rivers or hauled to the railroad, and although considerable stress has been laid upon the financial advantages of cutting and selling this commodity, the prospective settler should not attach too much importance to it. From \$4.00 to \$4.50 per cord, in the rough, amounts to be the general price and a good woodsman may make considerable money when clearing his land, but the average man

makes little more than wages by the time he has hauled and marketed his crop of pulpwood. In spite of this fact the outlet for such timber is of the utmost importance. It is usually cut in the winter when other work is scarce, and the settler is really paid for clearing his own land. This source of revenue was not available when the early settler strove for existence in the thickly wooded country. After the remaining trees and branches are piled and burned, clover is usually sown and scratched in with a harrow. This

apart readily in the spring, pulverize, and mixed with organic matter, make an excellent seed-bed.

FROM STUMPS TO GRAIN IN ONE YEAR.

The stumps are not always left to rot before being lifted. Last September, A. J. Kennedy procured a block of land in the wild state, and this season has 145 acres of grain and another 10 acres of roots, potatoes and corn growing where stumps and small timber stood less than 12 months ago. These fields would do credit to any Ontario farm. One important feature of the place was a large barn under construction measuring 46 feet by 104, and built according to the modern principles. The lighting and ventilation systems are complete, and when finished will be by far the most up-to-date barn the writer saw in the Timiskaming District. Mr. Kennedy believes no settler is a good farmer who does not feed his crops on the place, and with this in mind the stable is being equipped in a most convenient manner for feeding and care of the live stock.

Near Cochrane, M. Rothschild has 89 acres of crops on land broken during the last 12 months, and W. J. Baudry has been quite successful on a new farm just being cleared



Spring Wheat in Timiskaming.

This crop was photographed on the farm of E. F. Stephenson, on July 29, 1915.

clearance makes excellent pasture for some time, but the stumps which are only shelled and come out easily after from three to five years, and the land is ready to till. In some cases there is a considerable depth of muskeg, which is of a

from the wild.

TALES OF THE PIONEER.

One will meet men of all trades and professions in the Timiskaming District. From the college professor to the woodsman who never did ought but swing an axe, they are there; they come from far and near, but they are soon at home in the country of their adoption. T. S. Loach is one example of a man who went to the land and "made good." He did not "go back to the land" for he was not from it. Mr. Loach was born in Birmingham, England, and worked as a jeweller in Toronto for fifteen years. Not satisfied with life in the city he assembled his assets amounting to \$500, and moved his family fifteen years ago to the soil. The farm of his choice was wet. "There was not a foot of dry land on it," said Mr. Loach. A pair of cedar snowshoes were used to keep him above the mire while he sowed his first spring wheat, and the first crop was cut with a sickle. One would now be surprised to see the crops and implements on the place. From the plow and harrow to the threshing machine and grinder everything is complete. Neither are they "housed" out of doors, for two sheds have been erected to preserve the machinery properly. Only four years ago an accident with fire destroyed a complete line of implements and 30 tons of hay. Since that they have been replaced. A workshop has also been put up, and in it a carpenter's bench and outfit, a grinder, bone-crusher and saw all driven by a 16-horse-power engine. This farmer who came to the country with as much knowledge of farming as a jeweller requires in his trade said, "I can't understand people living in the city. This

district is all that is claimed for it, and all a man requires is a strong backbone and a willing hand."

Twenty-eight years ago John MacFarlane left Tarbut Lochline in Argyleshire, Scotland, and came to Canada. After farming for fourteen years in Huron County, Ont., he took his family, including ten children, and moved to Timiskaming.

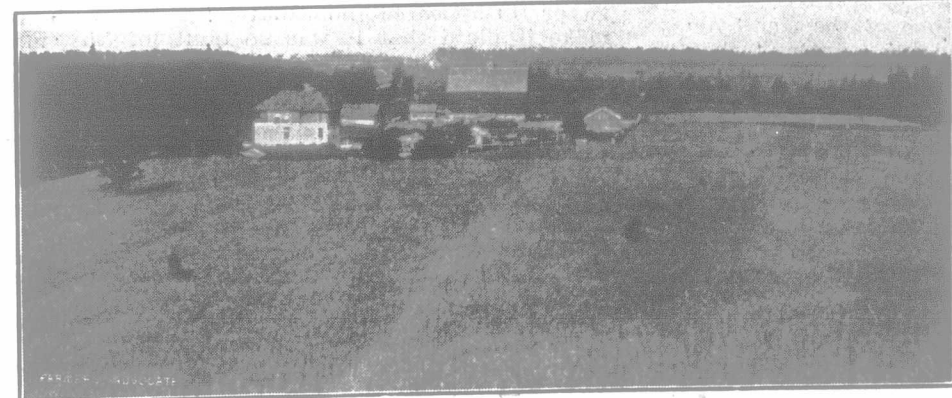
Here he rented a place for a short time, and then moved on to his present farm where he



Barley Does Well in Timiskaming.

This field of barley was cut and shocked on August 2, 1915. It is expected to thresh a large yield per acre.

mossy nature and detrimental to cultivation and growth of crops. This is loosened with a plow, exposed to the weather and burned. The good farmer is very careful when burning his land not to allow the fire to go too deeply and remove all



A Timiskaming View.

Overlooking part of the crops and the buildings on E. F. Stephenson's farm.

the decomposing organic matter or humus which overlies the clay. When properly executed the burning will leave the greater part of this substance, which is the life of the land for the first few years. The advantages which accrue from plowing the land in the fall cannot be too strongly emphasized. The share may turn up large lumps of clay in the autumn, but through the good offices of the winter frosts they break

has lived for eleven years. During this brief period the 150 acres, except one, have been cleared, fenced and brought under cultivation. A barn, 48 feet by 68 feet with 21-foot posts, was built in which to store the hay and grain, and now cement floors and rangers are being installed in the basement to accommodate stock. Mr. MacFarlane is a firm believer in alfalfa, and when visited had the plants growing in rows from

which to procure seed that would be hardy in that district. The writer never witnessed such a good example of the benefits of inoculation for alfalfa seed as the crop showed on this farm. The greater part of the seed was treated with nitro-culture, but a few rows were sown without being inoculated. No one, however, unobserving he might be, could fail to notice the difference in favor of the treated seed. This settler of early Timiskaming days has now a large farm to show for his fourteen years of labor in the pioneer country, labor that was not lightened by the advantages available to the present-day farmer.

About twenty years ago E. F. Stephenson moored his bark canoe near the mouth of the Wabigoon River, and with two men and a few of the most necessary utensils set out to hew his way into the forest. Last year the spring wheat scoring highest in the Field Crop Competition throughout Ontario grew on this farm, which had been reclaimed from the wild and brought under cultivation. Seventy-five acres are now arable, and thirty more acres are cleared and used for pasture. Some years ago Mr. Stephenson erected a plank-frame barn 86 feet by 46 from a plan which appeared in "The Farmer's Advocate" at the time. One alteration, however, was made. For the purlin plates sticks of timber 8 inches by 8 inches were used instead of plan's nailed together, which he considers materially strengthens the building. On a southern slope four acres of alfalfa has been growing for five years, and for four years it has been cut twice annually. This crop has been considered a success on the farm, and this year a westerly slope has been seeded somewhat as an experiment. The owner of Silver Spring Farm, as the place is called, has an occupation in town so the farm is rented at present, but twenty head of cattle and six horses are maintained to keep up the fertility. The accompanying illustration indicates the quality of a crop of spring wheat seen growing on the place, which for length of straw and size of heads could hardly be surpassed.

THE DEMONSTRATION FARM.

In order to test varieties of farm crops and secure information relative to all the various phases of agriculture as applied to the district, a demonstration farm is being operated at Monteith, with W. H. Clemens as Superintendent. The farm is far enough north that climatic conditions are fully tested, and any varieties or strains that do well at Monteith should prove hardy throughout Timiskaming where farming is being carried on. No less than 75 experiments are being conducted on the farm this season. In some cases perhaps the results will be of a negative character, but these are quite as valuable many times as those of a favorable nature. It is important to determine what crops and methods are not suited to any locality and eliminate them, giving place to those that prove their adaptability. Seed grains grown on the plots are sold at a nominal price to settlers. Pure-bred stock is also maintained, and the offspring sold in the same manner. In addition to this an excellent bull is kept in connection with the herd, and used by the farmers in the vicinity. More acres are being constantly added to the clearance, and records of all the costs of clearing, stumping, breaking and tilling are tabulated in such detail that valuable information can be dispensed regarding the operations connected with farming. A ten-acre field of red clover grown this year was exemplary of the suitability of Timiskaming soil for such a crop. Where live stock is not kept in large numbers the farmer cannot overlook the importance of this wonderful plant, for upon it depends the strength and life of his land. Last year the record hive of bees for Ontario was one of the small apiaries kept at the Monteith farm. Throughout the season these busy bees gathered 147 rounds of honey, and from June 23 to July 23 of 1915 a hive gathered 102 pounds.

Those engaged in agricultural work have the services of a District Representative, W. G. Nixon is now in charge of the work in that country, organizing, carrying ideas from one farmer to another, and advising as to the crops best suited to the district and how they should be handled.

The Kaiser's duty to the world should be complete, now that after a warning from the United States, he goes on and sinks passenger liners without giving the slightest time for the innocent to escape. As we heard one trooper remark the other day when reading the bulletin announcing the sinking of the latest victim of "Kultur"—"That is poor sport anyway." What can the neutrals think of it? Why would humanity be under German "Kultur"?

Political corruption is ever on its last legs.

THE DAIRY.

Cleanliness the First Consideration in Mechanical Milking.

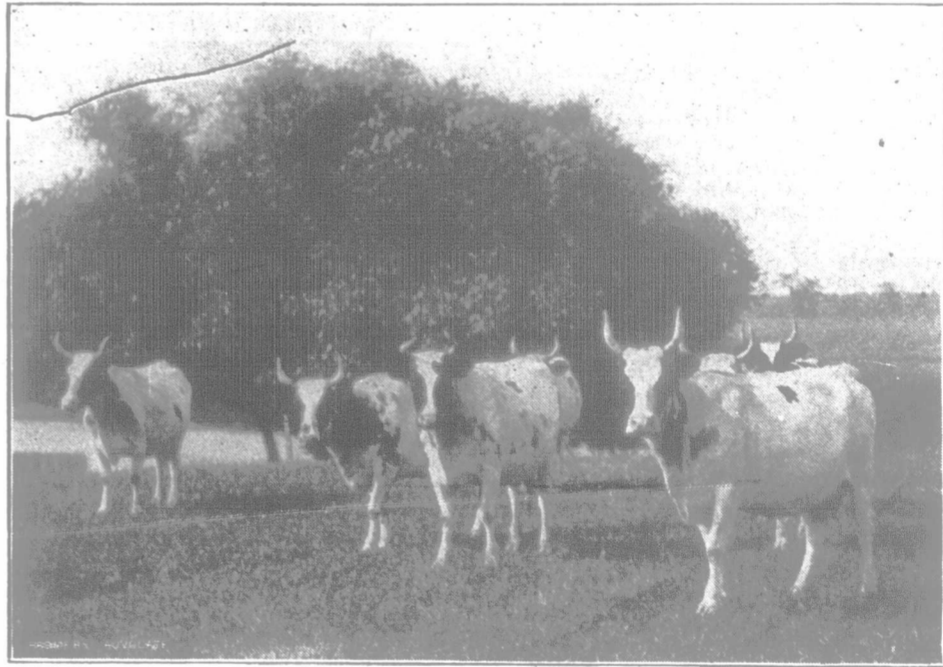
During the past forty years something over 200 patents, representing different types of milking machines, have been taken out, but it is only a little over two or three decades ago that the milking machine began to be seriously considered by the public generally, and dairymen in particular. The milking machine, as we know it, is a very recent invention, and it is only during the past four or five years that its installation in up-to-date dairy stables has been at all common. There are four types of machines now in use which Prof. Archibald, of the Central Experimental Farm, Ottawa, classifies as: (A) Those having intermittent suction, no squeeze to the teat and no vacuum in the can; (B) those having suction, pulsation and squeeze to the teat; (C) those having suction, pulsation, and downward squeeze, with the squeeze caused by the vacuum; and (D) those having suction, pulsation and no squeeze to the teat. It is not our purpose to discuss these different types in this article, so we leave the users to come to their own conclusions as to which is the better method of mechanically drawing milk from the cow.

A well-known English writer gives six conditions which must be summed up to determine the real value of the milking machine. These are: simplicity of construction, durability of parts, efficiency in milking, influence on the cow, milking intensity, and cleanliness. Readers will notice that cleanliness is placed last. We believe that the order should be reversed, particularly in view of the fact that the demand for cleaner, more

agent's word for the washing and did it, as little as possible. We believe some, at least, of this same trouble with the mechanical milker is traceable to the same cause. Every agent or machine man who handles any make of milking machine whatever, should emphasize to those who buy that it is absolutely necessary that the parts of the machine which come in contact in any way with the milk must be kept sweet and clean at all times in order that the highest quality of milk may be produced. It must be remembered that it is more difficult to produce sanitary or certified milk with machine milking than by hand milking. Tests with this have been made at Ottawa, and where the washing and sterilizing of machines was practiced to the test of expert knowledge, against the most sanitary method of hand milking there was, as a rule, less than one-third the total number of bacteria found in the hand-produced milk as in that produced by machine milking. Sometimes when the machine was not thoroughly cared for the bacterial count in the milk ran up as high as ten times the number in hand milking. It must be remembered, however, that the hand milk produced was much better than that turned out on the average farm, because all precautions were taken with the hand milking. We cite this case, not to make a point against the milking machine, for with care there is no difficulty in producing high-class milk for cheese factory, creamery or city sale from a herd milked with a mechanical milker, but to bring home to readers the importance of thoroughly cleansing their machines each day, in order that off-flavors and high bacterial content may not be found in the milk.

There are several factors which must be considered in producing good milk, namely: cleanliness of the cows; purity of the air in the barn; careful milking; thorough washing and sterilizing the utensils which come in contact with the milk, and this is where cleanliness with the mechanical milker comes in. It has been found that by simply rinsing the machine with cold water and afterwards with luke-warm water the bacterial count in the milk will be from 200 to 500 times as great as where good, careful hand milking is practiced, whereas, where the machine parts which come in contact with the milk are carefully rinsed in cold water and then washed with hot water containing a good washing soda, and this followed by thorough cleansing with the brushes and the sterilizing of all rubber parts in a 10 per cent. salt solution, 5 per cent. lime-water solution, 2 1/2 per cent. formalin solution, or a solution of water 72 lbs., salt 10 lbs., and chloride of lime 1/2 lb., will give far more satisfactory results; and with the other general precautions the bacterial count should not range more than five or six times that of real good hand milking. Where chloride of lime is used it must be added frequently. It is this point of washing and sterilizing the parts of the machine which come in contact with the milk that we wish to emphasize more strongly than any other. We have visited several farms upon which the various types of milking machines are in operation, and we found on these farms no complaints regarding the machines, and, on three visited in one day, where three different makes of machines were used the opinion expressed by the owners was that if they had to do without the machine they would do without the cows.

Most milking-machine operators give the parts of the machine coming in contact with the milk only one or two thorough washings a week. Some wash thoroughly once each day; none that we visited washed thoroughly after each milking, but all rinse the parts out and keep them in water or in some solution. At one place we found the parts in a wooden bucket containing salt-water solution, but care had not been taken to get all the tubing immersed in the liquid. The ends of several of the tubes protruded. Besides, dairy authorities tell us that a wooden pail or wooden bucket of any kind is not the most sanitary place to keep milking machine parts in a sterilizing solution. They prefer tin. At another place we found the machine parts all very sweet and clean, as they had just been thoroughly washed on the day of our visit. This dairyman washes his machine thoroughly once a week, and



Canadian Ayrshires.

sanitary milk and milk products is increasing rapidly in this country. Cleanliness should be the first consideration in all dairy work, not excepting the milking machine. We have recently heard of a few complaints regarding the milk delivered at cheese factories from herds where mechanical milkers were used. In several cases the off-flavor was traced directly to the milking machine, but when more care was taken to keep these machines sweet and clean the objectionable flavor disappeared immediately. We wish to make it plain that it was no fault of the machine, but was due to carelessness or a misunderstanding on the part of those operating the machine. The fact that the milk was all right as soon as better methods were followed in caring for the different parts of the milker demonstrates conclusively that good milk can be supplied from the milking machine just as easily as in the most sanitary operation of hand milking.

Those dairymen who remember the introduction of the cream separator have no difficulty in recalling instances where a similar trouble occurred in those days. A great deal of the difficulty was then directly due to the misleading teaching of agents to sell the machine. Naturally one of the first questions asked by a farmer or his wife contemplating the purchase of a cream separator, was, "is it hard to clean?" Agents soon found this to be one of the questions which they must get around in some manner, and, of course, they invariably advised that it took very little washing, some going so far as to state that once a day would do. The consequence was that a great deal of the milk from the cream separator, when first used, was not of the best quality. It was not the fault of the machine, nor of the operator, so much as of the agent who made the sale. The dairyman and his wife, having all the work they could handle, naturally took the

SEPTEM
depends o
The part
water be
sterilizing
third far
solution
according
two days
seem, to
flavors in
a distinct
been made
wish to
those wh
through
milking
milk twi
the best
where th
machine
labor nee
ing for t
involved
duces th
possible.
anxious
milk ap
believe
tory or
a high-g
reasonable
is enough
ing? I
is neces
tion, al
with the
sterilizing
water, l
will abs
particula
increase
to keep
teat cu
connecti
thorough
ventilat
may be
of dust
previous
should
taken,
from th
of all t
in the
difficult
the mil
dairymen
milking
consider
Of c
men co
gives t
econom
the lab
cised, r
be littl
only to
we visit
machin
econom
farms
milker.
done a
this ma
in a b
cows, o
herself
to thos
ing,
simple
done a
cups a
a quest
their n
a nerv
hand t
her cu
At
found
with t
boys
operat
boys f
have
little
cows,
strippi
comple
The
that p
of nea
of tro
placed
owner
workin
cows
all th
machin
bered
includ
factor

FOUNDED 1866

the washing and did it, as little believe some, at least, of this the mechanical milker is trace- cause. Every ag nt or machine any ma e of mil ing machine emphasize to hose who buy uly necessary that the parts of h come in contact in any way st be kept sweet and clean at er that the highest quality of duced. It must be remembered difficult to produce sanitary or machine milking than by hand with this have been made at e the washing and steriling of tic d to the best of expert know- most sani ary method of hand s, as a rule, less than one-third of bacteria found in the hand- in that p oduced by machine mes when the machine was not for the bacterial count in the high as ten lmes the number in t must be remembered, however, milk produc'd was much better out on the average farm, be- ions were taken with the hand e this case, not to make a point ng machine, for with care there producing high-class milk for emery or city sale from a herd mechanical mil'er, but to bring the importance of thoroughly ches each day, in order that h bacterial content may not be

eral factors which must be con- ing good mil , namely: (1) clean- purity of the air in the barn; careful milking; thorough washing and sterilizing the utensils which come in con act with the milk, and this is where cleanliness with the mechanical mil'er comes in. It has been found that by sim,ly rinsing the machine with cold water and afterwards with luke-warm water the bacterial count in the milk will be from 200 to 500 times as great as where good, care- ful hand mil ing is practiced, whereas, where the machine parts which come in- to contact with the milk are carefully rinsed in cold water and then washed with hot water containing a good washing soda, and this followed by thorough cleansing with the brushes

g of all rubber parts in a 10 per cent. lime-water solution, 2 1/2 a solution, or a solution of water lbs., and chlorine of lime 1/2 lb., e satisfactory results; and with precautions the bacterial count more than five or six times that d milking. Where chlorine of must be added frequently. It is shing and sterilizing the parts of h come in contact with the sh to emphasize more s rongly We have visited several farms various types of mil ing ma- eration, and we found on these nts regarding the machines, and, in one day, where three different nes were used the opinion ex- owners was that if they had to machine they would do without

machine operators give the parts coming in contact with the milk o thorough washings a week. oughly once each day; none that d thoroughly after each mil ing, e parts out and keep them in e solution. At one place we in a wooden bucket containing on, but care had not been taken ing immersed in the liquid. The f the tubes protrud. Besides, tell us that a wooden pail or any kind is not the most sani- ep mil'ing machine parts in a n. They prefer tin. At ano'her he machine parts all very sweet hey had just been thoroughly ay of our visit. This dairyman e thoroughly once a week, and

depends on rinsing the remainder of the time. The parts are kept in a large wooden tub, fresh water being put on them after each milking; no sterilizing material is used in this water. At a third farm we found the parts in a proprietary solution in a large galvanized tub, the solution, according to the dairyman, being changed every two days, but it had a distinct odor and did not seem to be at all suitable for keeping down bad flavors in milk. The parts themselves conveyed a distinct odor. However, no complaints had been made about any trouble with the milk. We wish to point out that it is, in the opinion of those who have operated machines, necessary to thoroughly wash and sterilize all parts of the milking machine which come in contact with the milk twice each day if a low bacterial count and the best class of milk is to be produced. Even where this is followed there should be from the machine a saving of at least 50 per cent. in the labor necessary when milking the cows and caring for the milk. It is this point of extra labor involved in keeping the machine clean that induces the dairyman to do as little washing as possible. All producers of milk may not be anxious to put on the market certified milk or milk approaching the certified standard, but, we believe that every man producing milk for a factory or for city use is anxious that his milk be a high-grade article. This being so, does it seem reasonable that a thorough washing once a week is enough, coupled with rinsing after each milking? It would seem that more frequent washing is necessary, and, in keeping the parts in solution, always be sure that they are all covered with the solution, and be careful to change this sterilizing material frequently. Even clean water, kept standing for several days in a vessel, will absorb odors and become bad. Any milk particles adhering to the machine parts tend to increase this trouble. Care must also be taken to keep the cows' udders clean and prevent the teat cups from dropping to the floor. In this connection it is always well to have the stables thoroughly clean before milking commences. Good ventilation is necessary that the air in the barn may be as pure as possible, and the stirring up of dust while the cows are being milked or just previous to their being brought to the stable should be avoided. With these precautions, care taken with the milk after it has been removed from the units, a thorough washing and cleansing of all the parts, and keeping them well submerged in the sterilizing solution, there should be no difficulty and no complaints about the milk from the milking machine. This, in the opinion of dairymen who have been following closely the milking machine, is one of the most important considerations in connection with this operation.

Of course, the first consideration the dairy- men contemplating the purchase of a machine gives to the project is in connection with the economy of it. If it will save 50 per cent. of the labor, even where the greatest care is exer- cised, and if the parts are durable, there should be little complaint in this direction. We have only to call attention to the three farms which we visited a short time ago to prove that the machine is considered by those who use it economical and efficient. On no one of these farms would they do without the mechanical milker. On one of them no stripping whatever is done after the machine. The night before we saw this machine in operation, the farmer, being busy in a belated harvest, his wife brought in the cows, did the milking and attended to the milk herself without any of the hard work well known to those who have had experience with hand mil- ing. This in itself proves that the machine is simple in construction, and, as no stripping is done after its work more than to work the teat cups a little at the finish, its efficiency is, un- questionable. The cows are not falling off in their milk flow because of the machine, and one, a nervous cow, which could not well be milked by hand takes to the machine and stands chewing her cud throughout the entire operation.

At the second place at which we called we found nearly forty head of cows being milked with the machine in charge of a number of the boys of the farm. When a machine can be operated by the women of the household or by boys from ten to twelve years of age, it cannot have many complications. At this farm very little stripping is done after the mil'er, a few cows, which are rather hard to milk, require stripping, but for the most part the machine completes the job.

The third farmer upon whom we called stated that with his machine he had no difficulty, and that he and his father could milk his large herd of nearly forty head without any great amount of trouble. The time given to milk a cow was placed at from six to ten minutes by these three owners, but it must be remembered that each is working two to three units, milking two to three cows at a time. This time is given as covering all the operations of milking and caring for the machine parts afterwards. It must be remem- bered that three different makes of machines were included in this visit and all were proving satis- factory, having been in operation from two to

three years respectively, and having cost very lit- tle so far for repairs.

While mentioning repairs it would be well to point out that old rubber tubing, rough and cracked, tends to a much higher bacterial count in the milk than where newer tubing, compara- tively smooth, is used. There is a point in this for the man producing clean milk. Do not use tubing which is worn out.

On most farms where a small gasoline engine is brought into use to do the milking, this engine is used for other purposes as well. Some do the churning, run the washing machine, cut feed and all such odd jobs in the household and around the barn with this engine. This helps cut down the actual expense of installation.

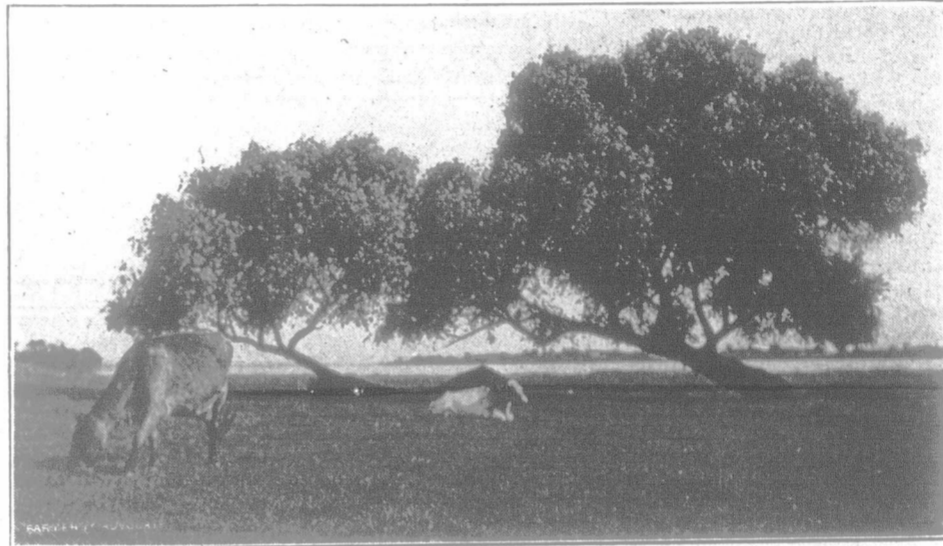
By mentioning the fact that a woman or a small boy could operate the machine, we do not wish to convey the impression that care is not necessary. A certain amount of care is necessary

stricter tab on it and on their cows. The milk- ing machine seems destined to do the milking while the operator does the stripping. We would again, however, emphasize cleanliness in its operation.

The Farmer of the Future.

"Personally I believe that agriculture is the fundamental profession, that it is one in which a man can have greater opportunities for develop- ment, have broader views of life and render more efficient service, than in any other activity in which man engages. But much depends upon the point of view. There may be carried into agri- culture the same selfish principles that have made commerce synonymous with greed and Wall Street synonymous with robbery; but that is not the kind of agriculture that I have in view. On the farm alone a human unit can come into real com- munion with nature.

In the fields he sees illustrated better than anywhere else the unalterable laws of nature working for the benefit of human- ity. In the forest he can sit with the trees and God as his auditors and dis- course upon life as he can do in no other environment. The ris- ing of the sun in- spires him, the gath- ering of the storm awes him, the beauty of nature charms him, the joy of life consoles him. I can- not get it out of my mind that the na- tural must in all cases be superior to the artificial. I can- not escape from



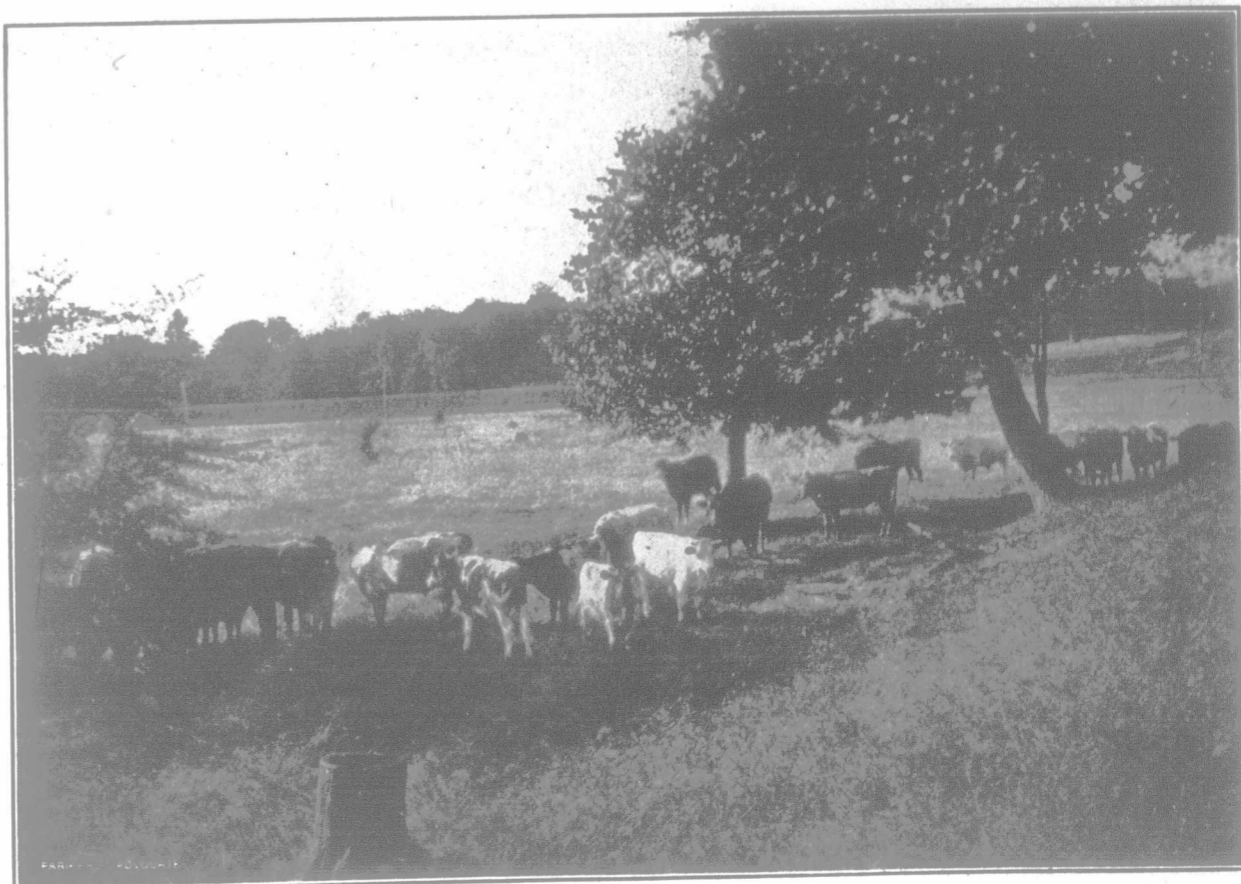
The Willows.

in any operation, and the milking machine is no exception to the rule. The operator must be thoughtful, intelligent, and must understand the machine, and particularly the means of keeping it clean.

With the labor problem as it is and the milk- ing machine standing in the favor it does so soon after its introduction to the various dairy- ing districts, we believe that the greater part of the milk produced, will, in the very near future, be drawn from the cow by the mechanical milker. Like the automobile the milking machine is here to stay, and must, with the modern improvements which will come to it, increase in efficiency and popularity. There seems to be no doubt in the minds of those who have seen the various types of machine worked and have talked with those who have been operating them for two or three years, but that the machine is efficient and is taking already an important place in the milk production of this country. Many owners of machines state that, with no after stripping what- ever, the machine mil's the cows drier than the average hired man will. Most dairymen prefer to strip after the machine in order to keep a

the belief that the man who lives in closest touch with nature, other things being equal, will, be the best man and have the broadest view of human life, human activity and human destiny. The farmer of the future, if he develops in accordance with the views which I have tried to express, will be the leader of thought, the expounder of the true philosophy, and the conservator of wholesome politics for the nation."—Dr. Harvey W. Wiley, formerly Chief Chemist, N. S. Department of Agriculture.

We never favored keeping dairy calves in a thin, half-starved condition. Many seem to think that the dairy calf must not be fed very much for fear of it developing a beef type not condu- cive to heavy milk production. Feed the calves well and do not worry if the young heifers get a little thick. If they have milking breeding then they will soon milk down when they freshen and are far more likely to make good cows than heifers raised on scant rations with poor care.



Dairy Cattle in the Noon-day Shade.

POULTRY.

Poultry Housing and Poultry House Construction.

By F. N. Marcellus, B.S.A.

The housing of poultry is no doubt better understood now than it was a few years ago, yet much remains to be done. It is not necessary for one to travel far through the country to be impressed with the fact that bad housing and environmental conditions existing on many farms, are responsible for the poor returns many people are getting from this branch of their farm operations.

It is altogether too common a sight to visit poultry houses on the farms during the Fall and Winter months, and find the droppings of the preceding year still in the pen. This, coupled with the presence of a heavy coating of frost on the walls and ceiling due to poor ventilation of the pen, certainly presents conditions far from being sanitary, healthful and conducive to the best returns from the flock. It is often difficult to understand why many people clean their stables where other classes of stock are kept, regularly once or twice a day, yet will only clean the poultry house once or possibly twice a year. The best-bred birds obtainable, will not produce under such conditions. The droppings should be removed at least once every two weeks, and if dropping boards are used under roosts they should be cleaned daily. Once a year houses should be thoroughly cleaned and white-washed with lime white-wash containing ten per cent. of some disinfectant as crude carbolic-acid, and applied preferably with a force spray.

The ventilation of the poultry house does not receive sufficient attention as this is possibly the most important factor to be considered in the housing of the birds. The presence of frost on the walls of the pen during late fall and winter is one of the surest indications of poor ventilation. The moisture-laden air must be carried off from the pen and replaced with dry, fresh air, thereby keeping the pen in a more sanitary condition. This interchange of air must take place without causing drafts in the house as drafts are highly conducive to the development of colds and roup, just as is dark, damp, comparatively warm quarters ideal for the development of tuberculosis. We should, therefore, aim in constructing houses for poultry to have them as bright and airy as possible consistent with dryness and freedom from drafts.

In the accompanying illustrations are shown plans of two poultry houses. It will be noticed that the houses are both along the lines of the open, cool type in which there is an abundance of fresh air. A house embodying these features is undoubtedly best, as the returns which are secured from the birds in one similar, have been better in numbers of eggs, health of stock and hatching power of eggs in the spring, than where birds were housed in the warm, closed type of house. It has also been further noted that frosting of combs of the birds is not nearly so common in the cool, well-ventilated house as in the warmer, damp, poorly-ventilated house when the temperature goes below freezing.

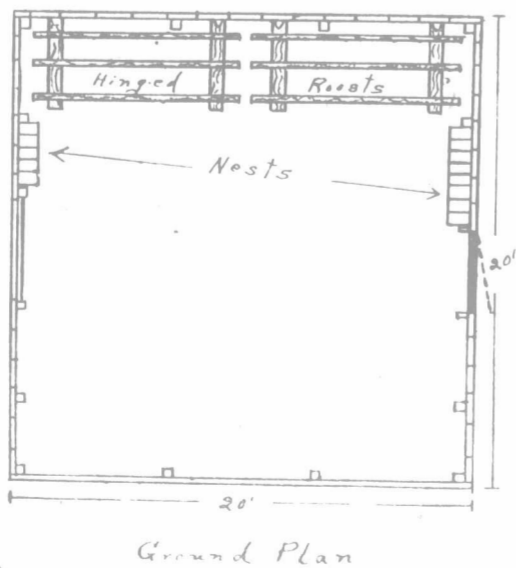
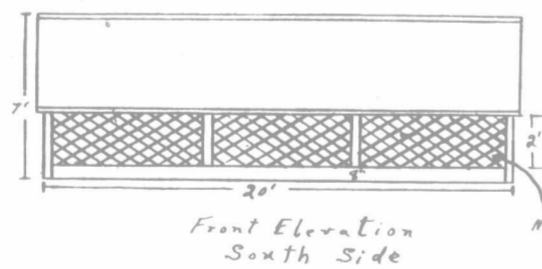


Fig. 1 House for 100 Hens.

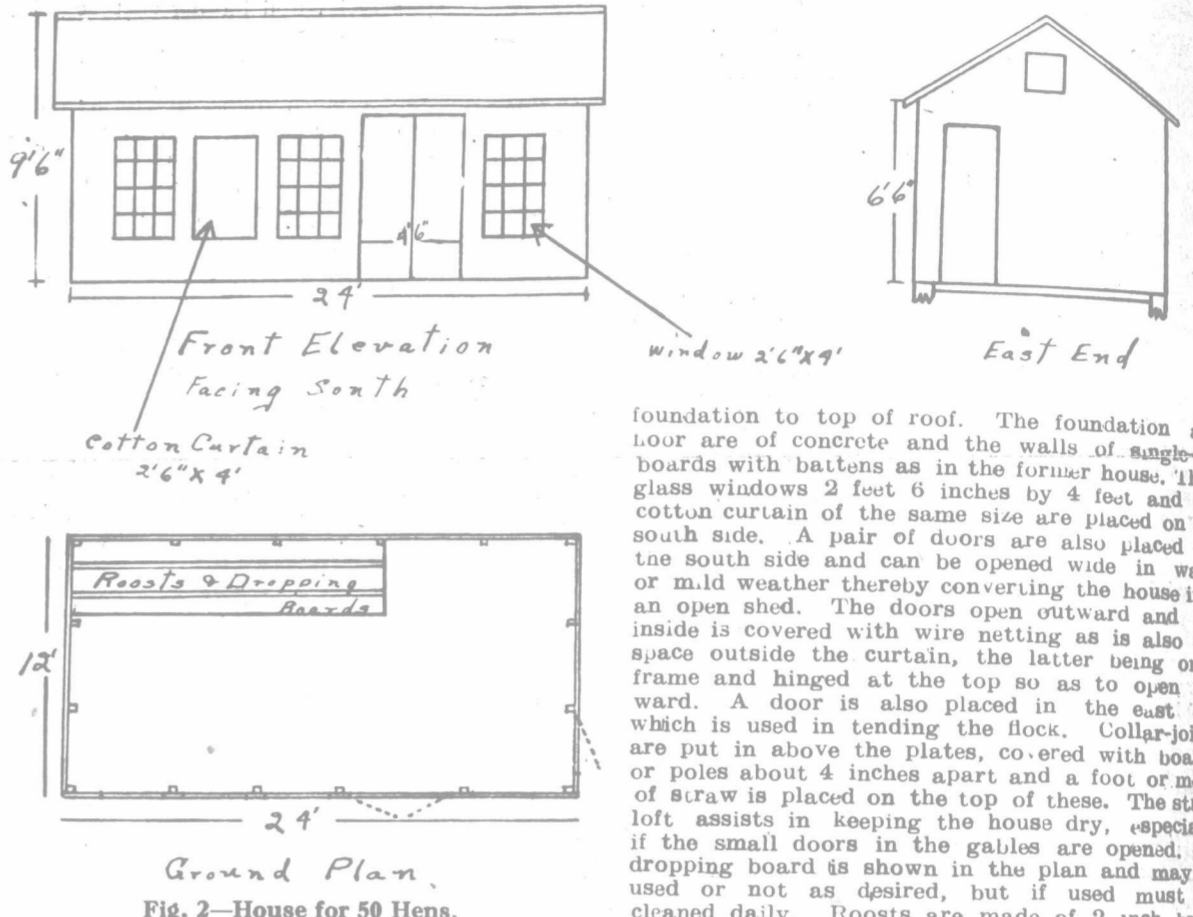
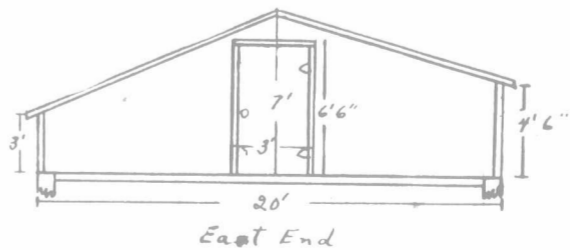


Fig. 1 gives the working plans of a house large enough to accommodate a flock of one hundred hens. This house is 20 feet by 20 feet, 4 feet 6 inches high at the back and 3 feet high in front, while the height in the centre is 7 feet. It is built of single-ply boards 8 inches or 10 inches in width, dressed on one side, but not tongued and grooved, and 3 inch battens over the cracks. The roof is first sheathed with a good quality of sheathing and then covered with a good roofing paper. The paper is preferable to wood shingles as it is more durable on the flat roof. The house is built on a concrete foundation and has a floor of the same material which is raised at least 8 inches above the ground level at its highest point. The filling for the floor is of coarse stone which prevents moisture rising through the floor by capillarity. A window 4 feet by 5 feet is placed in the west end of the house and a door 3 feet by 6 feet 6 inches in the east end. These are kept closed except in late spring and summer when they are opened for greater circulation of air in hot weather. The studding is of 2 inch by 4 inch material; the rafters are 2 inch by 6 inch and are supported by a ridge pole 2 feet by 6 inches which is again supported by a post in the centre of the pen. It will be noticed that the front is only covered by 1-inch mesh wire netting 2 feet in width while an 8-inch board at the floor and 4 inch by 4 inch plate take up the balance of the 3-foot front.

The roosts are placed along the north side of the house and the nests in the spaces between the roosts and the window, and door. The nests may be in one tier or built in two tiers, one above the other. The large opening in the front where found too cold as in sections of Ontario north of a line east and west through the town of Barrie, may be covered with a drop curtain which should be let down only in extreme weather.

In fig. 2 is given the plan of a house 12 feet by 24 feet which will accommodate fifty hens. It is built with a double pitch roof, 6 feet 6 inches from foundation to eave and 9 feet 6 inches from



foundation to top of roof. The foundation and floor are of concrete and the walls of single-ply boards with battens as in the former house. Three glass windows 2 feet 6 inches by 4 feet and one cotton curtain of the same size are placed on the south side. A pair of doors are also placed on the south side and can be opened wide in warm or mild weather thereby converting the house into an open shed. The doors open outward and the inside is covered with wire netting as is also the space outside the curtain, the latter being on a frame and hinged at the top so as to open inward. A door is also placed in the east end which is used in tending the flock. Collar-joists are put in above the plates, covered with boards or poles about 4 inches apart and a foot or more of straw is placed on the top of these. The straw loft assists in keeping the house dry, especially if the small doors in the gables are opened. A dropping board is shown in the plan and may be used or not as desired, but if used must be cleaned daily. Roosts are made of 2 inch by 4 inch material placed at 12-inch centres. If dropping board is used it should be 30 inches from the floor, and the top of roosts 10 inches from dropping board. If no dropping board is used then roosts should be 30 inches from floor and always place all roosts on the same level.

In constructing a house for a flock of twenty-five to thirty birds one much similar to the one just described would answer quite satisfactorily with only a few alterations. A house 12 feet by 14 feet with double doors on the front and a window on each side of these as described above and shown in figure 2 would meet the requirements for a flock of this size. If preferred the house might be turned with the longer measurement from front to back which would enable one to place roosts farther from the front.

In the construction of houses for poultry three sides should be perfectly draft proof. This is especially important where the house is of the open-front or curtain-front type. It must also be remembered that where using either type of house one must never have more than one opening in the house at the one time, as two windows, two doors, window and door, or two curtains, as under such manipulation there is bound to be a draft develop. Curtains, where used, should be kept free from dust else they will lose their value as ventilators.

The Last Great Fight.

She wakes! and the clang of arming echoes through all the earth
The ring of warrior's weapon; stern music of soldier's mirth
In the world there be many nations and there gather round every Throne
The strength of earth-born armies, but the sea is England's own,
As she ruled, she still shall rule at, from Plymouth to Esquimault,
As long as the winds are tameless, as long as the waves are salt,
This may be our Armageddon;
Seas may purple with blood and flame
As we go to our rest forever leaving the world a name.

What matters there have been none like us nor any to tame our pride
If we fall we shall fall as they fell, die as our fathers died,
What better? the seas that bred us shall rock us to rest at last
If we sink with the Jack still floating nailed to the Nation's mast.

[Note.—Concluding lines from verses entitled, "The Sea Queen Wakes," by Capt. C. H. Phillips-Wolley, in "The Colonist," British Columbia, 1896.

The British Farmers' Chance.

"This is the hour in which the farmer should come to his own. What he needs is not more education, but the opportunity to take out of the land all that it can possibly produce. Every acre of land that can carry a sheep or a calf should be utilized to that end. The gamekeeper should give way to the shepherd, and an effort be made to put sheep and kine on every acre of land that will carry them. Foxes should go, and every facility be afforded for the extended production of eggs and bacon."—Scottish Farmer.

SEPTEMBER
HO
Grow
Editor
Accor
Seed Co
following
Canada
the estim
Mang
Garde
Swede
Garde
Cabb
Cauli
Radis
Field
Paras
Celery
It may
ties will
number
minion h
especially
selection
be growe
procure,
ing. Th
it with
good hop
portant
be found
has been
Root
as unifor
tivated p
subject t
to qualit
the prop
If the se
seed will
careful
a delay
develop
ly attac
begin to
ground
sequently
grown
possible
to hang
place.
larger a
At th
pods ger
the colo
dication
ascertain
cover of
Mang
seed is
side the
upon cu
clusters
stalks a
are tied
stooked
a few d
be hauled
with an
been re
farming
which sh
Then it
away.
Crucif
the seed
cauliflo
The flow
smooth
when rip
reddish-p
The first
stalks r
seed is
should
It is tin
plants w
ting br
the last
seed thr
ly easily
practice
fall on
after cu
seeds
cocks f
either

HORTICULTURE.

Growing Seed From Roots and Vegetables.

Editor "The Farmer's Advocate":
According to the calculations of our energetic Seed Commissioner at Ottawa, Geo. Clark, the following amounts of seed ought to be grown in Canada during the present year in order to meet the estimated shortage of imported seed:

	Lbs.
Mangel Seed	472,500
Garden Beet Seed	6,300
Swede Seed	275,000
Garden Turnip Seed	1,900
Cabbage Seed	1,600
Cauliflower Seed	105
Radish Seed	4,200
Field Carrot Seed	16,800
Parsnip Seed	2,100
Celery Seed	1,260

It may be questionable whether these quantities will be produced this year even though a number of growers in different parts of the Dominion have responded to the call. Seed growing, especially of biennial plants, requires considerable selection and preparatory work, and many would-be growers neither had, nor could they in time procure, the necessary stock for this year's planting. The fact remains, however, and we mention it with a great deal of satisfaction and with good hope for the future development of this important work, that patches of seed plants are to be found in several places where a successful start has been made.

HARVESTING AND THRESHING.

Root and vegetable seed does not ripen nearly as uniformly as the seed from our commonly cultivated plants. The grower is therefore more subject to loss in regard to quantity as well as to quality, unless the seed plants be harvested at the proper time and treated with particular care. If the seed stalks are cut early, too much of the seed will remain immature even with the most careful subsequent drying. On the other hand, a delay in cutting, i. e. cutting after the first developed seed clusters commence to become loosely attached to the stalks or when the seed pods begin to split, may result in the falling to the ground of much of the best developed and consequently the most valuable seed. Where seed is grown only in small quantities it is of course possible to cut off the ripened seed gradually and to hang it up or spread it out in a well-aired place. But this method is impracticable on a larger acreage.

At the time of ripening the clusters or seed pods generally become brownish or yellowish, but the color of the cover is not always a safe indication of the state of maturity. In order to ascertain this it is advisable to cut or break the cover of some seeds from time to time.

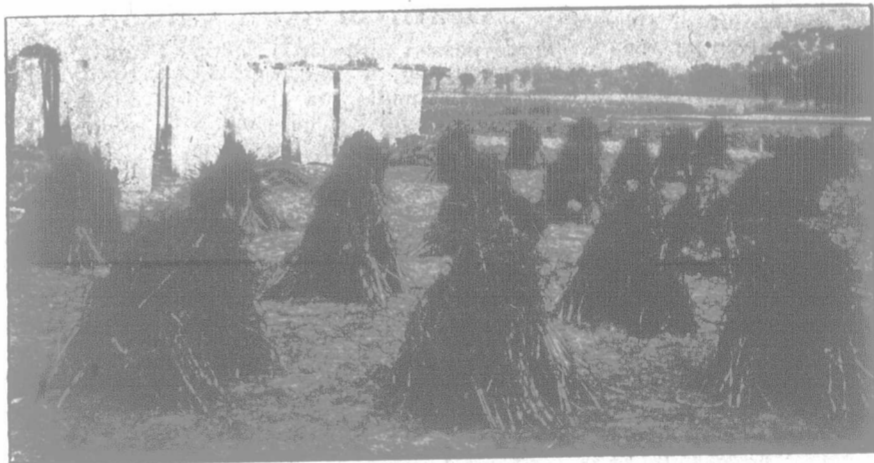
Mangels and Garden Beets.—Mangel and beet seed is ready to harvest when the true seed inside the cluster shows a mealy or floury surface upon cutting. It is of no consequence if the clusters be almost green on the outside. The stalks are cut off with a sickle or a sharp knife, are tied together in small sheaves and are stoked with 4 to 8 bundles to each stook. After a few days of dry weather the seed is ready to be hauled home for threshing. This can be done with an ordinary mill on which some teeth have been removed. The seed is cleaned on a good farming mill and is spread out in thin layers which should be shuffled daily until quite dry. Then it may safely be put in bags and stored away.

Cruciferous Plants.—The flowers, the fruit and the seed of swedes, garden turnips, cabbage and cauliflower resemble each other more or less. The flowers are yellowish, the fruit consists of a smooth elongated silique which splits lengthwise when ripe, and the seed is almost round with a reddish-purple or dark-brown to black color. The first formed seed on the lower parts of the stalks ripens earlier than the rest, and as this seed is stronger than the later formed, the grower should endeavor to save it before it falls off. It is time to harvest the seed of these cruciferous plants when the bottom siliques or pods are getting brown on the outside and the upper ones, the last set, have attained a yellowish color. The seed threshes out very readily and is consequently easily lost. Some growers therefore make a practice of giving the stalks a few tans with a flail on a big tarpaulin in the field, immediately after cutting, thereby securing all the first ripened seed. The stalks are then put in well-ventilated cocks for subsequent drying and after maturing either in the field or in a drafty place in the

barn. For this purpose a three-foot-high wooden tripod is placed on a tarpaulin, and the seed stalks are piled up around the tripod in such a way as to let the air circulate freely in the cock. The remaining seed ripens quite well and may later be threshed out on a mill or with a flail before final cleaning on the fanning mill.

Garden radish, although belonging to the same botanical family, differs from the above mentioned in the shape and structure of the seed pods and in the color of the seed. The seed of the radish is reddish-brown in color and sits enclosed in a conical-shaped, slowly-hardening, fleshy pod which is not nearly as apt to split open as the others. When ripe the plants are cut off, tied into small bundles and are left to dry in stooks. It is necessary to exercise a certain amount of care in the threshing of radish seed in order to avoid crushing or hulling. The seed is easily cleaned on a good fanning mill.

Umbelliferous Plants.—Carrots, parsnips and celery belong to the same family, Umbelliferae. A common characteristic of them all is that the seed ripens rather unevenly. But, whereas it is possible to obtain a fairly satisfactory yield of seed from parsnips and celery in one cutting, it is absolutely necessary to pick or cut off the ripened umbels of the carrots for several consecutive weeks in order to secure quantity as well as quality. In the case of celery, maturity is easily recognized as the seed takes on a light brown color. The same holds in regard to parsnips. At this time of the year a seed bearing carrot plant will present fruits and flowers in all stages from a fully-matured, brownish umbel down to just opening greenish-white flower buds. Carrot umbels which have been picked off from the stalks are stored in an airy place until the harvesting is finished, and the whole crop is then threshed together. The fruit of the carrot is covered with long spines on the end of which are three or four hooked hairs. It is on account of these spiny projections that the fruits cling together and prevent the seed from being sown evenly unless "rubbed off" after threshing. Where carrot seed is only grown for home consumption the rubbing may be done by hand while the seed is enclosed in a bag. But this method is too slow and too expensive where larger quantities are handled. Effective "rubbing" may be procured through



Seed in Stooks.

Mangel seed in stooks at Macdonald College. To the left are isolation tents for family roots.

using a threshing mill, on which the cylinder has been tightly closed after being half-filled with seed.

CONCLUSIONS.

For home consumption in general and in the case of such expensive seed as that of cabbage, cauliflower and more prominent strains of celery it will always be expedient to harvest the seed subsequently. But where ordinary root and vegetable seed is produced under field conditions the grower must watch and choose the proper time for cutting and must take every precaution, by using sheets or tarpaulins in the bottom of the wagon etc., in order to prevent losses. In all cases it is essential that the seed be perfectly dried, through shuffling and airing, before it is stored away in bags.

In Ontario, seed has been grown successfully from all the plants under discussion. Root seed and vegetable seed has been produced at the Ontario Agricultural College, by the Dominion Sugar Company, Berlin, the Ontario Seed Company, Waterloo, and by a number of other private growers. At Macdonald College, St. Anne de Bellevue, and on trial plots in different counties in the Province of Quebec we have grown seed for a number of years of mangels, beets, swedes, turnips, carrots, cabbage and other vegetables with splendid results as far as quality is concerned, and with quite satisfactory though somewhat varying yields. The experience gained during the present year ought to furnish excellent material for interesting discussions at the meetings of the coming winter.

Macdonald College, Que.

P. A. BOVING.

FARM BULLETIN.

Make Believe.

By Peter McArthur.

During the past weeks I have been privileged to watch the various transformations of a little express wagon. A couple of active imaginations have made it one of the most wonderful things that was ever on the farm. When we began harvesting there was the sound of much hammering in the granary and presently the express wagon appeared with a serviceable rack. Hay that fell from the large rack was promptly loaded on the little rack, hauled to an out-of-the-way place and stacked with all possible gravity. The grown-ups were not a bit more serious about their work than the two littlest boys. They hawed and gee-ed and backed around and scolded when the load was not brought near enough to the stack to make easy pitching, just like their elders. As I watched them and listened to them some of the expressions used seemed strangely familiar, and I remembered an article by A. E. Carman of the Montreal Star in which he demonstrated that the keenest satire on any man is his own son. Those imitative young rascals, not knowing that I was watching them, gave me a pretty fair idea of how I looked to them when doing things. Of course it was flattering to find that their ambition was to do things as I do them but it gave me a side slant at my methods that was somewhat disconcerting. But presently the harvesting game lost interest and the little express wagon underwent a magic change.

For some weeks the automobile visitors were rather plentiful, and it was only natural that the boys should want an automobile. Then I had a chance to see how some of my friends looked to them. The rack was taken off the express wagon and a box put in place to form the body of the automobile. In the front part of the box were placed a number of loose cog-wheels, bolts, and scraps of old iron to represent the machinery. At the back there was a compartment for the tools—a hammer with a four-inch handle, a hatchet, without a handle, a handful of bent nails, and

other articles too numerous to mention. A secret examination of the automobile showed that parts of an old fanning mill, a cream separator of earlier days, an ice-cream freezer and part of a potato ricer had been put together strangely to make the wonderful engine. There was a seat for the chauffeur and with the tongue of the wagon turned back where he could grasp it the driver was furnished with a practical steering gear. But the most realistic touch of all was the gasoline tank. It consisted of a can of water to which the necessary odor had been added by squeezing some onion juice into it. When the

automobile was in action a triple expansion boy got behind it and shoved. As some one remarked it was provided with both a chauffeur and a shover. But I mustn't forget one of the most important touches. There was a crank fastened on the front of the wagon and every time before it started the chauffeur jumped out and cranked wildly while the shover behind got up steam, making a sound with his lips that was a fair imitation of the gasoline explosions on a real automobile. One point of their imitation failed, however. Try as they would they couldn't manage to run over a hen or the dog the same as real automobiles do. And when things went wrong there was real excitement. Both of them would lie on their backs with their heads under their automobile and hammer and scold just like grown-ups. Although the township is full of automobiles I doubt if anyone with real cars got more enjoyment than the two boys did.

I have long been of the opinion that children get more real enjoyment out of their make-believe toys, which enable them to use their imaginations than they do from the highly finished ones which we buy for them. My observations in connection with the automobile has convinced me that this view is right for during the height of the automobile season they put together their pocket-money and sent away for a couple of little air guns and targets. When the consignment came home I was somewhat put out to find that the targets wore tin soldiers and I didn't like the idea of the children playing at the war game when we are suffering so much from the reality. But I knew that if I forbade



East End

of roof. The foundation and concrete and the walls of single-ply concrete as in the former house. Three feet 6 inches by 4 feet and one the same size are placed on the air of doors are also placed on and can be opened wide in warm thereby converting the house into the doors open outward and the with wire netting as is also the curtain, the latter being on a at the top so as to open in also placed in the east end tending the flock. Collar-joists the plates, covered with boards inches apart and a foot or more on the top of these. The straw being the house dry, especially in the gables are opened. A shown in the plan and may be desired, but if used must be posts are made of 2 inch by 4 ed at 12-inch centres. If drop it should be 30 inches from top of roosts 10 inches from If no dropping board is used d be 30 inches from floor and roosts on the same level.

a house for a flock of twenty- rds one much similar to the one uld answer quite satisfactorily alterations. A house 12 feet by le doors on the front and a ide of these as described above ure 2 would meet the require- of this size. If preferred the rned with the longer measure- o back which would enable one rther from the front.

ion of houses for poultry three rfectly draft proof. This is t where the house is of the ain-front type. It must also be here using either type of house ve more than one opening in ne time, as two windows, two d door, or two curtains, as lation there is bound to be tains, where used, should be st else they will lose their s.

ast Great Fight.

the clang of arming echoes the earth or's weapon; stern music of rth e be many nations and there d every Throne rth-born armies, but the sea is wn,

he still shall rule it, from o Esquimault. nds are tameless, as long as re salt, rraggeddon; ith blood and flame rest forever la ing the world

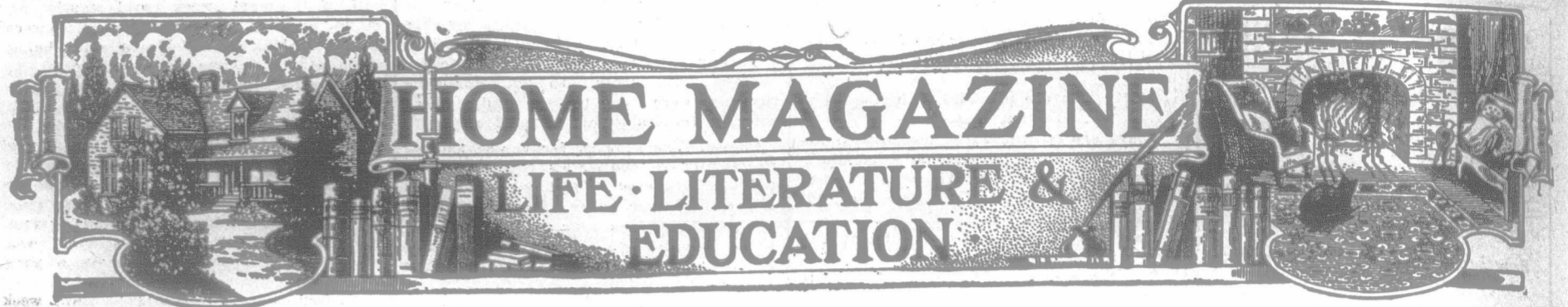
e have been none like us nor our pride l fall as they fell, die as our

seas that bred us shall rock t last e Jack still floating nailed to mast.

ng lines from verses entitled, "akes," by Capt. C. H. Phillipps-Colonist," British Columbia.

h Farmers' Chance.

ar in which the farmer should What he needs is not more opportunity to take out of the a possibly produce. Every acre rry a sheep or a calf should end. The gamekeeper should epherd, and an effort be made ne on every acre of land that Foxes should go, and every for the extended production of Scottish Farmer.



Autumn Magic.

By Louise Imogen Guiney.

Soon as divine September, flushing from sea to sea,
Peers from the whole wide upland into eternity,

Soft as an exhalation, ghosts of the thistle start:
Never a poet saw them but ached in his baffled heart.

Oh, what a nameless urging through avenues laid in air;
Hints of escape, unbodied, intricate, everywhere;

Sense of a feared denial, or access yet to be won;
Gleams of a dubious gesture for guesses to feed upon!

Flame is flying in heaven, the down on the cool hillside:
Earth is a bride-veil glory that can not conceal the Bride.

—From The Atlantic Monthly (October).

Cheap and Convenient Summer Dwellings.

By P. B. Walmsley.

A friend of mine, who is a back-to-the-lander, though not a regular farmer, lives on the shore of one of the lakes in the highlands of Ontario much frequented by tourists. He and his wife find profitable occupation in summer in catering to the wants of the goodly number of summer people in rather a unique fashion. That is, they do not run a conventional summer hotel or boarding-house, where most of the guests sleep under one roof. Instead, they have a number of what they call "camps," which are really a compromise between a tent and a cottage. All the guests take their meals at the house, but spend much of their time and sleep in their several camps. Originally, they provided tents, but gave these up for various reasons, such as their heat in the day-time, short life, necessity for removal and storage at end of each season, entailing the same trouble with bedsteads and mattresses, occasional leaky roofs, and difficulty of giving sufficient ventilation at night without letting in mosquitoes, etc.

The substitutes give satisfaction. The first is a hexagonal structure, each side being six feet six inches. Height from floor to sill six feet six inches. Roof ($\frac{1}{2}$ pitch) is composed of one of the composition materials now on the market. Sides are all of hemlock slabs, cut with the bark on, six inches wide. Floor is of inch boards. Three sides have windows, or, rather, the upper half opens upwards on hinges. There is no glass. One side is left for a doorway. Across this are hung curtains made of heavy, brown duck. The inside of door and windows is protected with cotton mosquito-netting. As for cost, if he was putting one up for anyone else, he would charge \$100 to cover material and labor, and his own trouble. Of course, a handy man putting one up for himself, could do it for much less.

The second plan is what they call a "tent house," more open than the first, and larger. It is twelve feet square on the floor, and is boarded completely on one side and open on the other three. The roof is of shingles. There is a board floor. When in use the sides are protected by heavy canvas hung by ropes, or loops along the sill. The compact camp looks himself, according to the weather, as to how much protection he needs. The permanent uprights allow of effective screening with mosquito-netting, and, consequently, the

sides are left entirely open except for this.

These tent houses are set by themselves in groves of balsam and young spruce near the lake shore, so quiet and privacy can be obtained, yet, when the occupant wishes, he can emerge from his solitude to mingle with the merry throng on the house veranda.

Such methods could be adopted by many farmers located near lakes. They save labor to the owner and his wife, and are full of the next-to-nature idea

knowledge is too certain, too cold, too real.

It is true that I have not always met the fine adventure nor won the friend, but if I had, what should I have more to look for at other turnings and other hilltops?

The afternoon of my purchase was one of the great afternoons of my life. When Horace put me down at my gate, I did not go at once to the house; I did not wish, then, to talk with Harriet. The things I had with myself were too

I might swell with dignity and importance—for once, at least.

So I started at the fence corner back of the barn and walked straight up through the pasture, keeping close to my boundaries, that I might not miss a single rod of my acres. And, oh, it was a prime afternoon! The Lord made it! Sunshine—and autumn haze—and red trees—and yellow fields—and blue distances above the far-away town. And the air had a tang which got into a man's blood and set him chanting all the poetry he ever knew.

"I climb that was a clod,
I run whose steps were slow,
I reap the very wheat of God
That once had none to sow!"

So I walked up the margin of my field looking broadly about me; and presently I began to examine my fences—MY fences—with a critical eye. I considered the quality of the soil, though in truth I was not much of a judge of such matters. I gloated over my plowed land, lying there open and passive in the sunshine. I said of this tree: "It is mine," and of its companion beyond the fences: "It is my neighbor's." Deeply and sharply within myself I drew the line between meum and tuum: for only thus, by comparing ourselves with our neighbors, can we come to the true realization of property. Occasionally I stopped to pick up a stone and cast it over the fence, thinking with some truculence that my neighbor would probably throw it back again. Never mind, I had it out of my field. Once, with eager surplussage of energy, I pulled down a dead and partly-rotten oak stub, long an eye-sore, with an important feeling of proprietorship. I could do anything I liked. The farm was "mine."

How sweet an emotion is possession! What charm is inherent in ownership! What a foundation for vanity; even for the greater quality of self-respect, lies in a little property! I fell to thinking of the excellent wording of the old books in which land is called "real property" or "real estate." Money we may possess, or goods or chattels, but they give no such impression of mineness as the feeling that one's feet rest upon soil that is his; that part of the deep earth is his, with all the water upon it, all small animals that creep or crawl in the holes of it, all birds or insects that fly in the air above it, all trees, shrubs, flowers, and grass that grow upon it, all houses, barns and fences—all, his. As I strode along that afternoon I fed upon possession. I rolled the sweet morsel of ownership under my tongue. I seemed to set my feet down more firmly on the good earth. I straightened my shoulders; this land was mine. I picked up a clod of earth and let it crumble and drop through my fingers: it gave me a peculiar and poignant feeling of possession. I can understand why the miser enjoys the very physical contact of his gold. Every sense I possessed, sight, hearing, smell, touch, fed upon the new joy.

At one corner of my upper field the fence crosses an abrupt ravine upon leggy stilts. My line skirts the slope half-way up. My neighbor owns the crown of the hill, which he has shorn until it resembles the tonsured pate of a monk. Every rain brings the light soil down the ravine and lays it like a hand of infertility upon my farm. It had always bothered me, this wastage; and as I looked across my fence I thought to myself:
"I must have that hill. I will buy it. I will set the fence farther up. I will plant the slope. It is no age of tonsures either in religion or agriculture."



The Camp.

A compromise between a tent and a cottage.

so dear to the heart of the city-dweller. And sometimes the farmer, who has no time for much reading, only needs the suggestion of the tourist to set him to work on these lines.

Browsings Among the Books.

THE JOY OF POSSESSION.

[From David Grayson's delightful book, "Adventures in Contentment," published by Doubleday, Page & Co., Garden City,



A Cool Spot for a Hot Day.

New York. The narrator is a man who left the city because tired of its crush and hurry. He first rented, then bought a small farm, to which he came with his sister. The book from which the following chapter has been selected, tells the story of his experiences.]

Always, as I travel, I think, "Here I am, let anything happen!" I do not want to know the future:

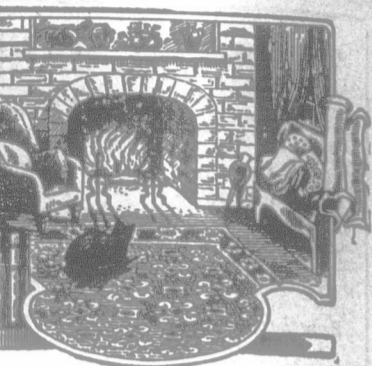
now deserted; and it struck me suddenly, as I observed these homely, pleasant things:

"All this is mine."

I sprang up and drew a long breath.

"Mine," I said.

It came to me then like an inspiration that I might now go out and take formal possession of my farm. I might experience the emotion of a landowner.



light swell with dignity and impor-
—for once, at least.

I started at the fence corner back
the barn and walked straight up
the pasture, keeping close to my
dairies, that I might not miss a
rod of my acres. And, oh, it
a prime afternoon! The Lord
it! Sunshine—and autumn haze—
trees—and yellow fields—and blue
hazes above the far-away town. And
air had a tang which got into a
blood and set him chanting all
poetry he ever knew.

climb that was a clod,
I run whose steps were slow,
reap the very wheat of God
That once had none to sow!

I walked up the margin of my
looking broadly about me; and
ntly I began to examine my fences—
fences—with a critical eye. I con-
sidered the quality of the soil, though
with I was not much of a judge of
matters. I gloated over my plowed
lying there open and passive in
sunshine. I said of this tree: "It
line," and of its companion beyond
fences: "It is my neighbor's."
and sharply within myself I drew
line between meum and tuum: for
thus, by comparing ourselves with
neighbors, can we come to the true
ation of property. Occasionally I
ed to pick up a stone and cast it
the fence, thinking with some truth-
that my neighbor would probably
y it back again. Never mind, I
it out of my field. Once, with
surplusage of energy, I pulled
a dead and partly-rotten oak stub,
an eye-sore, with an important
g of proprietorship. I could do
ing I liked. The farm was
."

ow sweet an emotion is possession!
charm is inherent in ownership!
a foundation for vanity; even for
greater quality of self-respect, lies
little property! I felt to thinking
the excellent wording of the old
in which land is called "real prop-
or "real estate." Money we may
ss, or goods or chattels, but they
no such impression of mineness as
being that one's feet rest upon soil
is his: that part of the deep earth
s, with all the water upon it, all
animals that creep or crawl in the
of it, all birds or insects that fly
e air above it, all trees, shrubs,
s, and grass that grow upon it,
ouses, barns and fences—all, his
strode along that afternoon I fed
possession. I rolled the sweet
d of ownership under my tongue,
ned to set my feet down more
on the good earth. I straight-
my shoulders; this land was mine.
ed up a clod of earth and let it
le and drop through my fingers:
e me a peculiar and poignant feel-
of possession. I can understand
the miser enjoys the very physical
t of his gold. Every sense I
sed, sight, hearing, smell, touch,
on the new joy.

one corner of my upper field the
crosses an abrupt ravine upon
stilts. My line skirts the slope
ay up. My neighbor owns the
of the hill, which he has shorn
it resembles the tonsured pate of
nk. Every rain brings the light
own the ravine and lays it like a
of infertility upon my farm. It
always bothered me, this wastage;
as I looked across my fence I
nt to myself:

ust have that hill. I will buy
will set the fence farther up. I
lant the slope. It is no age of
es either in religion or agricul-



Guard of Honor of the Honorable Artillery Company, of London.
Being inspected by Lord Kitchener (right) during the War Secretary's visit to the Guildhall, where he made a rousing
address, appealing for "men, material and money." Next to Lord Kitchener is His Honor the Lord Mayor of
London. Photo by Underwood & Underwood.

The very vision of widened acres set
my thoughts on fire. In imagination I
extended my farm upon all sides, think-
ing how much better I could handle my
land than my neighbors. I dwelt avari-
ciously upon more possessions: I thought
with discontent of my poverty. More
land I wanted. I was enveloped in
clouds of envy. I coveted my neigh-
bor's land: I felt myself superior and
Horace inferior: I was consumed with
black vanity.

So I dealt hotly with these thoughts
until I reached the top of the ridge at
the farther corner of my land. It is
the highest point on the farm.

For a moment I stood looking about
me—a wonderful prospect of serene
beauty. As it came to me—hills, fields,
woods—the fever which had been con-
suming me died down. I thought how
the world stretched away from my fences
—just such fields—for a thousand miles,
and in each small enclosure a man as
hot as I with the passion of possession.
How they all envied, and hated, in their
longing for more land! How property
kept them apart, prevented the close,
confident touch of friendship, how it
separated lovers and ruined families!
Of all obstacles to that complete dem-
ocracy of which we dream, is there a
greater than property?

I was ashamed. Deep shame covered
me. How little of the earth, after all,
I said, lies within the limits of my
fences. And I looked out upon the per-
fect beauty of the world around me, and
I saw how little excited it was, how
placid, how undemanding.

I had come here to be free, and al-
ready this farm, which I thought of so
fondly as my possession, was coming to
possess me. Ownership is an appetite
like hunger or thirst, and as we may
eat to gluttony and drink to drunken-
ness, so we may possess to avarice.
How many men have I seen who, though
they regard themselves as models of
temperance, wear the marks of unbridled
indulgence of the passion of possession,
and how like gluttony or licentiousness
it sets its sure sign upon their faces.

I said to myself, Why should any man
fence himself in? And why hope to en-
large one's world by the creeping ac-
quisition of a few acres to his farm? I
thought of the old scientist, who, laying
his hand upon the grass, remarked:
"Everything under my hand is a mir-
acle"—forgetting that everything outside
was also a miracle.

As I stood there I glanced across the
broad valley wherein lies the most of
my farm, to a field of buckwheat which
belongs to Horace. For an instant it
gave me the illusion of a hill on fire:
for the late sun shone full on the thick,

ripe stalks of the buckwheat, giving
forth an abundant red glory that blessed
the eye. Horace had been proud of his
crop, smacking his lips at the prospect
of winter pancakes, and here I was en-
tering his field and taking without hin-
derance another crop, a crop gathered
not with hands nor stored in granaries:
a wonderful crop, which, once gathered,
may long be fed upon and yet remain
unconsumed.

So I looked across the countryside; a
group of elms here, a tufted hilltop
there, the smooth verdure of pastures,
the rich brown of new-plowed fields,—
and the odors, and the sounds of the
country—all cropped by me. How little
the fences keep me out: I do not re-
gard titles, nor consider boundaries. I
enter either by day or by night, but not
secretly. Taking my fill, I leave as
much as I find.

And thus standing upon the highest
hill in my upper pasture, I thought of
the quoted saying of a certain old abbot
of the middle ages—"He that is a true
monk considers nothing as belonging to
him except a lyre."

What finer spirit? Who shall step
forth freer than he who goes with noth-
ing save his lyre? He shall sing as he
goes: he shall not be held down nor
fenced in.

With a lifting of the soul I thought
of that old abbot, how smooth his
brow, how catholic his interest, how
serene his outlook, how free his friend-
ships, how unlimited his whole life.
Nothing but a lyre!

So I made a covenant there with my-
self. I said: "I shall use, not be
used. I do not limit myself here. I
shall not allow possessions to come be-
tween me and my life or my friends."



France Pays Homage to the Composer of "The Marseillaise."

On July 14th, the National Festival of France, the nation paid fitting tribute to the composer of the national anthem,
"The Marseillaise." The body of Rouget de l'Isle, the composer, was exhumed from its grave at Choisy le Roi, and
with great ceremony conveyed to the Palace of the Invalides, where it was received with due honors, President
Poincare delivering an address to the people. The photograph shows the procession passing through the Arch
of Triumph in Paris. The remains of Rouget de l'Isle are borne on the gun carriage. Photo by Under-
wood & Underwood.

For a time—how long I do not know—
I stood thinking. Presently I discov-
ered, moving slowly along the margin of
the field below me, the old professor
with his tin botany box. And somehow
I had now no feeling that he was in-
truding upon my new land. His walk
was slow and methodical, his head, and
even his shoulders, were bent—almost
habitually—from looking close upon the
earth, and from time to time he stopped,
and once he knelt to examine some ob-
ject that attracted his eye. It seemed
appropriate that he should thus kneel to
the earth. So he gathered HIS crop
and fences did not keep him out, nor
titles disturb him. He also was free!
It gave me at that moment a peculiar
pleasure to have him on my land, to
know that I was, if unconsciously, rais-
ing other crops than I knew. I felt
friendship for this old professor: I could
understand him, I thought. And I said
aloud, but in a low tone, as though I
were addressing him:

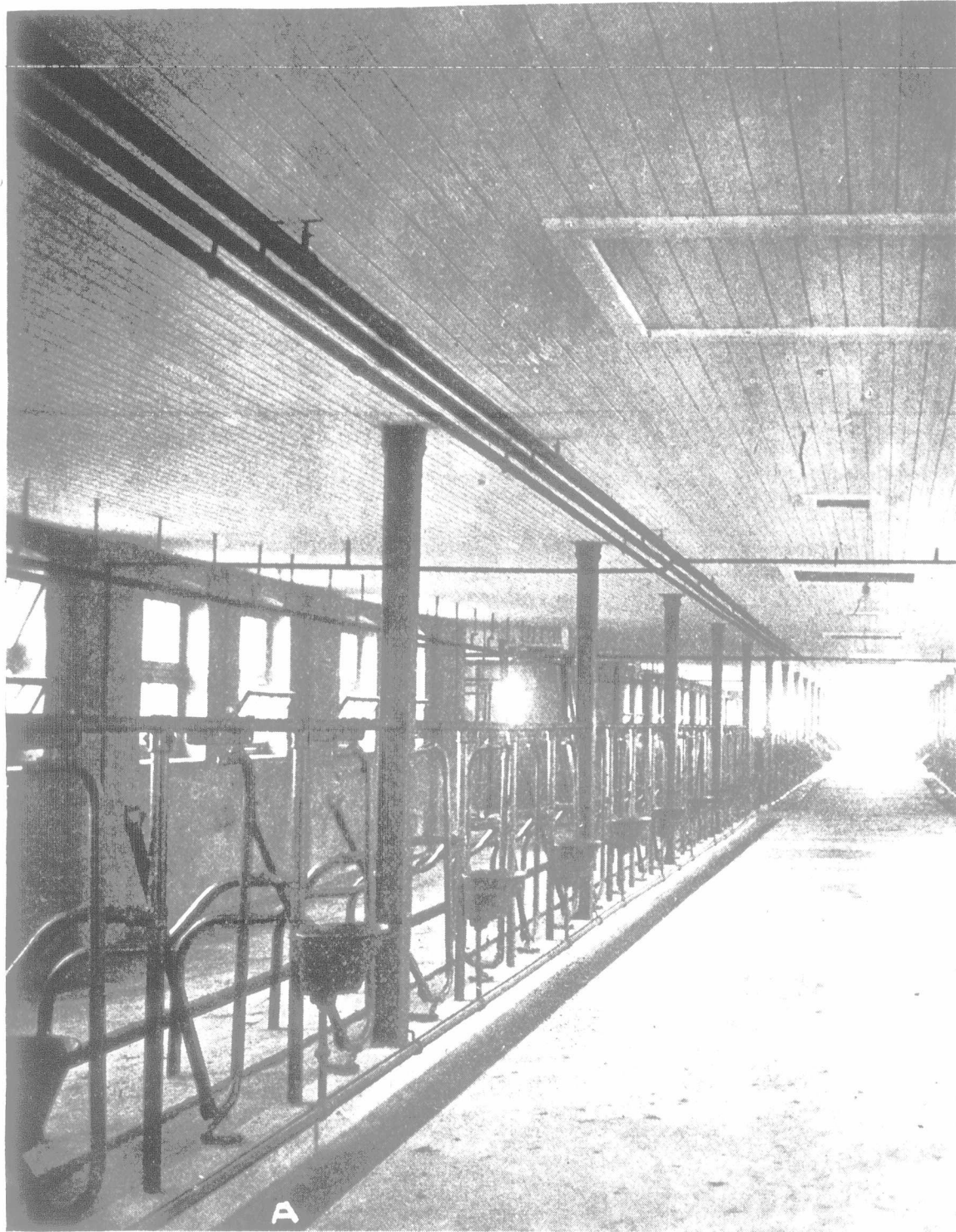
Do not apologize, friend, when you
come into my field. You do not inter-
rupt me. What you have come for is
of more importance at this moment than
corn. Who is it that says I must plow
so many furrows this way? Come in,
friend, and sit here on these clods: we
will sweeten the evening with fine words.
We will invest our time not in corn, or
in cash, but in life:—

I walked with confidence down the hill
toward the professor. So engrossed was
he with his employment that he did not
see me until I was within a few paces
of him. When he looked up at me it
was as though his eyes returned from
some far journey. I felt at first out of
focus, unplaced, and only gradually com-
ing into view. In his hand he held a
lump of earth containing a thrifty young
plant of the purple cone-flower, having
several blossoms. He worked at the
lump deftly, delicately, so that the
earth, pinched, powdered, and shaken
out, fell between his fingers, leaving the
knotty yellow roots in his hand. I
marked how firm, slow, brown, the old
man was, how little obtrusive in my
field. One foot rested in a furrow, the
other was set among the grass of the
margin, near the fence—his place, I
thought.

His first words, though of little mo-
ment in themselves, gave me a curious
satisfaction, as when a coin, tested,
rings true gold, or a hero, tried, is
heroic.

"I have rarely," he said, "seen a finer
display of rudbeckia than this, along
these old fences."

If he had referred to me, or ques-
tioned, or apologized, I should have been



B-T Steel Stalls

B-T

Worth twice the Price Prove It For Yourself

NEXT time you are in town, ask the hardware man, plumber, or implement agent, for the price of galvanized and black pipe. You will

find that he asks almost twice as much for the galvanized pipe as for the black or ordinary pipe. The latest price at the time we are writing is:

Per 100 feet	Galvanized	Black
2-inch - - -	\$19.80	\$9.99

BT Stalls are made of 2-inch galvanized pipe, and are therefore worth twice the price of painted stalls made of black pipe. Every BT Stall is worth \$5 more than you pay for it, you can prove that for yourself.

Galvanized pipe is very costly, because spelter or zinc is needed for the galvanizing process. Spelter is also used in making ammunition for the war. It is therefore very scarce and difficult to get.

The war taxes and extraduties are heavy, and many manufacturers have been forced to raise their prices.

But, notwithstanding these facts, we are going to galvanize BT Steel Stalls without any increase in the price.

Although Galvanized pipe costs twice as much as black pipe, we are galvanizing BT Stalls without extra charge.

BT Galvanized Stalls last longer than stalls which are only dipped in black japan or painted with aluminum. Rust cannot attack BT Stalls. They look far better in the stable. You can always be proud of the appearance of your equipment.

Not only is the pipe used in BT Stalls galvanized, but every clamp and nut and bolt as well. Every inch is rust-proof. The galvanizing is done by the electro process, which does not weaken the clamps and it never comes off. Remember these facts. Remember that when you buy BT Steel Stalls you get this extra value for nothing.

How Can We Do It ?

We are charging no more for BT Galvanized Stalls than we used to charge for painted stalls. How can we do it? There has been a large increase in the sale of BT Steel Stalls. Twice as many are sold annually as of all other makes combined. They are being installed in stables everywhere. We are selling and manufacturing them on a larger scale, and this has enabled us to make many savings. Machines are being used which cut, bend and rivet stalls, stanchions and mangers 25 times more quickly than could be done by hand. The money we save in the ways we use to improve the stalls for you. You get the \$5.00 extra value, free, on every BT Stall. We have two galvanizing plants of our own. Visitors are welcome at our factory. Farmers who buy stalls very often come up to Fergus to see the stalls being made.

It Pays to Buy the BT.

BT Stands for the Best—the best goods, the best value. The galvanizing is only one sample of the extra value of the BT. There are many facts you ought to know—the patented features, the individual barn plan service, the help we give in installing. We have not the space here to tell about them. We have not the room to tell half the facts about the galvanizing. We want to tell you how to test stalls to make sure they are galvanized. We want you to see photos of some of the barns we have equipped. Be sure to write for the BT Illustrated Catalogue and investigate all. The fact that twice as many BT Galvanized Stalls are sold each year as there are of all other makes combined is the best reason for learning all about them.

The BT Line includes not only cow stalls, but all equipment necessary for the barn. If you need a Hay Carrier, Manure Carrier, Horse Stable Fittings, Water Bowls, Hog Pens or Hog Troughs, Barn Door Track, we will be glad to send you our catalogue.

See the BT Steel Stalls in the Model Barn at the Toronto Exhibition. Also see BT exhibits at London and Ottawa.

BEATTY BROS., Limited, 1901 Hill St. Fergus, Ontario

BT Steel Stalls

Galvanized

disappointed. He did not say, "your fences," he said "these fences," as though they were as much his as mine. And he spoke in his own world, knowing that if I could enter it would, but that if I could not, no stooping to me would avail either of us.

"It has been a good autumn for flowers," I said inanely, for so many things were flying through my mind that I could not at once think of the great particular words which should bring us together. At first I thought my chance had passed, but he seemed to see something in me after all, for he said:

"Here is a peculiarly large specimen of the rudbeckia. Observe the deep purple of the cone, and the bright yellow of the petals. Here is another that grew hardly two feet away, in the grass near the fence where the raisins and the black-berry bushes have shaded it. How small and undeveloped it is."

"They crowd up to the plowed land," I observed.

"Yes, they reach out for a better chance in life—like men. With more room, better food, freer air, you see how much finer they grow."

It was curious to me, having hitherto barely observed the cone-flowers along my fences, save as a color of beauty, how simply we fell to talking of them as though in truth they were people like ourselves, having our desires and possessed of our capabilities. It gave me then, for the first time, the feeling which has since meant such varied enjoyment of the peopling of the woods.

"See here," he said, "how different the character of these individuals. They are all of the same species. They all grow along this fence within two or three rods; but observe the difference, not only in size, but in coloring, in the shape of the petals, in the proportions of the cone. What does it all mean? Why, nature trying one of her endless experiments. She sows here broadly, trying to produce better cone-flowers. A few she plants on the edge of the field in the hope that they may escape the plow. If they grow, better food and more sunshine produce more and larger flowers."

So we talked, or rather he talked, finding in me an eager listener. And what he called botany seemed to me to be life. Of birth, of growth, of reproduction, of death, he spoke, and his flowers became sentient creatures under my eyes.

And thus the sun went down and the purple mists crept silently along the distant low spots, and all the great, great mysteries came and stood before me beckoning and questioning. They came and they stood, and out of the cone-flower, as the old professor spoke, I seemed to catch a glimmer of the true light. I reflected how truly everything is in anything. If one could really understand a cone-flower he could understand this Earth. Botany was only one road toward the Explanation.

Always I hope that some traveller may have more news of the way than I, and sooner or later, I find I must make inquiry of the direction of every thoughtful man I meet. And I have always had especial hope of those who study the sciences: they ask such intimate questions of nature. Theology possesses a vain-gloriousness which places its faith in human theories; but science, at its best, is humble before nature herself. It has no thesis to defend: it is content to kneel upon the earth, in the way of my friend, the old professor, and ask the simplest questions, hoping for some true reply.

I wondered, then, what the professor thought, after his years of work, of the Mystery; and finally, not without confusion, I asked him. He listened, for the first time ceasing to dig, shake out and arrange his specimens. When I had stopped speaking he remained for a moment silent, then he looked at me with a new regard. Finally he quoted quietly, but with a deep note in his voice:

"Canst thou by searching find God? Canst thou find out the Almighty unto perfection? It is as high as heaven: what canst thou do? deeper than hell: what canst thou know?"

When the professor had spoken we stood for a moment silent, then he smiled and said briskly:

"I have been a botanist for fifty-four years. When I was a boy I believed implicitly in God. I prayed to Him, having a vision of Him as Father—before

my eyes. As I grew older I concluded that there was no God. I dismissed Him from the Universe. I believed only in what I could see, or hear, or feel. I talked about Nature and Reality."

He paused, the smile still lighting his face, evidently recalling to himself the old days. I did not interrupt him. Finally he turned to me and said abruptly:

"And now—it seems to me—there is nothing but God."

As he said this he lifted his arm with a peculiar gesture that seemed to take in the whole world.

For a time we were both silent. When I left him I offered my hand and told him I hoped I might become his friend. So I turned my face toward home. Evening was falling, and as I walked I heard the crows calling, and the air was keen and cool, and I thought deep thoughts.

And so I stepped into the darkened stable. I could not see the outlines of the horse or the cow, but knowing the place so well I could easily get about. I heard the horse step aside with a soft, expectant whinny. I smelled the smell of milk, the musty, sharp odor of dry hay, the pungent smell of manure, not unpleasant. And the stable was warm after the cool of the fields with a sort of animal warmth that struck into me soothingly. I spoke in a low voice and laid my hand on the horse's flank. The flesh quivered and shrank away from my touch—coming back confidently, warmly. I ran my hand along his back and up his hairy neck. I felt his sensitive nose in my hand. "You shall have your oats," I said, and I gave him to eat. Then I spoke as gently to the cow, and she stood aside to be milked.

Leiden, and for the five after-years the rooms have been lent to a cousin, studying for his degree as a learned doctor of law. Now, I knew it was close upon the time for him to take his degree, and I hoped that I might be able to show my friends (and one Enemy) a few things in my old University town which ordinary tourists might not see.

The tea-things had been washed up, and a discussion of plans (from which Miss Van Buren managed to exclude me) had ended in no definite conclusion, when I brought "Lorelei" into one of the innumerable green canals in Leiden.

"None of you seem to know what you want to do first, last, or in the middle," I ventured to remark; "so, to save time, perhaps you'll let me offer a few suggestions. I've told Hendrik to fetch a cab, and he's gone. When your carriage comes, engage rooms at the Levedag Hotel, drive through the town, have a glance at the churches, and go to the Stadhuis. You'll like the spire and the facade. They're both of the sixteenth century, when we were prosperous and artistic; and over the north-side entrance there's a chronogram inscription concerning the siege. I can't go, because I want to arrange your evening, which I hope will be a success. But I'll meet you in the Archive Room at the Stadhuis, where you can admire the paneling till I come. I won't keep you waiting long; and then I'll take you over the University Buildings. I was there, you know, as a student."

By the time this plan was arranged to the satisfaction of everybody except that of the person I wished to please, Hendrik had arrived with a cab, and five

plans. His Promotie dinner, the grandest affair of student life, and the rounding off of it, would be in three parts, with various ceremonies in between, and would last from now until two or three in the morning. However, I told him what I had wanted, to give a surprise dinner at his diggings for the party from "Lorelei," with him to arrange details while I played guide, and to take the part of host for us at eight o'clock. Could he suggest any one who would look after the thing in his place? Van Rhonda or Douw, for instance? But van Rhonda and Douw, it seemed, were the Paranyms, or supporters of the newly-made Doctor, and their time would be fully taken up in seeing him through. All my old friends who were left would be at the Promotie dinner, but Jan was sure that my business might be safely entrusted to the landlady. She would get flowers, go to the hotel to order whatever I wished, and even superintend the waiters.

With this I had to be satisfied, for in the midst of the discussion appeared the two Paranyms, wanting to know what kept Jan, and the hero of the day was ruthlessly carried off between them. I had to do the best I could; my old landlady had not forgotten me, and I was assured that I might depend upon her. When I had scribbled a menu, consisting of some rather odd dishes, sketched an idea for the table decoration, and given a few other hasty instructions, I dashed off to keep my appointment at the stadhuis. On the way I consoled myself with the reflection that it's an ill wind which blows nobody good. I had been bereaved of Jan as a prop, but I might make use of him and his friends by-and-by as one of the sights of Leiden, and I would take advantage of my knowledge of the usual program on such festive nights as this for the benefit of my friends.

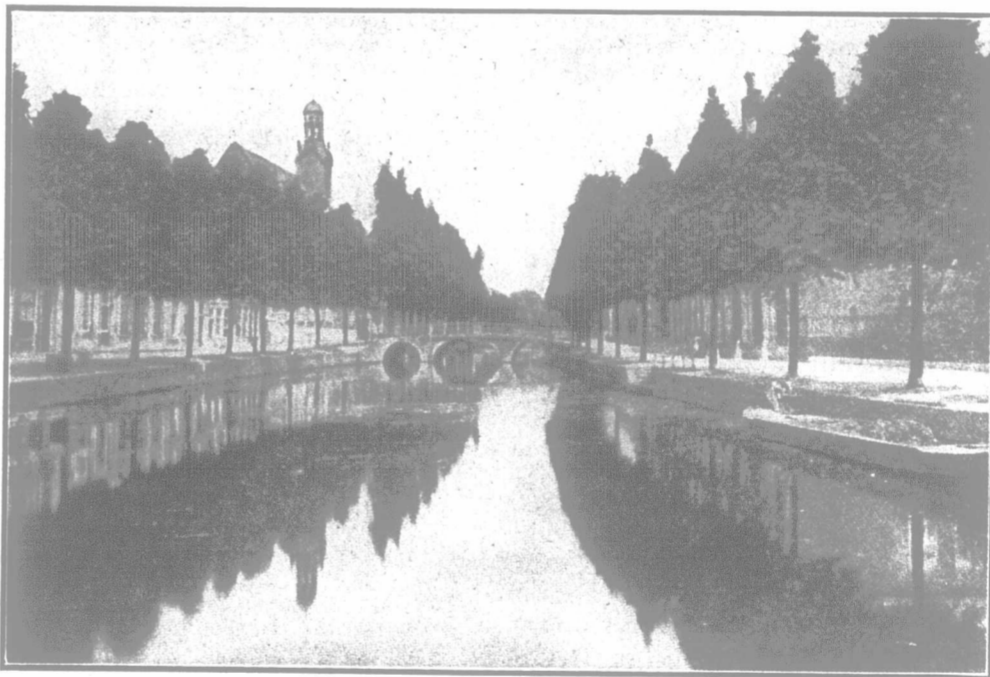
I arrived at the Stadhuis as the others took their first look at the oak Archive Room. There was just one other room in this most excellent and historic building that I wanted Miss Van Buren to see. It was a Tapestry Room, among other Tapestry Rooms, of no importance; but I remembered her fantastic desire to "live in the stained-glass country," and I recalled a certain tapestry garden in which I felt sure she would long to wander. There was a meal of some wonder, I sort going on in it, and I had been conscious in other days of a desire to be a tapestry man and sit with the merry tapestry lady smiling there. All tapestry people look incredibly happy for in tapestry etiquette it's bad form to be tragic. Even their battles are comedy battles, as you can see by the faces of the war-horses that they have a strong sense of humor; but these particular tapestry friends of mine were the gayest I ever met, and I wanted Miss Van Buren to make their acquaintance.

To reach the room, through another also representing a tapestry world, we had to perform a dreadful surgical operation on the abdomen of a Roman emperor by opening a door in the middle of it, and, as the mariner said, the size of the next room gave the same sort of shock that Jonah must have had when he arrived in the whale.

If I had shown her that tapestry garden, Miss Van Buren would have feigned indifference; but I left her to Starr, and from a distance had the chastened pleasure of hearing her say to him the things I should have liked her to say to me.

Afterwards I swept the party away to the University, preparing their minds to expect no architectural splendors.

"Leiden is our most famous university," I said. "But we have no streets of beautiful old colleges, no lovely gardens. You see, Oxford and Cambridge are universities around which towns have gathered, whereas Leiden was a city long before William the Silent gave its people choice, as a reward for their heroic defense, of free-



University of Leiden, Holland.

And afterward I came out into the clear, bright night, and the air was sweet and cool, and my dog came bounding to meet me.—So I carried the milk into the house, and Harriet said in her heartiest tone:

"You are late, David. But sit up, I have kept the biscuits warm."

And that night my sleep was sound.

Our Serial Story

"THE CHAPERON".

By C. N. and A. M. Williamson.

Copyrighted.

Chapter XII.

RUDOLPH BREDERODE'S POINT OF VIEW.

(Continued.)

My mother sent me to Oxford, because she thought that she could take no intelligent interest in any young man if he had not had his four years at Oxford or Cambridge. But afterwards, through loyalty to my fatherland, I gave myself two at the University of Leiden; and as the rooms I lived in there hold memories of Oliver Goldsmith, I've kept them on ever since. I was twenty-four when I said good-by to

minutes later I was free to carry out my scheme for the evening.

From Gouda I'd sent a wire to my cousin Jan van Hoi, asking him to be at home and expecting me between four and five, so I felt sure of him. I took all the short cuts (which I know as well as I know my hat), and was soon climbing the ladder-like stairs of the old house, the top floor of which was home to me for two years.

From those windows Goldsmith looked down on the sleepy canal, when he visited a cory who was tenant of the rooms; and the door which Goldsmith's hand often touched was thrown open by the present tenant, who must have been listening for my step.

To my surprise, he was in wild deshabille, and far out of his usual phlegmatic self with excitement.

"It's my Promotie Day," he explained. "I'm just back and have got out of my swallow-tail after the final exam. I'm due at the Club for the first part of my dinner in a few minutes. Had you forgotten, or didn't you get your card?"

I told him that no doubt it was at Liliendaal, or wandering in search of me; and when I had slapped him on the back, and congratulated him as "Learned Doctor," I began to wonder what I should do, as it was clear he would have no time to help me carry out my

His Promote dinner, the grand-
 air of student life, and the round-
 of it, would be in three parts,
 various ceremonies in between, and
 last from now until two or three
 morning. However, I told him
 had wanted, to give a surprise
 at his diggings for the party
 "Lorelei," with him to arrange
 while I played guide, and to
 be part of host for us at eight
 Could he suggest any one who
 look after the thing in his place?
 onda or Douw, for instance? But
 onda and Douw, it seemed, were
 nymphs, or supporters of the
 ade Doctor, and their time would
 taken up in seeing him through:
 old friends who were left would
 be Promote dinner, but Jan was
 at my business might be safely
 ed to the landlady. She would
 wers, go to the hotel to order
 r I wished, and even superintend
 ters.

this I had to be satisfied, for in
 st of the discussion appeared the
 nymphs, wanting to know what
 in, and the hero of the day was
 ly carried off between them. I
 do the best I could; my old land-
 not forgotten me, and I was
 that I might depend upon her.
 had scribbled a menu, consisting
 rather odd dishes, sketched on
 the table decoration, and given
 ther hasty instructions, I dashed
 keep my appointment at the
 On the way I consoled my-
 h the reflection that it's an ill
 which blows nobody good. I had
 eaved of Jan as a prop, but I
 ke use of him and his friends
 by-and-by as one of the sights
 of Leiden, and I would take
 advantage of my knowledge of
 the usual program on such festi-
 ve nights as this for the
 benefit of my friends.

I arrived at the Stadhuis as
 the others took their first
 look at the oak Archive Room.
 There was just one other room
 in this most excellent and histo-
 ric building that I wanted
 Miss Van Buren to see. It
 was a Tapestry Room, among
 other Tapestry Rooms, of no
 importance; but I remembered
 her fantastic desire to "live
 in the stained-glass country,"
 and I recalled a certain tapes-
 try garden in which I felt
 sure she would long to wan-
 der. There was a meal of
 some wonderf. I sort going on
 it, and I had been conscious in
 other days of a desire to be a
 tapestry man and sit with the
 merry tapestry lady smiling
 there. All tapestry people look
 incredibly happy for in tapestry
 etiquette it's bad form to be
 tragic. Even their battles are
 comedy battles, as you
 by the faces of the war-horses
 y have a strong sense of humor;
 e particular tapestry friends of
 e the gayest I ever met, and I
 Miss Van Buren to make their
 nance.

ch the room, through another
 resenting a tapestry world, we
 perform a dreadful surgical
 on the abdomen of a Roman
 by opening a door in the middle
 id, as the mariner said, the size
 xt room gave the same sort of
 at Jonah must have had when
 ed in the whale.

d shown her that tapestry gar-
 Van Buren would have feigned
 ce; but I left her to Starr, and
 istance had the chastened plea-
 hearing her say to him the
 should have liked her to say

ards I swept the party away to
 iversity, preparing their minds to
 architectural splendors.

is our most famous uni-
 I said. "But we have no
 beautiful old colleges, no love-
 ss. You see, Oxford and Cam-
 are universities around which
 ave gathered, whereas Leiden
 city long before William the
 ve its people choice, as a free-
 their heroic defense, of free-



Edwardsburg "Crown Brand" Corn Syrup

POUR IT ON PORRIDGE

YOU can't imagine how delicious a dish of Oatmeal Porridge becomes when it is sweetened with "Crown Brand" Corn Syrup.

Have it for breakfast to-morrow—watch the kiddies' eyes sparkle with the first spoonful—see how they come for 'more'.

Much cheaper than cream and sugar—better for the children, too.

Spread the Bread with "Crown Brand"—serve it on Pancakes and Hot Biscuits, on Blanc Mange and Baked Apples—use it for Candy-Making.

"LILY WHITE" is a pure white Corn Syrup, more delicate in flavor than "Crown Brand". You may prefer it.

ASK YOUR GROCER—IN 2, 5, 10 & 20 LB. TINS.

THE CANADA STARCH CO. LIMITED
 Makers of the Famous Edwardsburg Brands.
 Works—Cardinal—Brantford—Fort William.
 Head Office - - - Montreal



THE AUTOMOBILE WITH THE FAMOUS
"VALVE-IN-HEAD" MOTOR

Every One a "Six"

Why buy a "Four"
when you can get a
McLaughlin "Six"
for less money

McLAUGHLIN CARRIAGE CO. LIMITED.
 Head Office & Factories
OSHAWA, ONTARIO.
 IN BUSINESS SINCE 1869

FRUIT BOXES!

We specialize in the manufacture of Fruit Boxes for packing apples, pears, etc., and evaporated fruits. Also Butter Boxes, Egg Cases, Bushel Vegetable Boxes, Tomato and Berry Crates. State quantity in your enquiry.

FIRSTBROOK BROS., LIMITED
 BOXES AND SHOOKS TORONTO, ONTARIO

dom from taxes or a university. When they said they'd have the university, the thing was to get it. Money wasn't plentiful, and here was an old monastery, empty and ready for use—a building whose simplicity would have appealed to William in his later days."

It was not until they had this apology well in their heads that I ushered them into the bare, red-brick courtyard so full of memories for me, and here I buckled on my armor of defense.

"Our universities have produced great men, though they've given them no Gothic buildings or fairy gardens. Where will you find more illustrious names than Scaliger, Grotius, and Oliver Goldsmith?—lots of others, too. Why, Niebuhr said of our hall that no place is so memorable in history of science.

Trying to appear impressed, the three ladies, followed by Starr, trailed into the building, deserted at this hour; and it was the artist's quick eye that first caught the eccentric merit of the famous caricatures lining the staircase.

Then came the chamber of torture, the "Sweating Room," that bare, white-washed cell remembered by all Leideners with anguish. There I (and thousands before and thousands after) had sat to wait my dreaded turn with the professors behind the green-baize table in the room next door. There I—among those other nerve-shattered ones—had scribbled my name and scrawled a sketch or two. "Here sweated Rudolph Brederode," read out Miss Rivers, with a sweet look, as if she pitied me now for what I suffered then. But Miss Van Buren showed sublime indifference. She wished, she said, to pick out names that were really interesting.

Even she, however, was roused to compassion for the tortured ones, when in the adjoining room she heard that the examinations were conducted publicly, and that there was no reason why any stranger should not walk in from the street to hear the victims put to the question.

(Continued on page 1414.)

The Dollar Chain

A fund maintained by readers of "The Farmer's Advocate and Home Magazine" for (1) Belgian Relief; (2) Soldiers' Comforts; (3) Red Cross Supplies.

Donations for the week from Aug. 20th to Aug. 27th are as follows:

Over \$1.00 each:—
 J. M. L., Centreville, Ont., \$2.00; Oak Bay Mills Sabbath School, Que., \$2.00; "Toronto," \$3.00; W. A. Ricker, Canfield, Ont., \$5.00.

\$1.00 each:—Mrs. A. J. Clark, Ravenswood, Ont.; Mrs. W. J. Weed, Alvinston, Ont.; Mrs. Jas. Oke, Centralia, Ont.; James R. Gates, Mary Gates, and Mary I. Gates, all of Kingston, Ont.

Total amount previously acknowledged from Jan. 30th to Aug. 20th.....\$1,784.75

Total to Aug. 27th.....\$1,752.75

Kindly address contributions simply to "The Farmer's Advocate and Home Magazine," London, Ont.

YOUR JAM SHOWER FOR THE SOLDIERS.

Asked for:—Jam, jelly, honey, marmalade.

Be sure to pack very securely. "The Farmer's Advocate" has been obliged to pay express on several boxes. Kindly note the following announcement:

IMPORTANT NOTICE.

All parcels and boxes containing goods for soldiers relief work should be addressed in large letters: "RED CROSS," in care of "The Farmer's Advocate." All such parcels and boxes will be carried free by the express companies. If simply addressed "The Farmer's Advocate" regular express rates will be charged.

If sending parcel post, all charges must be prepaid.

Contributions during the week between Aug. 20th and Aug. 27th were sent by the following: Mrs. M. Heywood, Woodham, Ont., and the following, all of Winterbourne, Ont.:—Mrs. John Pine, C. M. Smart, Wm. Mitchell, Wm. R. Hamilton, Mrs. Robt. Forrest, Mrs. Jno. Hamilton, Mrs. H. K. Hamilton, Mrs. John Burnett, Mrs. Jos. Woods, Mrs. John Durant.



Chippendale—Style 75

Think What You Can Buy With the \$100 We Save You

The \$100 we save you will buy many other home comforts and your piano will be the best that time and money can produce.

You take no chance in buying a

Sherlock-Manning 20th Century Piano

because it comes to you with a positive guarantee of ten years. Its vital parts are the best that money can buy; this includes action, strings and hammers.

Because it is the best, yet sells for fully \$100 less, we are justified in claiming it to be

"Canada's Biggest Piano Value"

If you must spend that \$100, why not put it into new rugs, handsome furniture, curtains or other useful articles. Buy a Sherlock-Manning 20th Century Piano, and have \$100 of your money left for other purposes.

Get Handsome Art Catalogue FREE!

Just write Dept. 4 a postal for our beautifully illustrated Piano Catalogue L, which fully explains every point of the construction of Sherlock-Manning Pianos, and tells how we are able to save you \$100, yet give highest quality.

THE

Sherlock-Manning Piano Co.

LONDON - CANADA
 (No Street Address Necessary) 73

Are You Afflicted With Superfluous Hair?



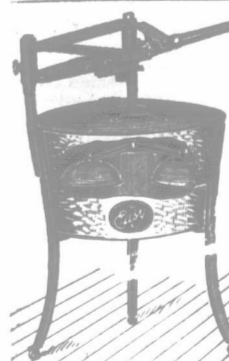
It should never be cut, pulled or tampered with in any way. Doing so only creates a stronger and thicker growth. The only method of destroying the hairs is to have them treated by Electrolysis. Our

method is safe, absolutely sure and practically painless. Our operators are capable, and we assure satisfactory results in each case.

Moles, Warts, Red Veins and other facial blemishes also permanently removed. Write now for Booklet "F," giving full particulars. Arrange to come during the Exposition if you live at a distance.

Hiscott Dermatological Institute

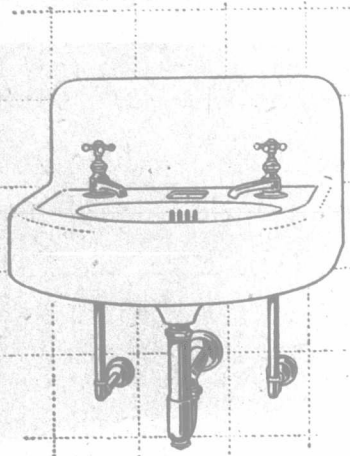
61 College St., TORONTO (Established 1892)



The "EASY WASHER" is Different and Better. The principle is right. Two vacuum basins force the air and suds through the clothes. Simply press handle. No wear, no tear. The Easy washes quickly, easily and well. It's all steel galvanized; sanitary and durable. Will not dry out and fall to pieces. Light and easy to handle. Washes blankets, curtains and all kinds of wearing apparel. Will outlast 5 wooden machines. Get the

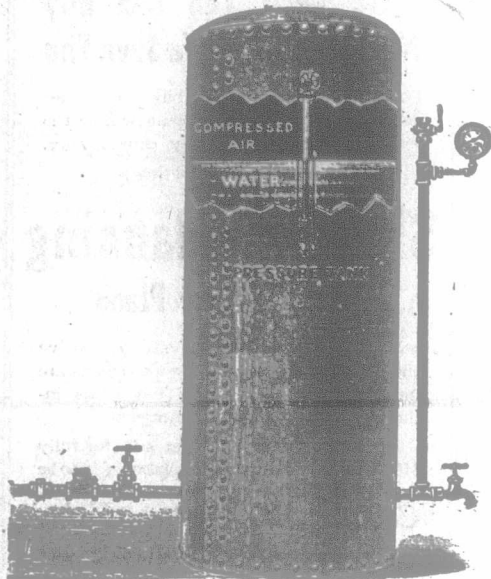
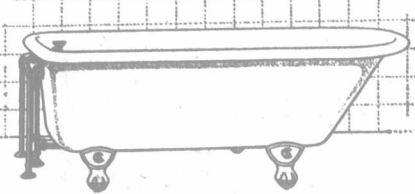
Easy—The Newest, Latest and Best. Agents Wanted. EASY WASHER COMPANY, 4 Clinton Place, Dept. F. A., Toronto.

Please mention "The Farmer's Advocate."



When Your Harvest is Over

and before Jack Frost comes, you should consider the



L. E. S. Water Works System

and have the comforts of a modern bath room in your home.

Write for a circular and prices.



London Engine Supplies Company, Limited
83-85 Dundas Street LONDON, ONTARIO

R.M.S.P.

FORTNIGHTLY SAILINGS
BY
Twin-Screw Mail Steamers
FROM
ST. JOHN (N.S.)
AND
HALIFAX (N.S.)
TO THE
WEST INDIES

Excellent Accommodation for 1st, 2nd and 3rd Class Passengers
SPECIAL FACILITIES FOR TOURISTS

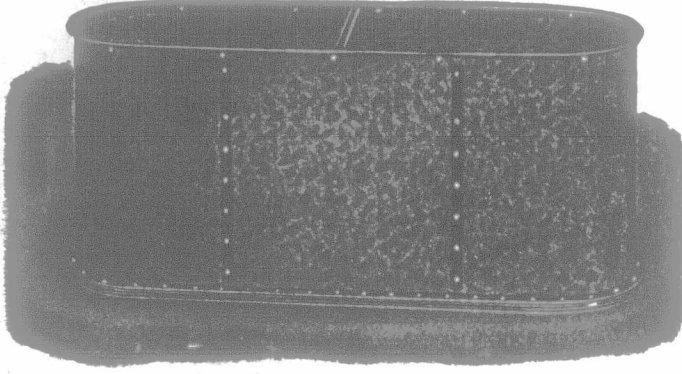
NEXT SAILING FROM HALIFAX:
R.M.S.P. "Chaleur"
September 10, 1915
APPLY TO
The Royal Mail Steam Packet Co.,
57-59, Granville St., HALIFAX (N.S.)
OR TO THE
LOCAL TICKET AGENCIES

Official Fruit Bulletin
Fruit Brand—Dept. of Agriculture

Peaches and Plums are both so good this year that there is every inducement for the housewife to "put down" a liberal supply. The Canadian Clubs and Red Cross Societies are asking for contributions of canned or preserved—not jammed fruit, for our soldiers in France. People who wish to "do their bit" should communicate with the nearest Canadian Club or Red Cross branch. Much fruit is being put down without sugar, by sterilizing process. The best plums for the purpose are Bradshaws, Gages and Lombards, and for peaches the St. Johns, Crawfords and Elbertas. Orders placed in advance with your grocer means better fruit for you.

Have you good seeds to sell?
SEEDS Do you require good seeds for your farm or garden?
If so, visit or write us
GEO. KEITH & SONS
Seed Merchants Since 1866
124 KING ST. E. TORONTO

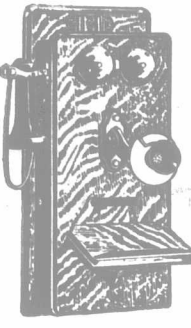
Wayne Steel Tanks



So useful on every farm. They have many advantages over cement and wooden structures for convenience and durability, and being easily moved from place to place, as use may require. All sizes and moderate in price. If your dealer does not handle the WAYNE, let us hear from you direct.

WAYNE OIL TANK & PUMP COMPANY, LIMITED
WOODSTOCK, ONTARIO

THE HELP PROBLEM



in the farm is solved by the telephone. It enables the farmer to obtain help when it is needed, a very important necessity these days.

The farmer who has a Stromberg-Carlson telephone has the world's market at his call. Buyers and Commission Agents call him up. Friends put him in touch with possible customers. He hears of money making chances because his telephone is always handy.

We have a very interesting bulletin "A Telephone on the Farm." It explains how every farming community can build and own its independent telephone system cheaply. It tells you how to get market and weather reports, the latest news etc.

It will be sent free if you write for Bulletin No. 1011. When you visit the Toronto Exhibition be sure and call at our booth in the Process Building. We will be pleased to show our system in full working order.

Stromberg-Carlson Telephone Mfg. Co.
23 Richmond St. W., Toronto, Canada

Hope's Quiet Hour.

Hymn for Airmen.

Lord, guard and guide the men who fly
Through the great spaces of the sky,
Be with them traversing the air
In darkening storm or sunshine fair,
Thou Who dost keep with tender might
The balanced birds in all their flight,
Thou of the tempered winds be near,
That, having Thee, they know no fear,
Control their minds, with instinct at,
What time, adventuring, they quit
The firm security of land:
Grant steadfast eye and skilful hand,
Aloft in solitudes of space!
Uphold them with Thy saving Grace,
O God, protect the men who fly
Through lonely ways beneath the sky.
M. C. D. H.

Thine Is the Kingdom.

Thine is the kingdom, and the power,
and the glory, for ever. Amen.—S.
Matt. vi.: 13.

"Thine is the kingdom, Lord!
In glad subjection at Thy feet we bow,
Our rightful Sovereign Thou, and only
Thou!
Thine is the kingdom, Lord!"

Let us steady our trembling hearts, in these days of world-wide distress, by remembering that the familiar words we have said so many times—often carelessly, perhaps—are true. It is TRUE that God is the Almighty Ruler over all the kingdoms of the earth. An emperor may feel himself very invincible, as he looks at his armies and guns, his submarines and airships, but he is only a man like other men. At any moment the angel of death may touch him and whisper authoritatively: "Thy soul is required of thee." Then he must stand alone—weak as any other man—to give account of his stewardship.

"The Lord is our King; He will save us," said a Jewish prophet; and if He was the King of the Jews, much more may we claim His Royal protection, for—through His wondrous Incarnation—the King has become near of kin to us. JESUS declared that all power in heaven and earth was His; and those who call themselves Christians bring dishonor on His cause when they talk hopelessly about the present condition of affairs. The kingdom and the power belong to our Father. We may be bewildered by His silence when the helpless and innocent are tortured and killed. So the Holy One on the Cross looked up through the darkness and asked why He had been forsaken. That "Why?" of tortured children of God still goes up. We do not know the answer—yet—but our duty is to follow our Master and commend ourselves trustfully into our Father's hands. He did not wait until the pain was over, until God had shown His Face. In the darkness he groped for the Heart of God and rested there, suffering, yet peaceful.

It is absolutely true that the Most High rules in this world, in great matters and in small. Perhaps trouble has come into your life through the wrong and injustice of men, and you may feel that Satan, not God, has caused the trouble. Yet God is King, and He has permitted the trouble to come upon you. In the story of Job we are taken behind the scenes of a drama of earthly life. There we see Satan permitted to do his very worst against a faithful servant of God. Job passed through the furnace of affliction and came out shining with new spiritual beauty. Before his troubles he had heard of God, now his eyes were opened to the Vision of His Face, so that his own righteousness of life seemed paltry and contemptible as compared with the awful Holiness of God. "I have heard of Thee by the hearing of the ear; but now mine eyes see Thee. Wherefore I abhor myself, and repent in dust and ashes," he said when his comfortable prosperity had been suddenly swept away and God had spoken to his suffering soul. "So it was with David. Read the lovely "shepherd psalm"—the 23rd—and you will notice that while the sheep is lying peacefully in green pastures or walking in safe and easy paths, he

SEPT
speaks
finds him
the dark
he press
herd's s
fear no
We are
God's F
stand H
ble wick
We can
hour of
"I will
me; thy
me." Y
fort" me
tired h
strength
row. T
Shall we
this mo
of a cro
their liv
of the fe
one you
think o
bright s
Many
heavy s
burden o
time. V
sadly:
down he
harder f
able we
selfish a
come ou
face, wit
Father's
face?
smile, H
and kee
seems to
not be
can feel
ness and
this love
peace w
in your
and find
our Fath
ble thin
He is ei
"I do
Better ir
When
here and
cult dut
that so
general
ling to
a threat
King—o
bitter p
to be a
to mak
wounds,
when I
quarters
position
There
who see
ness in
life av
Then h
training
few we
and the
man to
hero's o
comrade
flame t
heart,—
crushed
War is
ing it
24-28.
Of ho
wonder
in him
the tim
have sl
prosperi
grace
civilizat
turing
bring p
ing dir
are His
shadow
When
showing
faith in
in the
quicks
crime a
trust o

Hope's Quiet Hour.

Hymn for Airmen.

Guard and guide the men who fly
 In the great spaces of the sky,
 As they traverse the air
 In evening storm or sunshine fair,
 Who dost keep with tender might
 The dancing birds in all their flight,
 Of the tempered winds be near,
 Having Thee, they know no fear.
 In their minds, with instinct at
 Time, adventuring, they quit
 In security of land;
 Steadfast eye and skillful hand,
 In solitudes of space
 With Thy saving Grace,
 Protect the men who fly
 In lonely ways beneath the sky.
 M. C. D. H.

Thine Is the Kingdom.

Thine is the kingdom, and the power,
 And the glory, for ever. Amen.—S.
 vi.: 13.

Thine is the kingdom, Lord!
 In subjection at Thy feet we bow,
 O mighty Sovereign Thou, and only
 Thou!
 Thine is the kingdom, Lord!

Keep steady our trembling hearts, in
 Days of world-wide distress, by re-
 minding that the familiar words we
 said so many times—often carelessly
 and perhaps—*are true.* It is TRUE that
 the Almighty Ruler over all the
 things of the earth. An emperor
 feel himself very invincible, as he
 at his armies and guns, his sub-
 marines and airships, but he is only a
 weak other men. At any moment
 the angel of death may touch him and
 he will be no more. *Thy soul is
 the authority of thee.* Then he must stand
 weak as any other man—to give
 of his stewardship.

Lord is our King; He will save
 us as a Jewish prophet; and if He
 is the King of the Jews, much more
 will He claim His Royal protection, for
 through His wondrous Incarnation—the
 Son of God—He has become near of kin to us.
 He declared that all power in heaven
 and earth was His; and those who call
 themselves Christians bring dishonor on
 themselves when they talk hopelessly
 of the present condition of affairs.
 The kingdom and the power belong to
 Him. We may be bewildered by
 the present when the helpless and inno-
 cent are tortured and killed. So the
 One on the Cross looked up
 into the darkness and asked why He
 was forsaken. That "Why?" of
 the children of God still goes up.
 We do not know the answer—yet—but
 we know that we are to follow our Master
 and ourselves trustfully into our
 Father's hands. He did not wait until
 the hour was over, until God had shown
 His love. In the darkness he groped
 for the Heart of God and rested there,
 yet peaceful.

It is absolutely true that the Most
 High is in this world, in great mat-
 ters and in small. Perhaps trouble has
 come into your life through the
 sin and injustice of men, and you
 feel that Satan, not God, has
 the trouble. Yet God is King,
 and He has permitted the trouble to
 come upon you. In the story of Job
 taken behind the scenes of a
 life of earthly life. There we see
 permitted to do his very worst
 a faithful servant of God. Job
 through the furnace of affliction
 came out shining with new spiritual
 life. Before his troubles he had
 been God, now his eyes were opened
 to the Vision of His Face, so that his
 righteousness of life seemed paltry
 and temptible as compared with the
 holiness of God. "I have heard
 by the hearing of the ear: but
 now mine eyes see Thee. Wherefore I
 despise myself, and repent in dust and
 ashes." He said when his comfortable
 life had been suddenly swept away
 and he had spoken to his suffering
 Shepherd. So it was with David. Read the
 shepherd psalm—the 23rd—and
 notice that while the sheep is
 peacefully in green pastures or
 in safe and easy paths, he

speaks about the Shepherd. When he
 finds himself struggling fearfully through
 the dark valley of the shadow of death,
 he presses close to his mighty Shep-
 herd's side and speaks to Him: "I will
 fear no evil: for Thou art with me."

We are only ignorant little children in
 God's Family. We cannot—yet—under-
 stand His reasons for permitting horri-
 ble wickedness to go long unchecked.
 We can only cling to His hand in the
 hour of darkness and say undauntedly:
 "I will fear no evil: for Thou art with
 me; thy rod and thy staff they comfort
 me." You know that the word "com-
 fort" means to strengthen. Many sorely
 tired hearts have gained wonderful
 strength by endurance of pain and sor-
 row. The dark hour is the testing-time.
 Shall we be cowards or heroes? I was
 this morning looking at a photograph
 of a crowd of Belgian refugees, flying for
 their lives from a doomed city. Most
 of the faces were sad and hopeless, but
 one young woman was smiling. Just
 think of the courage shown by that
 bright smile!

Many of our readers are enduring a
 heavy strain of anxiety or a crushing
 burden of sorrow. It is your testing-
 time. When it is over will you think
 sadly: "I was a coward. I went
 down helplessly and helped to make life
 harder for others. I indulged the miser-
 able weakness of self-pity and grew more
 selfish and hard-hearted." Or will you
 come out of the dark time with radiant
 face, with your hand held close in your
 Father's hand and your eyes on His
 face? Can you be brave enough to
 smile, like that splendid Belgian girl,—
 and keep on smiling—when everything
 seems to be going wrong? You may
 not be very brave naturally, but if you
 can feel God's hand-clasp in the dark-
 ness and know that He rules supreme
 in this loved world of His, happiness and
 peace will spring up like living waters
 in your heart. Give up asking "Why?"
 and find gladness in the certainty that
 our Father is King. If He allows terri-
 ble things to happen it is not because
 He is either weak or unloving.

"I do not ask my cross to understand,
 My way to see;
 Better in darkness just to feel Thy hand
 And follow Thee."

When our Captain chooses out a soldier
 here and there for a dangerous and diffi-
 cult duty, He is showing confidence in
 that soldier and honoring him. No
 general will choose a coward or a weak-
 ling to keep a dangerous pass or defend
 a threatened city. And when God—our
 King—calls us to endure hard trials and
 bitter pain of heart or body, let us try
 to be as brave as our soldiers who scorn
 to make a fuss about hardships and
 wounds, and are full of eager enthusiasm
 when permitted to leave their safe
 quarters, behind the lines, for a coveted
 position "at the front."

There is a story of a village "rake"
 who seemed to have no trace of manli-
 ness in him. He loafed and drank his
 life away, until the war broke out.
 Then he enlisted, passed through his
 training and went to the war. In a
 few weeks his body was brought home
 and the village people rose up as one
 man to do him honor. He had died a
 hero's death, trying to save a wounded
 comrade. This war has fanned into
 flame the glorious manhood in many a
 heart,—manhood which was slowly being
 crushed by selfish dissipation and vice.
 War is Satan's weapon, but God is forc-
 ing it to work miracles.—See Acts iv.:
 24-28.

Of how many heroes has it been said
 wonderingly: "I did not think it was
 in him!" God knew it was in him, all
 the time, but the latent heroism might
 have slowly died out in a life of easy
 prosperity. War is horrible, and a dis-
 grace to Christendom as well as to
 civilization—it is time we gave up tor-
 turing and destroying—yet God can
 bring perfumed violets out of evil-smell-
 ing dirt. The kingdom and the power
 are His, and He is still "within the
 shadows, keeping watch above His own."
 When we yield to despondency we are
 showing the world that we have no real
 faith in our King. Evil cannot triumph
 in the end. Those who build on the
 quicksand foundation of oppression and
 crime are courting destruction. Let us
 trust our Lord and take each day as a

Fresh and Refreshing "SALADA" B 76

is composed of clean, whole young
 leaves. Picked right, blended right and
 packed right. It brings the fragrance
 of an Eastern garden to your table.
BLACK, MIXED OR GREEN

Have You The MOFFAT COOK BOOK

—the Cook Book that 12,000 Canadian house-
 wives wrote. Mailed post free for 25 cents.
 THE MOFFAT STOVE CO., LTD.
 Weston, Ontario

BE SURE AND ASK FOR THE

Maxwell

Line of WASHERS, CHURNS, BUTTER
 WORKERS, FOOD CUTTERS, GAS EN-
 GINES, etc. Write for Catalogue.
 Maxwells Limited, St. Mary's, Ontario

Please mention "The Farmer's Advocate."

When you buy a range look for these features

"Armo" (rust-resisting)
 iron body; Semi-Steel
 heat-resisting firebox
 linings; a burnished top
 smooth and glossy, that
 needs only a rub with a
 soft cloth occasionally;
 an oven that you can
 wash, and so keep sweet
 and hygienic; and a re-
 liable oven thermometer
 that helps you bake.

These and many more
 you'll find in



McClary's Kootenay Range

The exclusive patented features of the Kootenay are fully
 described and pictured in a dainty recipe booklet.

This booklet is free. If you read it, you will know all about the
 Kootenay, and will be able to appreciate its fine points when
 you personally inspect it in the store of your merchant. This
 is a great satisfaction.

Fill out the coupon and mail
 it to-day if interested in the
 purchase of a range.

McClary's London Toronto
 Montreal Winnipeg
 Vancouver St. John, N.B. Hamilton
 Calgary Edmonton Saskatoon

McCLARY'S, London, Can.

Please send FREE, a copy of booklet entitled "The
 Kootenay Range and You."

NAME

ADDRESS

A Name that Counts

that means proven quality —
absolute purity — full weight —
certain satisfaction — is



For sixty years REDPATH has been known as Canada's best sugar. Every package you buy, every comparison you make with other sugars, will strengthen your confidence in the name "Redpath".

Buy in the Original Packages — 2 or 5 lb. Cartons—
10, 20, 50 or 100 lb. Cloth Bags.

"Let Redpath Sweeten it"

CANADA SUGAR REFINING CO., LIMITED, MONTREAL.

145

personal gift from His own hand. Let us be real—not sham—Christians. "There are very many who, professing full belief of all that can give worth and hope and seriousness to a man's life, yet yield their joyless hearts to sloth or sullenness, as though the love of God had brought no call to strive, no strength for victory, no hope of glory among the trials of this life."

DORA FARNCOMB.

News of the Week

Six thousand two hundred harvesters left Ontario for the West to help in harvesting on Aug. 24th.

The Western wheat crop is estimated at 275,000,000 bushels.

Orillia, Ont., during one week, raised \$15,000 to buy ten machine guns and three motor ambulances.

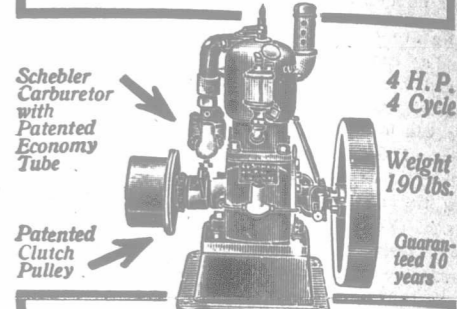
Maj.-Gen. Sam Hughes was knighted by the King, as Sir Sam Hughes, K.C.B.

The Russians have stripped the country on their line of retreat of all supplies that might be of any use to the Germans.

French aviators are continuing their raids upon German cities. Dornach, where poisonous gas is manufactured, was one of the points attacked during the week.

Shrapnel, so called after their inventor, the British General Shrapnel, are thin cases of tough steel containing a large number of bullets—in the British artillery 263 and in the French and German 300.

Does Everything Any 4 H. P. Engine Does and Some Work That No Other Engine Can Do



The Farmer's Best Helper—His Wife's as Well!

Mr. David Linton, Ransom, Ill., says: "The Cushman is the best engine for all work on the farm. My wife uses it as much as I do. Have never put hand to washer or separator since I got it." The

Farm Cushman

All-Purpose Engine

is on the job the year around for any power work anywhere, any time, and operates any binder. The Original Binder Engine. Light weight and compact. Weight without base, 167 lbs. Delivers full 4 H. P. Throttle governor. Our own Patented Economy Tube in Schebler Carburetor gives perfect regulation and control, saves gasoline. Also 2-cylinder 6-H. P. up to 10-H. P. Engines.

Don't buy an engine of any size till you have seen our catalog of Light Weight Farm Engines.

Cushman Motor Works of Canada, Ltd.
283 Princess St., Winnipeg, Man.

Harab-Davies Fertilizers

Yield Big Results

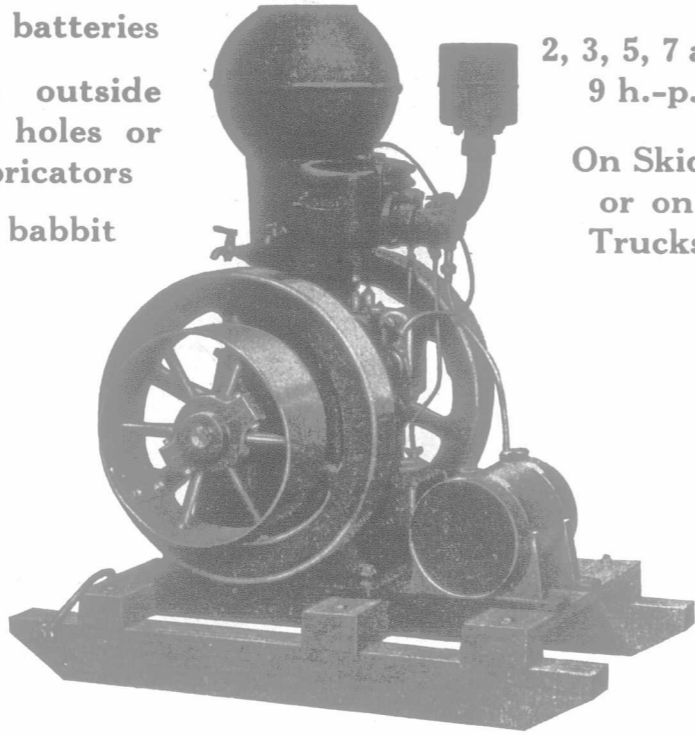
Write for Booklet.
THE ONTARIO FERTILIZERS, LTD.
West Toronto

LISTER GASOLINE ENGINE

No batteries
No outside oil holes or lubricators
No babbit

2, 3, 5, 7 and 9 h.-p.

On Skids or on Trucks



Ten thousand farmers during the past three or four years have installed

Lister British-Made Gasoline Engines

Look us up at the TORONTO FAIR. Also at OTTAWA and LONDON FAIRS, where we are also exhibiting Melotte Cream Separators, Lister Silos, Grinders, Threshers, Feed Cutters, Milking Machines, Saws, Pumps, Lister Electric Lighting Plants.

R. A. Lister & Company, Limited

Toronto Winnipeg Quebec St. John
Works: Dursley, England

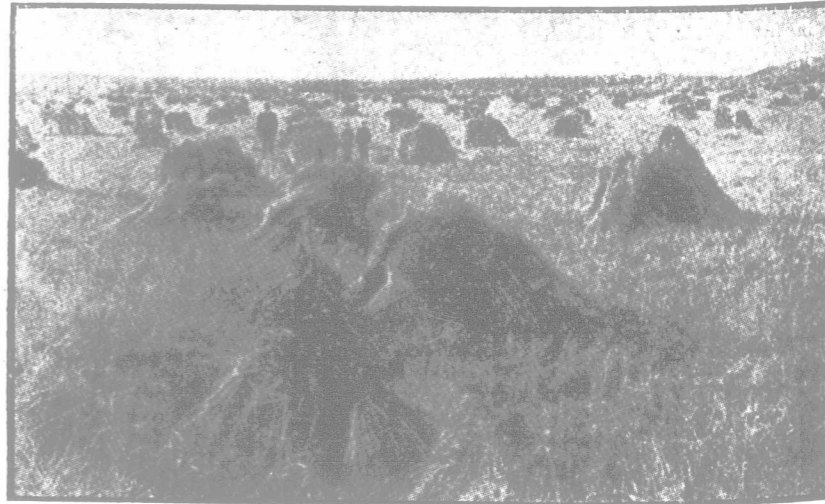
Temiskaming & Northern Ontario Railway

(ONTARIO GOVERNMENT RAILWAY)
HON. W. H. HEARST, Premier

New Through Train Service between TORONTO and WINNIPEG.

Leaves Toronto Tuesday, Thursday and Saturday, arriving
Winnipeg, Thursday, Saturday and Monday

Toronto, Montreal, through Sleeping and Dining Cars to Timagami, Cobalt, Englehart, Elk Lake, Cochrane, Porcupine, traversing the far-famed Timagami Lakes—The Sportsman's Paradise.



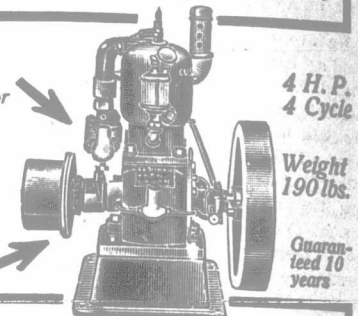
A Temiskaming Farm, 5 miles from New Liskeard—S. Greenwood, Owner

Through the silver and gold field, producing over one-third of the world's product. Through the great clay belt—20,000,000 acres of rich agricultural lands await the settler.

For full information, pamphlets, time tables, etc., apply—

GEO. W. LEE, A. J. PARR, W. H. MAUND,
Commissioner, G. F. & P. A., Sec.-Treas.
North Bay, Ont. North Bay, Ont. Toronto, Ont.

Everything Any 4 H. P. Engine Does and Some Work No Other Engine Can Do



4 H. P. 4 Cycle

Weight 190 lbs.

Guaranteed 10 years

Farmer's Best Helper—His Wife's as Well!

David Linton, Ransom, Ill. "The Cushman is the best for all work on the farm. I use it as much as I do. I never put hand to washer or tractor since I got it." The

Farm Cushman

All-Purpose Engine

Do the job the year around for any power work, any time, and operates any binder. The Binder Engine. Light weight and compact. Weight without base, 167 lbs. Delivers full Throttle governor. Our own Patented Valve-in-Head Carburetor gives perfect regulation and control, saves gasoline. Also 6-H. P. up to 10-H. P. Engines.

Don't buy an engine of any size until you have seen our catalog Light Weight Farm Engines. Cushman Motor Works of Canada, Ltd. Princess St., Winnipeg, Man.

Harab-Davies Fertilizers

Yield Big Results

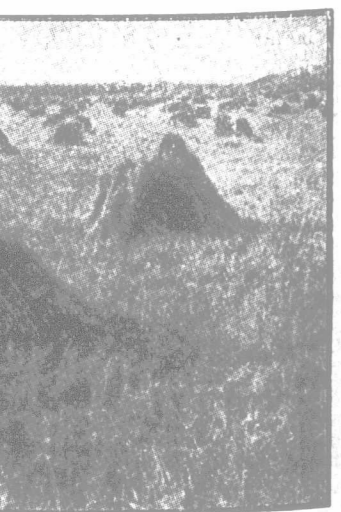
Write for Booklet. ONTARIO FERTILIZERS, LTD. West Toronto

Ontario Railway

RAILWAY Premier

TORONTO and WINNIPEG. and Saturday, arriving day and Monday

ing and Dining Cars to Lake, Cochrane, Porcupine, Lakes—The Sportsman's



heard—S. Greenwood, Owner

over one-third of the world's land—20,000,000 acres

tables, etc., apply—

W. H. MAUND, Sec.-Treas. Toronto, Ont.

RAIN-PROOF!

PEDLAR'S "OSHAWA" and "GEORGE" GALVANIZED STEEL SHINGLES

are superior to wood shingles, which absorb moisture and warp and curl when the sun dries them out, causing them to leak at the next rainfall.

"Oshawa" and "George" Shingles will not rot like wood shingles. They are patterned in such a way that they cannot sweat on the underside, as they are ventilated through the side lock, protecting and preserving the wooden sheathing boards of the roof from moisture.

"Oshawa" and "George" Shingles lock on all four sides, with self-draining locks. The side lock has flanges, which prevent driving rain or snow from entering at top, and the bottom is effectually sealed, preventing any possibility of a leak.

See them at
TORONTO EXHIBITION

Write TO-DAY for Shingle Book "L. F." Address nearest Branch
The PEDLAR PEOPLE, Limited
(ESTABLISHED 1861) (39-R)
Executive Office & Factories: Oshawa, Ont. Branches: Montreal, Ottawa, Toronto, London, Winnipeg

CREAM

Where are you shipping now? And what are you getting for your cream?

We want more individual shippers and more men to gather cream for us.

Write for our proposition.

Silverwoods Limited
LONDON, ONTARIO

Young Poultry

Feed Purina Scratch Feed, twice daily, with Purina Chicken Chowder always before them, will mature quickly and lay early. Checkerboard bags. At your dealers.

The CHISHOLM MILLING CO., Ltd.
Dept. A. Toronto.

BARNs FOR SALE

One 64 x 45; another 66 x 22. The latter could go in sections.

McALISTER ESTATE
29 Rose St., Galt Phone 788L

Richard's QUICK NAPHTHA THE WOMAN'S SOAP
MADE IN CANADA

The Windrow.

All that is left of a quarter of a million volumes of the library of Louvain is an old parchment manuscript which happened to be taken out of the library by one of the Louvain professors. He has hidden it under ground for safe keeping, and intends to use it as a nucleus for a new library when the war is over.

.....

United States doctors and nurses have done wonderful work in Serbia since the beginning of the war. During the spring and early summer typhus fever was rampant, and so prevalent was the plague of vermin that all sorts of diseases liable to circulation by insect life were spreading rapidly. Now, owing to the strict sanitary measures introduced by the Americans, many of whom sacrificed their lives in the struggle, both of these are rapidly disappearing.

.....

Sir James Murray, the great lexicographer who for thirty-seven years worked on the "New English Dictionary," died in London on July 27th at the age of seventy-eight. He was working on the tenth volume when obliged to give up his work.

.....

Miss Winifred Holt, an American, has gone to Europe to organize a movement for establishing trades-buildings, "light-houses" in which useful trades may be taught to men blinded in the war. Already by her efforts, a "lighthouse" has been established at Bordeaux, and several others will be opened in other parts of Europe. Mr. J. P. Morgan & Co., New York, are receiving checks for the Committee for Men Blinded in Battle, which stands behind Miss Holt and her work.

Granny's Experiences

"You'll be the death of me yet, Billy"

No. 2

"Jumping in on a body like that—of course I'm glad to see you, you were always Granny's boy—but, Billy, you look sick. What's the matter?"

"Oh, indigestion; that comes from those city boarding houses, Granny—"

"So I came up to the country and Granny to get fixed up.

"The simple life for me now—early to bed and early to rise—fresh air and fresh milk with lots of your good food—your home-made bread, crisp and brown—big, soft, light muffins—fluffy tea biscuits for supper, piping hot from the oven, and good old-fashioned pies, like those you used to make when I was a boy."

"Well, Billy boy, they're just the same to-day as then—I still use the old dependable HUNT'S FLOUR—always the same and still the best—never had even a cookie spoil yet.

"Now run along and get ready for supper."

Established 1854 1664

HUNT'S DIAMOND FLOUR

"Always the Same"

Before You Build a Silo

See the—
Premier "Perfect" Silo

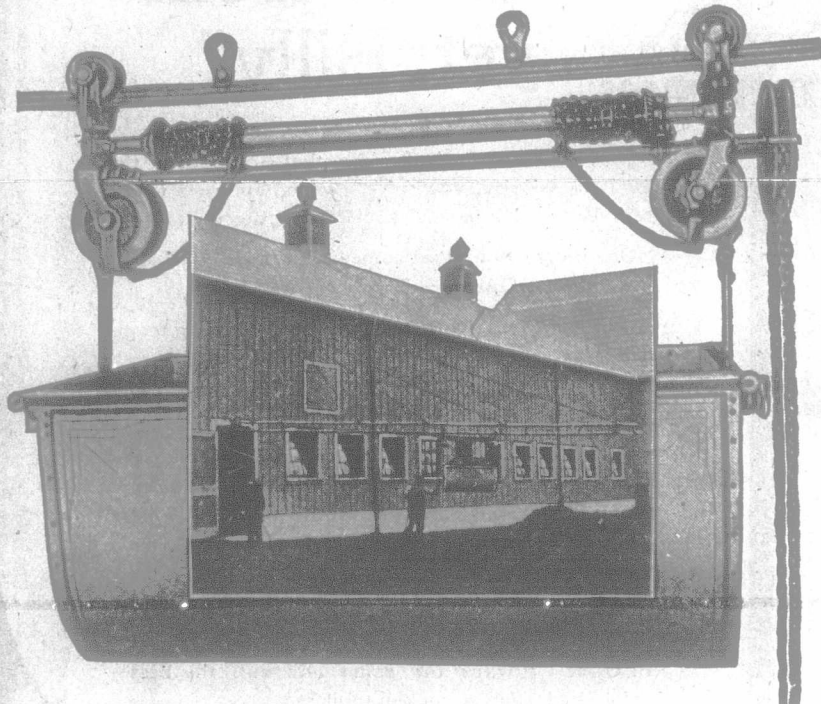
on exhibit at
Toronto Exhibition

or get our descriptive folder, "A."

The material used—selected Norway Pine, the treatment of staves and construction of silo being the result of years of experience combine to make it the most durable and satisfactory silo on the market.

Address Inquiries to—
The Premier Cream Separator Co.
TORONTO, ONT. ST. JOHN, N.B.

LOUDEN LITTER CARRIERS



**Make Easy Work
—Stop Drudgery
—Save Expense**

STABLE drudgery ends with the advent of a LOUDEN Litter Carrier. Time and labour are saved, and stable cleanliness maintained with the least outlay of time and energy. If you do the stable cleaning yourself a LOUDEN litter carrier outfit will be a boon. If you have valued hired help, it will assist you in retaining their services, and in getting value for the wages paid.

Write for catalogue and name of nearest LOUDEN dealer. There's one in every town.

LOUDEN MACHINERY CO., Dept. 112 Guelph, Ont.
"Everything for the Barn"

Razors Sharpened

Gillette's.....35c. per doz.
Ever Ready.....25c. " "
Old Style.....25c. each
New Handles.....35 to 50c.

Bring or mail to
TORONTO KEEN EDGE
63 Richmond W.

FRUIT BULLETIN

PEACHES—Season later than anticipated. The popular Crawford type—yellow free stone—Niagara District grown, about ready. Bartlett Pears, Red, Blue and Gage Plums ready, and housekeepers should place their orders at once.

PEEL COUNTY FARM FOR SALE

Hundred and fifty acres stock farm, Peel County half a mile from railway depot, forty miles from Toronto; eight-roomed dwelling; bank barn; poultry house; bearing orchard; fifteen acres bush—beech, maple and hemlock. Price Forty-five Dollars per acre. **JOHN FISHER & CO., Lumsden Building, Toronto, Ont.**

Seed Wheat—Choice, clean, white bold American Banner, yielded over 40 bushels per acre; \$1.15, per bush., bags 30c. Samples.
W.T. DAVIDSON & SON, Meadowvale, Ont.

WANTS & FOR SALE

Advertisements will be inserted under this heading, such as Farm Properties, Help and Situations Wanted and Pet Stock. **TERMS**—Three cents per word each insertion. Each initial counts for one word and figures for two words. Names and addresses are counted. Cash must always accompany the order. No advertisement inserted for less than 50 cents.

FARM for Sale—100-acre farm in Reach Township, Ontario County; bank barn, frame house, running stream. Land all good clay loam. Apply to Henry Glendinning, Manilla, Ont.

WANTED—Competent single man to work with herd of Registered Holsteins. Must be good milker and reliable. Engagement to start not later than Sept. 15th. Apply to D. C. Flatt & Son, R. R. 2, Hamilton, Ont.

CLOVERDALE

Large English Berkshires

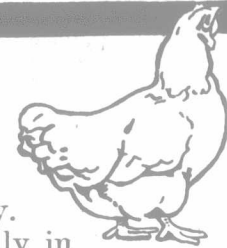
Sows bred, others ready to breed; boars ready for service; younger stock, both sexes, pairs not akin. All breeding stock imp. or from imp. stock. Prices reasonable.
C. J. LANG, Burketon, Ont. R. R. 3.

Mention The Advocate

She will Lay All right



Don't wonder whether your hens will lay. Decide that they shall lay. Eggs come naturally in winter, if you supply the food hens get on range in summer. Remember, in summer your hens eat meat in the form of grubs and insects. You must supply them, then, with meat in winter



because meat contains the protein that the hens need to produce eggs. Over-one third of the solids in an egg consists of protein. Certainly the small amount of protein in grains is not enough.

You must give your hens grit, green foods, clean water, you must mix your grain foods, you must balance your rations with Beef Scrap. That is, you must, if you want winter eggs.



Consult our book on feeding for winter eggs. A copy FREE in exchange for this coupon.

Gunns Shur-Gain Beef Scrap

GUNNS LIMITED
West Toronto.

GUNNS LIMITED,

21 Gunn's Road, West Toronto.

Send Poultry Book free.

Live Broilers

We are open for shipments of live spring broilers and for live poultry from now on. Highest market prices paid, according to quality. Write us for quotations. Prompt returns, and crates promptly returned.

HENRY GATEHOUSE
Wholesale and Retail Poultry, Game, Fish, Eggs and Vegetables
348 Dorchester St. W., MONTREAL

CREAM WANTED

We meet any competition for good quality cream. We have the experience, the capital and the market connection in the largest city in the Province. Prompt remittance. Cans supplied. Charges paid. References: Any shipper or any banker. It will be worth your while to ship us.

Toronto Creamery Co., Limited
Toronto, Ontario

WANTED FIRST-CLASS REGISTERED CATTLE, SHEEP and HOGS

for consignment to the Western Ontario Sale Co.'s Sale in London, Nov. 10th and 11th, 1915. Entries close Sept. 21st. Particulars from—

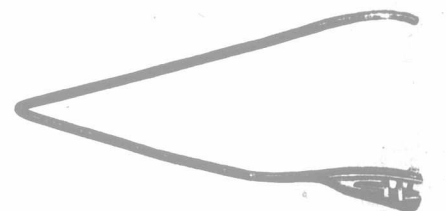
H. SMITH, Sales Manager, HAY P.O., Ont. Exeter Telephone

Fifty thousand young women in Great Britain are at work making shells in the ammunition shops. In the rural districts children of twelve and over have been drafted to help to take the places of the 150,000 farm laborers who have joined the colors.

According to a writer in the Milan Secolo, one of the reasons why Bulgaria has so long hung in the balance, in a way as puzzling as irritating to the warring nations, has been the curious fact that her official word has been almost entirely Germanophil, while her rural population has been so Russophil as to place substantial hindrance against their marching against the forces of the Tsar. Upon the whole, while the officials have been bargaining in regard to possible gains, especially the coveted possession of Macedonia, the mass of the people, remembering the cruelties of the Balkan War a few years ago, have been averse to participating in any way in the present war.

Mrs. Ellen G. White, who, with her husband, founded the Seventh Day Adventist Church, died recently at Battle Creek, Michigan, at the age of eighty-eight. The church was instituted in 1853, and now claims thirty-seven publishing houses, seventy colleges, and about forty sanitariums.

Lying Grain Lifters For Binders



Manufactured by **T. A. DICK, BOLTON, ONT.**

We have designed an attachment to go on any make of binder to raise the lying grain, so that the farmer will have no trouble in harvesting the crop this year under present conditions. It will pick up the grain so that you can cut right around the field, no matter how it is laying away from the binder, to the binder or crosswise, and will place it on the table so that it will elevate easily and tie a nice even sheaf. Farmers, if you want to get all the straw and grain, send us your order for a set. Prices are easy.

It has been announced ("New Statesman," London), that no fewer than 19,648 boys trained in reformatories have served in the war since August, 1914. Three of them have won the Victoria Cross, twenty-five have earned the Distinguished Conduct Medal, twenty have been mentioned in despatches, and three have obtained commissions.

WANTS & FOR SALE

Advertisements will be inserted under this heading, such as Farm Properties, Help and Men Wanted and Pet Stock.

MS—Three cents per word each insertion. Initial counts for one word and figures for words. Names and addresses are counted. Must always accompany the order. No advertisement inserted for less than 50 cents.

For Sale—100-acre farm in Reach Township, Ontario County; bank barn, frame running stream. Land all good clay loam. To Henry Glendinning, Manilla, Ont.

TED—Competent single man to work with herd of Registered Holsteins. Must be good and reliable. Engagement to start not later than Sept. 15th. Apply to D. C. Flatt & R. 2, Hamilton, Ont.

CLOVERDALE
Large English Berkshires
 bred, others ready to breed; boars for service; younger stock, both pairs not akin. All breeding stock from imp. stock. Prices reasonable.

LANG, Burketon, Ont. R.R.3.

Attention The Advocate



because meat contains the protein that the hens need to produce eggs. Over-one third of the solids in an egg consists of protein. Certainly the small amount of protein in grains is not enough.

You must give your hens grit, clean water, you must give your grain foods, you must give your rations with Beef Rap. That is, you must, if you want winter eggs.

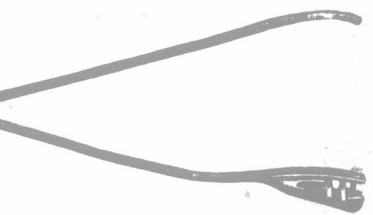
Send for this coupon.

GUNNS LIMITED.

21 Gunn's Road, West Toronto.

Send Poultry Book free.

Grain Lifters For Binders

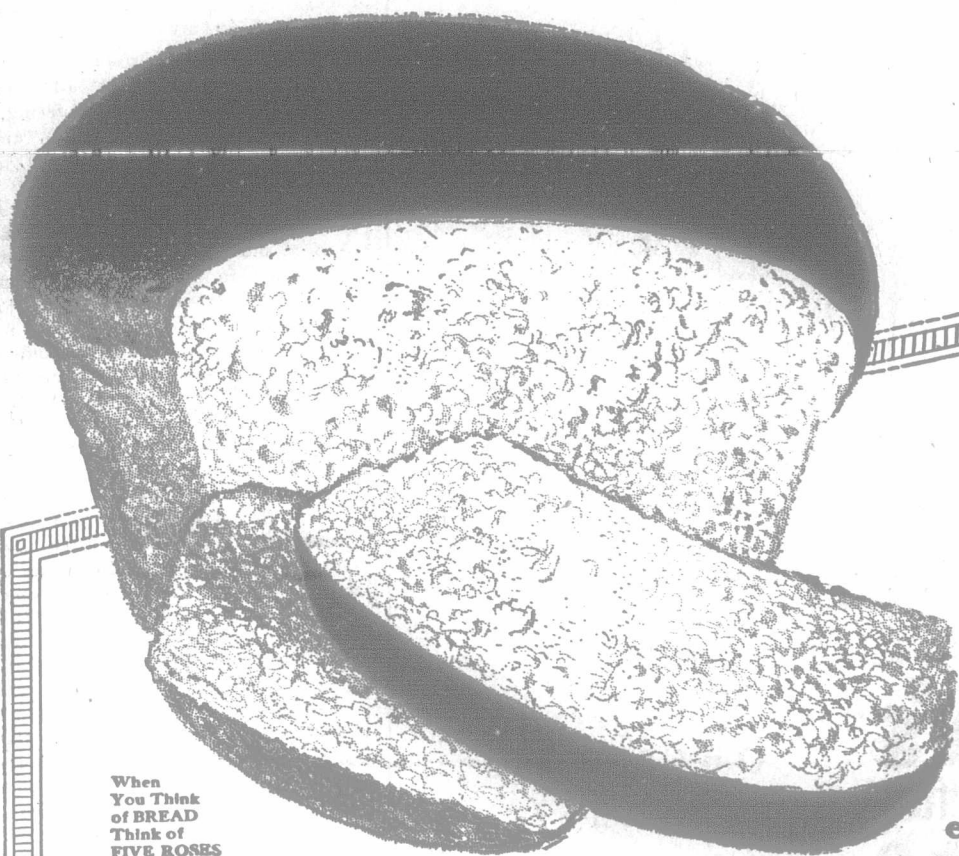


Manufactured by A. DICK, BOLTON, ONT.

I have designed an attachment to go on any binder to raise the lying grain, so that the farmer will have no trouble in harvesting this year under present conditions. You can cut and pick up the grain so that you can lay it around the field, no matter how it is lying from the binder, to the binder or crosswise. It will place it on the table so that it will elevate and tie a nice even sheaf.

If you want to get all the straw and send us your order for a set. Prices are easy.

has been announced ("New States" London), that no fewer than 19 boys trained in reformatories have died in the war since August, 1914. Of them have won the Victoria Cross, twenty-five have earned the Distinguished Conduct Medal, twenty have been mentioned in despatches, and three have obtained commissions.



When You Think of BREAD Think of FIVE ROSES

Make Your Bread Enticing

Bread is so essential to growth and vitality, you should encourage your folks to eat more. Win them to bread-eating by making your bread irresistible.

Baked from FIVE ROSES flour, your loaf enjoys a unique personality that belongs to none other.

Appearance, flavour, digestion, economy — all are served by using

Five Roses FLOUR for Breads-Cakes Puddings-Pastries

In the same splendid loaf, let it bring you this extra quality: —a fulness of nutlike flavour, a sweetness that is envied by the best cooks everywhere.

- a crisp, thin crust that is crinkly and toothsome.
 - an elastic texture, porous and well-risen, that retains for days its original freshness, the kind that cuts without crumbling.
 - every slice not only a delight, but a source of vitality, alive with the matchless nutrition of Manitoba's richest wheat.
 - a downy lightness ensuring ready and complete digestion.
- FIVE ROSES brings more—it brings economy. Because of its uncommon strength, it absorbs more liquid and produces more loaves with less exertion.

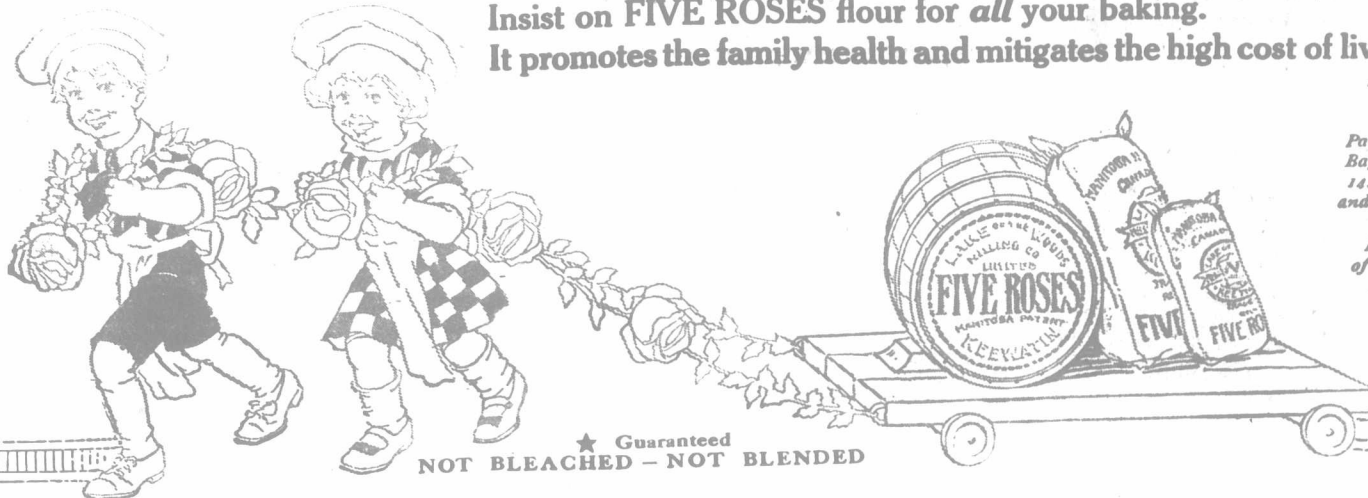
Insist on FIVE ROSES flour for all your baking. It promotes the family health and mitigates the high cost of living.

OVER 200,000 WOMEN HAVE SENT for this 144-PAGE BOOK

It gives many uses for stale bread and cake: French toast, bread puddings, bread crumbs, croquettes, pulled bread, bread dust. A splendid chapter on sandwich making.

ALL ABOUT BREAD AND CAKE MAKING

The famous FIVE ROSES Cook Book also gives complete, understandable information on pastries, tarts, patties, biscuits, buns, rolls, fried cakes, cookies, etc. Over 200 tested cake recipes. Crowded with the best selected recipes of thousands of successful users of FIVE ROSES flour throughout Canada. Send for your copy of the FIVE ROSES Cook Book. Mailed for 10 two-cent stamps. Address Dept. T. LAKE OF THE WOODS MILLING CO. LIMITED, MONTREAL.



★ Guaranteed NOT BLEACHED - NOT BLENDED

Packed in Bags of 7, 14, 24, 49, and 98 lbs. Also Barrels of 58 and 106 lbs.

"The Chaperon."

(Continued from page 1406.)

"It's good for us," I said. "Helps us to pluck and self-control." But nobody agreed with me, and it was Miss Van Buren's opinion that none save Dutchmen would stand it.

The Senate Room, which Niebuhr wrote of, found favor in her eyes; but after that there was nothing more to do in the University, and it was only six o'clock. There were two hours before the surprise dinner; so, without giving my secret away, I said that, if we put off dining until eight, we could see the Laeckenhalle, and go up to the Burg at sunset.

The Laeckenhalle and the Burg were mere names to them, as few scraps are thrown to either place by the guide-books; but so delighted were they with the carvings on the house of the Cloth Spinner's Guild and the marbles in the courtyard that I could hardly get them inside. Once within, Starr made Miss Van Buren laugh at the things she ought to have respected and linger before the things I hadn't intended to point out.

But I was not shocked at her flippant delight in a quaint representation of tortures in hell, nor was I stirred by her scorn of the stiff siege-pictures, with van der Werf offering his arm as food for the starving people, rather than surrender to the Spaniards. In spite of her distaste for the painting, however, she would not hear me decry van der Werf in favor of an obscure engineer, lately discovered as the true hero of the siege. Van der Werf should not be snatched from her by a man she chose to detest, so she argued and abused my treachery during the whole time spent among the relics of the siege. She glared at the saucepan retrieved from the Spanish camp as if she would have thrown it at my head. She thought me capable of denying authenticity to the blocks of taret-gnawed wood torn from the dykes when a worm made Holland tremble as Philip of Spain could never do; nor would she forgive me van der Werf, though I did my best with the tale of that time of fear when men, women, and children worked their fingers to the bone in restoring what the worm had destroyed, and keeping the sea from their doors.

I never yielded her a point, all the way up to the Bug, for at least I was cheating Starr of her. But in the fortress, on the ancient mound heaped up by Hengist, I and my opinions were forgotten. She wanted to be let alone, and pretended she was a woman of Leiden, looking out across the red roofs of the city, through the pitiless red of the sunset, for the fleet of rescuing barges.

Nevertheless, she did deign to ask how, if the way had been opened for the sea to flood the land, the people coaxed it to go back again. And she looked at me as she had looked at Starr, while I told how the thing had been done: how the water that floated William's fleet for the relief of the town was but two feet in depth; how only a gale from the south at the right time sent the waters flowing from the broken dykes above Schiedam north as far as Leiden; and how no sooner was the city saved than the wind changed, calling back the waters.

Little Miss MAIDEN CANADA Registered



COWAN'S
Perfection
COCOA

Outflanks all others.

The real joy of having good bread is realized by those who use

PURITY FLOUR

More Bread and Better Bread



When writing advertisers, will you kindly mention "The Farmer's Advocate"

From the walls of the fortress we saw the sun go down; and then, with Starr in the ascendant again, we strolled through quiet streets, crossing bridges over canals spread with soft green carpets of moss. But we were not going to the hotel; and without a word about dinner, I asked if they would care to see a student's "diggins." I had only to add as a bribe that Oliver Goldsmith had visited there and carved his initials in a heart on the wainscoting, to make them eager to climb the steep stairs which led to my Surprise.

It began by my opening the door at the top with a key—instead of knocking. This set them to wondering; but I laughed, evading questions, and lured them into an oak-walled room, dim with twilight.

According to instructions, no lamp of candle had been lighted, but a glance showed me a large screen wrapped round something in a corner, and I knew that I hadn't trusted good old Mervro Hoogebroom in vain.

Now I struck a match from my own match-box, and as the flame flared up, success number one was scored. It was the old-fashioned Dutch lamp-lighter of brass, to which I touched the match, that called out the first note of admiration from the strangers; and as I woke up candle after candle, in its quaint brass stick, the first notes rose to a chorus. What a lovely room! What walls, what dear old blue-and-white china beasts, what a wonderful fireplace, with handles to hold on by as you a god and warmed yourself! What chairs, what chests of drawers, what pewter tankards! If this were a typical room of a Leiden undergraduate, the Leiden undergraduates were lucky men.

I had to explain that it was hardly fair to call it typical; that only a man with money and a love for picking up old things would have quarters like these; still, the lodgings were typical of Leiden.

When the ladies had exhausted their adjectives, they grew curious concerning their host. I told them that the man was absent, because this happened to be the night of his Promotie dinner, but that I was free to do the honors.

"Well, I'm sick with envy of the fellow," said Starr, "and I for one daren't trust myself any longer, especially on an empty stomach, among his pewters and blue beasts and brasses. We'd better go away and have dinner."

"You needn't go away," said I, jerking an old-fashioned bell-rope, and drawing the screen aside. Behind it, was what I had hoped would be there—a table laid for five, with plenty of nice glass and silver, and banded with pink and white roses. As everybody exclaimed at the sight, an inner door opened and two waiters from the Lovdag, who had been biding their time for my signal, appeared in answer to the bell.

"It's black magic," said Aunt Fay. "I believe these men are geni, and you've got the lamp in your pocket. How I wish I hadn't left Tibe at the hotel. He would have loved, this, poor darling."

"Dinner is served sir," announced one of the geni; and laughing, I offered the Chaperon my arm.

"But it can't be for us," objected Miss Rivers.



Lantic Sugar



in 10, 20 and 100 pound bags —guaranteed full weight.

When you buy Lantic Sugar for Preserving, you get more than the choicest Cane Sugar, of fine even granulation and brilliant sparkle— You get it in full weight bags, containing 10, 20 or 100 pounds of this matchless sugar. You can also get fine or coarse granulation in the 100 pound bags.

the walls of the fortress we saw
go down; and then, with Starr
ascendant again, we strolled
quiet streets, crossing bridges
nals spread with soft green carpets
s. But we were not going to the
and without a word about dis-
asked if they would care to see a
s' "diggins." I had only to
a bribe that Oliver Goldsmith
ited there and carved his initials
art on the wainscoting, to make
eager to climb the steep stairs
led to my Surprise.

gan by my opening the door at
with a key—instead of knocking.
et them to wondering; but I
evading questions, and lured
to an oak-walled room, dim with
candle light.

ding to instructions, no lamp of
had been lighted, but a glance
me a large screen wrapped round
ng in a corner, and I knew that
t trusted good old Mervro
room in vain.

I struck a match from my own
box, and as the flame flared up,
number one was scored. It was
-fashioned Dutch lamp-lighter of
to which I touched the match,
lled out the first note of admira-
om the strangers; and as I woke
dle after candle, in its quaint
tick, the first notes rose to a
What a lovely room! What
what dear old blue-and-white
easts, what a wonder! I fireplace,
ndkus to hold on by is you a good
armed yourself! What chairs,
hests of drawers, what pewter
s. If this were a typical room
eiden undergraduate, the Leiden
aduates were lucky men.

to explain that it was hardly
call it typical; that only a man
oney and a love for picking up
ings would have quarters like
till, the lodgings were typical of

the ladies had exhausted their
es, they grew curious concerning
ost. I told them that the man
ent, because this happened to be
ht of his Promotie dinner, but
was free to do the honors.

I'm sick with envy of the fel-
aid Starr, "and I for one daren't
yself any longer, especially on an
stomach, among his pewters and
asts and brasses. We'd better go
nd have dinner."

"needn't go away," said I, jerk-
old-fashioned bell-rope, and draw-
screen aside. Behind it, was
had hoped would be there—a
aid for five, with plenty of nice
nd silver, and banked with pink
nite roses. As everybody ex-
at the sight, an inner door
and two waiters from the Leve-
o had been biding their time for
al, appeared in answer to the

"black magic," said Aunt Fay. "I
these men are genti, and you've
lamp in your pocket. How I
hadn't left Tib at the hotel.
ld have loved, this, poor dar-
er is served sir," announced one
renii; and laughing, I offered the
n my arm.

"can't be for us," objected Mis-

"It's for no one else," said I.
"How can we eat the man's things,
when he's never seen us, and we've never
seen him?" Miss Van Buren appealed to
Starr. But it was I who answered.

"You see him now," I confessed.
"These are my rooms. I lend them to
my cousin, but I've kept the right to
use them. As for the dinner, it's my
dinner, and it will be a humiliation to
me if you refuse to eat it."

These words were meant for her, and
I looked straight at her as I spoke, so
there could be no mistake. Red sprang
to her cheeks. She bit her lip, and
what she would have answered or done
if left to herself I shall never know, for
Miss Rivers slipped one arm coaxingly
within the arm of her stepsister, and
said, with a laugh, to make it seem
that all three were jesting—

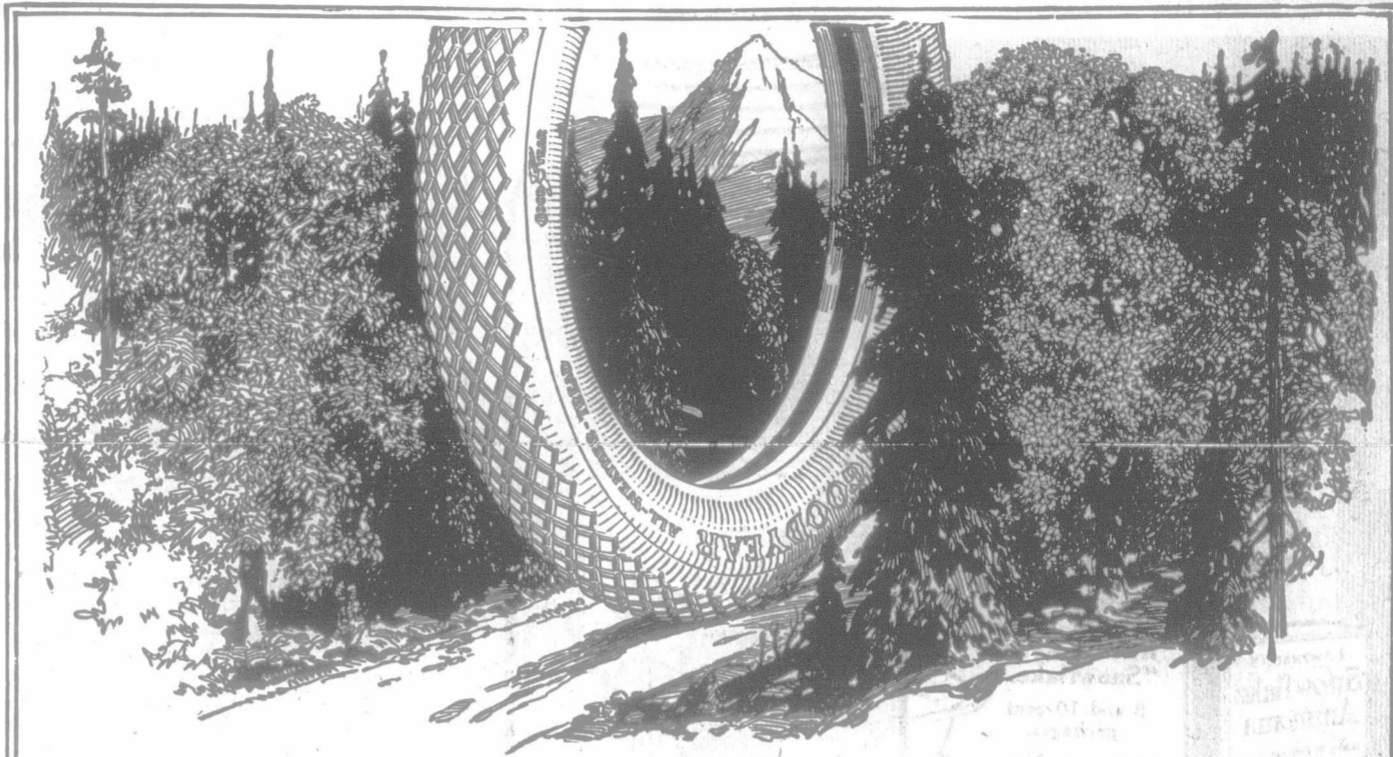
"Why, of course she won't refuse
None of us would forgive her for spoiling
our pleasure. Come along, Nell."

So Nell did "come along," like the
sweet and sensible girl she really is;
when she has not been driven to dance
by blundering young men; and we sat
down to eat the best dinner that Leiden
could provide at short notice. Nothing
that was truly Dutch had been forgot-
ten, but the most brilliant success was
not the plat on which the chef would
have staked his reputation. It was
nothing more nor less than the dish
with which all Leiden invariably occu-
pies itself on the 3rd of October, an-
niversary of blessed memory. On that
day it was, three hundred and thirty
odd years ago, that a little boy ran
joyously home from a flying visit to the
deserted Spanish camp, with a pot of
carrots and potatoes mixed together in
hotch-potch therefore with hotch-potch
does Leiden to this hour celebrate the
Great Relief, eating with thanksgiving.

And my guests ate with compliments,
enjoying the idea if not the food, as if
they had been Leideners. Last of all,
we had grilled herrings with mustard, on
toasted bread, a quaint conceit which I
had to explain by telling how, on the
3rd of October, bread and herrings are
still distributed to the poor, because it
was with herrings and bread that the
Dutch boats, coming to the relief of
Leiden, were loaded.

I managed to keep the party long at
the table, and when the Chaperon pro-
posed going, I looked at my watch,
counseling patience for half an hour.
"If you'll wait," I said, "I'll show
you something rather special, on the
way home—something that can't be seen
by every one."

Then I told about my cousin; how this
was his great day, and how, without be-
ing invited, we could share the fun. I
told how, early this morning, Jan's
Paranymphs had donned evening dress,
according to old custom, and driven in
smart carriages (the horses' heads nod-
ding with plumes) to the railway sta-
tion to meet their principal's father,
mother, sisters, and pretty cousins; how
the party had then come to these rooms,
where Jan had received them, half
shamefaced in his "swallow-tail"; how,
not long before we arrived at the Uni-
versity, Jan had gone through his tor-
ture in the "sweating-room," and be-
fore the examiners with his relatives
present; how the ladies, after seeing the
town, had been ungallantly packed off
home, before the best fun began. How
Jan had returned to cast away his
evening things at the time when most
people think of putting them on, and
rush to the Students' Club in morning
dress. How his Paranymphs and friends
had met him, and at a big round table
—soon to be covered with glasses—he
Professors' servant (called "Pedl" of
the University) had handed the new
Doctor his official appointment, in re-
turn for a fee of ten gulden. How the
dinner had begun in speech-making and
music, with an adjournment after the
first part, to the garden for coffee,
liqueurs, and cigars; how, when the tal-
es had been cleared and rearranged, every-
body had marched back to risk their
lives by eating lobster and quantities of
indigestible things. How Jan would then
have had to make his "palaver," thank-
ing his friends for their speeches in his
honor; and how, while he was speaking,
the waiters would be placing a large
napkin at the place of each man—a mere
napkin, but destined for an outlandish
purpose. "By this time," I went on



The True Test of Tires Is Driving on Country Roads

Not smooth city boulevards, but rough country roads settle all doubts of which tire is best.

That's why Goodyear Tires have won with the farmers.

For they're built in perfect balance. The All-Weather Tread is made double thick and the "carcass" beneath extra-strong to support it.

And the beauty of Goodyears has made them the favorites on boulevards, too.

Top-Place In Four Years

Four years ago we began in a modest way to build these tires at Bowmanville, Ont.

Car owners—many of them farmers—gave Good- years a trial.

At first some ran a Goodyear with a rival tire on the opposite wheel. Those early Goodyears, by their records, sold the tires of last year—when men bought as many Goodyear Made-In-Canada Tires as there are cars in the Dominion.

Protect in 5 Ways

Five great defenses are built into Goodyear Fortified Tires. They guard against the worst attacks a tire encounters—Against Rim-Cuts, Against Blow-Outs, Against Loose Treads, Against Insecurity, Against Punctures and Skidding.

These five features are all controlled by us—no rival tire has them. They protect against all troubles except mishap and misuse.

Prices Reduced 37%

Yet Goodyear Tires cost 37 per cent less today than they did two years ago when we did not make so many.

As our output multiplied, reducing factory cost per tire, we passed on the saving to Goodyear users. We gave a third reduction in spite of the war tax on all our raw material.

Some makes cost less because of cheaper methods and materials. Some cost more because of small out-

put. But figured on cost per mile Goodyear Tires cost the least.

Any dealer can supply you. Ask at once for our new price on your size.



THE GOODYEAR TIRE & RUBBER CO. OF CANADA, LIMITED
Head Office, Toronto, Ont.
Factory, Bowmanville, Ont.
Makers of Truck, Motorcycle, Carriage and Bicycle Tires and Rubber Belts, Hose and Packing.
The Goodyear Tire & Rubber Co. of Canada, Limited, has no connection with any other Canadian company using the Goodyear name (230)

Your home merchant will back up our guarantee on this splendid range. Ask to see

McClary's Pandora

Range and let him demonstrate its many exclusive features to you. A McClary dealer in every town.



All "ARLINGTON COLLARS" are good, but our CHALLENGE BRAND is the best

DO YOU NEED FURNITURE?

Write for our large Photo-illustrated Catalogue No. 7—it's free to you. THE ADAMS FURNITURE CO., Limited Toronto, Ontario



and bags weight. you get more than the brilliant sparkle— or 100 pounds of this fine granulation in the 103

Lawrason's Snowflake Ammonia

makes fruit jars crystal-clear and leaves no soapy taste, nor any grease adhering to the glass.



Ask for it by name—say "Snowflake."
5 and 10 cent packages.
Made in Canada.



Lawrason's Snowflake Ammonia
Since 1907
S. J. Lawrason & Co.
London, Canada

Keep a Kodak Record

Make your written records more valuable by illustrating them with Kodak pictures of stock and buildings and crops and orchards.



Illustrated booklet "Kodak on the Farm" free at your dealer's, or by mail.
CANADIAN KODAK CO., LIMITED, 592 King St. W., TORONTO

Free From City Disturbances

Owing to its location on the outskirts of Belleville

ALBERT COLLEGE

is free from the distracting noises and so-called attractions of a large city.

Our system provides a wholesome method of study which embraces complete and well-balanced courses in literature, science, commercial subjects, physical culture, music, art, expression, household science and theology. Our classes are under the supervision of instructors of exceptional merit.

Send a postal to-day for illustrated, descriptive calendar and terms. Fall term commences on September 6th.

ALBERT COLLEGE, BELLEVILLE, ONT.
E. N. Baker, D.D., Principal

ONTARIO LADIES' COLLEGE

and Conservatory of Music and Art
WHITBY, ONT.

Offers Unequaled Advantages for the Training of Your Daughter.

Twenty-eight miles from Toronto, 100 acres of grounds, beautiful gardens, tennis courts, large gymnasium and swimming pool. University graduates give instruction in Academic and Household Science Departments; facilities for Musical Education of the highest order affiliated with the Ontario Conservatory of Music. An excellent physical, spiritual and social environment which makes for a well-adjusted, high-staying, strong, and happy girl.

Write for prospectus to
Miss F. L. Farewell, B.A., Principal

mysteriously, "those napkins are fulfilling their destiny, and if you would like to see what it is, you've only to follow me."

They were on their feet in an instant. We scrambled down the narrow stairs, and out into the starlit night. Leiden was a city of the dead. Not even a dog played sentinel for the sleeping townfolk; not a cat sprang out of the shadows as I led my band through a labyrinth of canal-streets, flooded as if with jet nailed down with stars. But suddenly the spell of silence was broken by an explosion of sound which crashed into it like breaking glass. A brassy blare of music that could not drown young men's laughter, burst on us so unexpectedly that the three ladies gave starts, and stifled cries. I stopped them at a corner, and we huddled into the shadow, flattened against a wall.

"The Napkins are coming!" I said, and I had not got the words out before the blue darkness was aflame with the red light of streaming torches, a wild light which matched the band music. There was a trampling of feet, and in the midst of smoke and ruddy flare sequined with flying sparks, came torch-bearers and musicians, led by one man of solemn countenance, holding in both hands a noble Nougat Tart—the historic, the indispensable Nougat Tart. Then, with a measured trot that swung and balanced with the music, followed the napkins, wound turban-fashion round the heads of their wearers, and floating like white banners with the breeze of motion. First came a Paranymp thus adorned, then the learned Doctor holding fast to the leader's coat-tails; behind him a second Paranymp, and clinging to his coat the hero's father, with the whole procession of turbaned friends trailing after.

They swept by us as a comet sweeps down the sky, and concerned themselves with our group against the wall no more than a comet does with such humble stars, dusting the outskirts of the Milky Way, as shrink from his fiery path.

"A vision of goblins," said the Mariner, when he had got his breath.

"What fun! But why do they do it?" asked Miss Rivers.

Why? I'm sure I don't know," I laughed, "except because they always have, and I suppose always will, while there's a university at Leiden. That's all we'll see, but it isn't all there is to see. By-and-by the procession will go prancing back to the Club, where the next thing will be to get over the big reading-table, then over the buffet of the bar, without once breaking the chain of coat-tails, through passages and kitchens to the club-room once more, where the chain will be split up, but where the chairs in which the men will sit to drink champagne and eat the Nougat Tart, must be on the tables and not around them."

"And will that be the end?" inquired the Chaperon, who ever thirsts with ardor for information.

"Not nearly," said I. "The third part of dinner will be due, and every one's bound to eat it, even those whose chairs have fallen off from the pyramids of small tables, and whose heads or bones have suffered. They'll have dessert; and at dawn the best men will be taking a country drive."

"I begin to understand," said Starr, "how your people exhausted the Spaniards. Good heavens, you could wear out the Rock of Gibraltar! And I see why, though you can eat all day and all night too, you don't put on fat like your German cousins."

"When we begin a thing, we Dutchmen see it through," I replied modestly.

"So do we Americans," remarked Miss Van Buren.

"I wonder which would win if the two interests were opposed?" I hazarded, a propos of nothing—or of much.

"I should bet on America," said she.

"I don't bet," I returned, with all the emphasis I dared give; though perhaps it was not enough to tear up a deep-rooted impression, albeit the seed had been sown for but four-and-twenty hours.

So ended the lesson for the first day. It was not an easy lesson for me. But I regret nothing.

(To be continued.)

HOW CONVENIENT!

CAN you imagine anything more convenient than a light, strong, graceful folding table, which may be set up, at a moment's notice, anywhere? You have need of such a table in your home. It is the

PEERLESS FOLDING TABLE

—the table of manifold uses. Everyone who sees one, wants one. It's uses multiply. It is never in the way, because it may be folded up when not in use, and tucked away behind the door. Your furniture dealer has it, or will get it for you. Ask him.

MADE IN CANADA
Write for FREE Booklet G describing our "Peerless" and "Elite" Tables

HOUD & CO., LIMITED
Sole Licensees and Manufacturers
LONDON, ONTARIO



SEAFOAM ELECTRIC



ITS ADAPTABILITY

There is no combination power washer and wringer on the market that adapts itself to such varied conditions in the home. Whether you are in the city or on a farm, you can use your Seafoam. It is designed to be operated by gas, gasoline, steam engine, electric or wind mill power. Full information on request.

Cummer-Dowdell, Ltd.
Hamilton, Ont. 20-14

MADE IN CANADA.

Alma (Ladies) College

A Christian college-home, healthful situation.

For prospectus and terms, write the Principal
R. I. Warner, M.A., D.D., St. Thomas, Ont. 63

Westervelt School

Y.M.C.A. BLDG., LONDON, ONT.

BUSINESS AND SHORTHAND

Students assisted to positions. College opens Sept. 1st. Catalogue free. Enter any time.

J. W. Westervelt J. W. Westervelt, Jr., C. A.
Principal Vice-Principal 18

CENTRAL Business College

STRATFORD, ONT.

is affiliated with Elliott Business College Toronto, Ont. These are two of the largest and best business colleges in the province. Write either school for free catalogue.

"1900" Gravity Washer

Sent free for one month's trial. Write for particulars.

"1900" WASHER COMPANY
357 Yonge Street, Toronto, Ontario
(Factory 79-81 Portland Street, Toronto)

SEPTEMBER

Ba

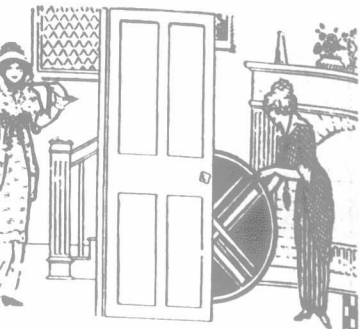
TR

The Res

Th

FORST

There is a sheep breeder's fortune time noted Forster Ont., is this and uniform This year's cr choice, fu ion of the 14158, the s champion ram it unnecessary are a number also got by number of sh ing rams at 49th, a son Romulus (in poses there a



HOW CONVENIENT!
CAN you imagine anything more convenient than a light, strong, graceful folding table, which may be set up, at a moment's notice, anywhere? You have need of such a table in your home. It is the

PEERLESS FOLDING TABLE

the table of manifold uses. Everyone who sees one, wants one. It's used everywhere. It is never in the way, because it may be folded up when not in use, and tucked away behind the door. Your furniture dealer has it, or will get it for you. Ask him.

MADE IN CANADA
Write for FREE Booklet describing our "Peerless" and "Ella" Tables
MOORE & CO., LIMITED
Sole Licensees and Manufacturers
LONDON, ONTARIO

SEAFOAM ELECTRIC



ITS ADAPTABILITY
There is no combination power washer and wringer on the market that adapts itself to such varied conditions in the home. Whether you are in the city or on a farm, you can use your Seafoam. It is designed to be operated by gas, gasoline, steam engine, electric or wind mill power. Full information on request.
Cummer-Dowswell, Ltd.
Hamilton, Ont. 20-14

MADE IN CANADA.

St. Thomas College
A Christian college-home, healthful situation.

For prospectus and terms, write the Principal
I. Warner, M.A., D.D., St. Thomas, Ont. 63

Westervelt School
M.C.A. BLDG., LONDON, ONT.

BUSINESS AND SHORTHAND
Students assisted to positions. College opens 1st. Catalogue free. Enter any time.
Westervelt J. W. Westervelt, Jr., C. A. Principal Vice-Principal 18

CENTRAL Business College
STRATFORD, ONT.

Associated with Elliott Business College, Stratford, Ont. These are two of the largest and best business colleges in the province. Write for free catalogue.

1900" Gravity Washer
Sent free for one month's trial. Write for particulars.
1900 WASHING MACHINE COMPANY
Yonge Street, Toronto, Ontario
1900-1901 Portland Street, Toronto

Bake All Day With One Firepot of Coal



Reservoir—High Closet and Glass Oven Door

We guarantee that the

"OTHELLO" TREASURE

Cast Iron Range will bake all day with one firepot of coal.

A most important point to be considered in a range is its baking capabilities. We have satisfied ourselves beyond all doubt, and hundreds of users all over Canada testify with us that the "OTHELLO" is a marvel for baking. Just think—2,020 biscuits baked with one firepot of coal. This is proof that it is

The Most Economical Range in Burning Fuel on the Market

A FEW SPECIFICATIONS:

Large Deep Firebox, with straight sides and ends, which are **Interlocking and Interchangeable**.

Oven is well ventilated.

Oven is fitted with patent cold rolled **Steel Bottom**, which ensures quick and even baking—and a saving of fuel.

Tile Back comes in two designs—either Ivory or Green Tiles.

Special Wood Lining, takes wood 28 inches long.

Top is burnished or polished. No need for blackleading.

Two Sizes—9-19 and 9-21, with six 9-inch covers. Oven of 9-21 is 22 x 20 x 13.

Ask your dealer to show you the "OTHELLO" TREASURE, or write us for booklet and particulars.

The D. Moore Company, Limited, Hamilton, Ont.

LARGEST EXCLUSIVE MANUFACTURERS OF STOVES AND RANGES IN CANADA

Gossip.

FORSTER FARM DORSETS.
There is a bright future ahead for sheep breeders, and this fall is the opportune time to found a flock. The noted Forster Farm flock, at Oakville, Ont., is this year particularly strong and uniform in breed-type and quality. This year's crop of lambs is exceptionally choice, fully sustaining the reputation of their great sire, Elgin King 14158, the sire of last year's Toronto champion ram and ewe. This fact makes it unnecessary to say that among them are a number of very extra flock-heads. Also got by the same sire are a limited number of shearling rams. Other shearling rams are the get of Homestead 49th, a son of the Toronto champion, Romulus (imp.). For foundation purposes there are also for sale a large

number of shearling and two-shear ewes, as well as this year's ewe lambs. Place your orders early, for the early orders get the early selection.

The Strong Points of Live Stock Breeds

If farmers in Canada were all Canadian-born, and if such a thing were possible that they should all have similar ideas and ideals, then horses, cattle, sheep and swine might be represented by one breed in each class. So long as we have different nationalities, languages, creeds, religions and politics is it any wonder that stockmen cannot agree as to any one all-superior breed of live stock? We doubt if one breed of cat-

tle, for instance, even of beef type, could supply the requirements of all farmers, and, furthermore, it is altogether probable that the adoption of a national or all-Canadian breed of any class of stock would militate against the best interests of the live-stock industry. We may have too many breeds but, if so, we have too many ideas, too many requirements and too many different conditions. Upon these latter phases of Canadian farm husbandry the number of breeds depends, and with only one or two exceptions, a strain or a breed niches in to fill a gap where another breed falls down. It may be said, however, in all truth, that we have a few breeds that have either been fostered by unprogressive men who are not interested in making their type of animal useful under particular conditions, or the breed itself is unsuited for the Canadian farmer. In

some cases the breeds were probably introduced as a fad or to have "something different." In any case they are making little headway, and in no way do they influence the industry at large. There is a place for the different breeds with which we are familiar; to know them and their characteristics is to appreciate their existence. While their history and development brings home to all the importance of each strain, and its relations to the industry space will not permit of a detailed review here, but a few points relative to each will distinguish the different breeds and explain their presence in Canada.

HORSES.

There can be no misunderstanding as to the importance of the different breeds of light horses. Each one satisfies some demand, but there might be some doubt

The "Premier" Exhibit at TORONTO and OTTAWA Exhibitions

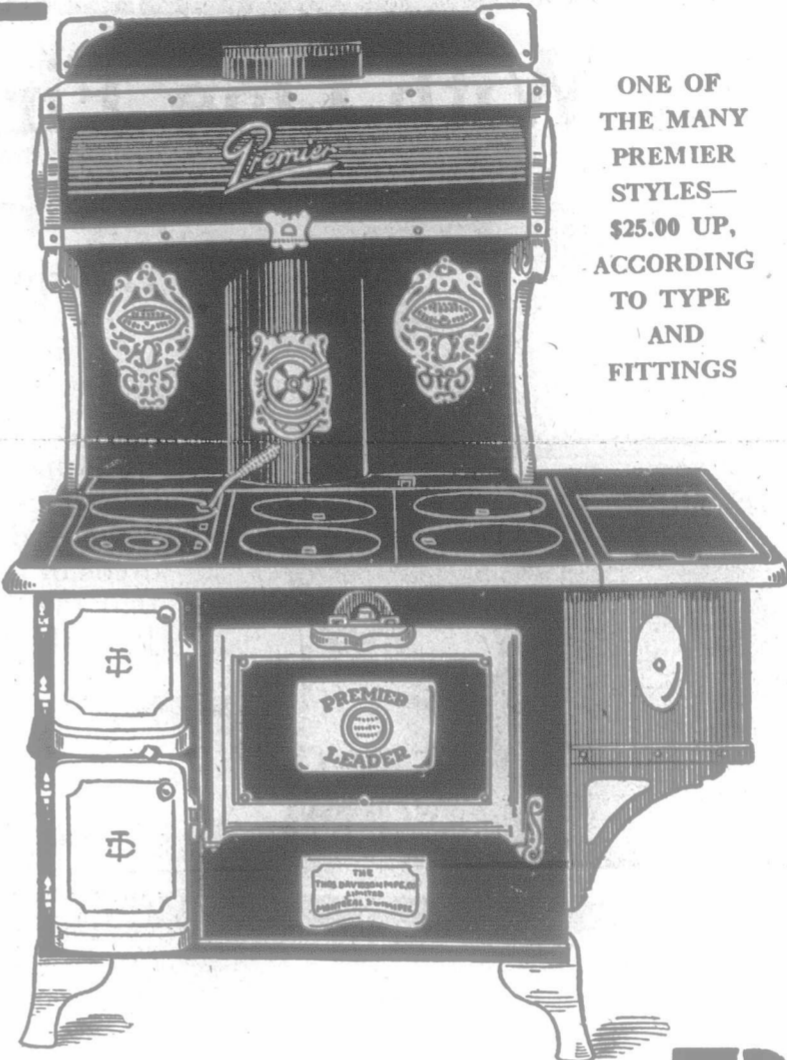
—Industrial Building at Toronto and East Wing of Main Building at Ottawa—is certainly worth a visit. Everything in it is "Made in Canada," including a full line of "PREMIER" Stoves and Ranges; "STERLING" Washing Machines; "FROST RIVER" Steel Refrigerators; and a great array of Davidson Enamel and Tinware.

YOU WILL ADMIRE THE "PREMIER" LEADER

This is one of our most popular styles—in fact users say it is the best value ever seen in a Steel Range. It is made with high warming closet as illustrated, or with Persian Closet or Tea Shelf. Here it is shown with a capacious Reservoir at the back for use where there is no running water.

The "Premier" Duplex Draft ensures even, thorough combustion of the coal, and no dead ends. The ventilated, thoroughly insulated oven bakes food to a turn, with surprisingly little fire. The whole front section lifts for convenience in toasting, broiling or adding coal.

Taking it all round, the "Premier" Leader is a source of pride and pleasure to every woman who has one.



ONE OF
THE MANY
PREMIER
STYLES—
\$25.00 UP,
ACCORDING
TO TYPE
AND
FITTINGS

The "STERLING" Washing Machine Will Last a Life-time

because there is nothing about it to play out. Except for the wooden handles and wringer board, the body is made throughout of heavy, rust-proof Galvanized Iron, while the legs are black japanned steel, well braced and rigid. The body cannot shrink and leak, nor the legs work loose and wobbly, like others made of wood. There are no gears, no dollie, agitator or moving parts inside to wear and tear the clothes or get out of order.



\$12.50

The whole body rocks with an easy motion, rubbing the clothes over the peculiarly ribbed interior, and setting up a powerful suction that forces the suds through the garments and cleans them surprisingly quick.

"Premier" Ranges have earned a great reputation on these four most important points: saving fuel; baking perfectly; being easy to work with and regulate; and standing long, hard service.

They are made in many different styles, sizes and prices, to suit every kitchen, purse and fancy. Look them over carefully at the Exhibition, for though you may not need a Range now, you will sometime—and then you'll know the right kind to choose.

THE THOS. DAVIDSON MFG. CO.

120 DUKE ST. TORONTO

MONTREAL - WINNIPEG

as to the necessity of four well-established breeds of heavy horses. Why is not a draft horse a draft horse? Why do some prefer one breed to another for draft purposes when each breed is supposed to measure up to all requirements? To John Paterson, of Lanark County, Scotland, is given much credit for using a Flemish stallion on Scottish mares and producing the foundation stock for the Clydesdale breed. Undoubtedly Shire blood was also used in the beginning, but later the breed has been maintained comparatively pure, for the Scottish farmer preferred perfection in the feet and legs to a heavy, compact body, and to us has come the modern Clydesdale with trappy action, clean bone and more quality than was found in the original stock. In Canada (Clydesdales outnumber other breeds of heavy horses, but largely on account of a sentiment that will live long where the blood of Old Scotia flows in the veins of the people. An unbiased writer says regarding Percherons, "The legs and feet are quite distinctive of the breed. No more shapely and well-developed feet are found on any draft horse than on the Percheron." The observations upon which the statement is based were probably made in France and the United States, but western Canada too is producing a better representative of the great French breed than are we in the East. Altogether the Percheron is a big, drafty animal, strongly coupled, with no feather on the legs, a feature that recommends the breed to many. The Clydesdale leads in Canada, the Percheron in the United States; why, only advocates of either breed can satisfactorily explain. Many prefer the Shire because of the heavy frame and body and ability to move extremely heavy loads. The Belgian is reputed to possess a maximum of weight within a given space, and though somewhat slow in action its great weight and strength make for it many friends. Canadians have staked a good deal on quality; the breed that can show that attribute to the best advantage has a promising future indeed.

BEEF CATTLE.

Cattle are kept for milk or beef while some breeds are reputed to be serviceable for both. Beef and dairy breeds are numerous, and here again it might seem strange that so many different types are required to supply practically the same demand. However, there are some peculiarities of type, some characteristic, some predominating feature in each that recommends it to the stockman. The great number of Shorthorn, or Shorthorn grades throughout Canada is the best recommendation a breed can possibly have. So thorough, so far-seeing and so correct in judgement were the Colling Bros., Bates, the Booths, and Amos, Cruickshank in their breeding methods and aims that we have in the breed that tendency to flesh that feeders admire, and the name of Bates is still coupled with the milking propensities of the Shorthorn which elevate them to an unchallenged position among other beef breeds in this regard. The cows make excellent mothers, and if a cross is desired for early maturing qualities or grazing purposes the Shorthorn dam is still in high repute.

Through size, quality of flesh, and superiority as a grazer the Hereford is fighting for "a place in the sun." John Hewar, one of the early English breeders, laid particular emphasis on scale, quality and uniformity of color. In these traits the breed ranks high, but Herefords are especially desired on the ranch or where grazing is an important consideration. Feeders also admire the white-faced steer for the stall or feeding runs, even though it show Shorthorn development. The Hereford and Shorthorn blend well for this purpose.

Aberdeen-Angus cattle are fast growing in public favor. Since the baby-beef industry has passed through the period which might be termed the incubation and has become an established practice, one is able to see an Aberdeen-Angus bull as head of a herd of good grade or pure-bred Shorthorn cows on many farms. The Angus in the pure is also used for this purpose because of early maturing qualities, superiority of flesh and reputation as good feeders which are annually bringing more breeders to the Angus standard. Their

Chiclets

REALLY DELIGHTFUL
THE DAINTY
MINT-COVERED
CANDY-COATED
CHEWING GUM

On your Vacation—
Riding—Fishing—Motor-
ing—Driving—Shooting—
Camping out—there is
nothing like a plentiful
supply of the Dainty
Fresh Mint-flavored
confection—

Chiclets

MADE IN CANADA

When Building—Specify

MILTON BRICK

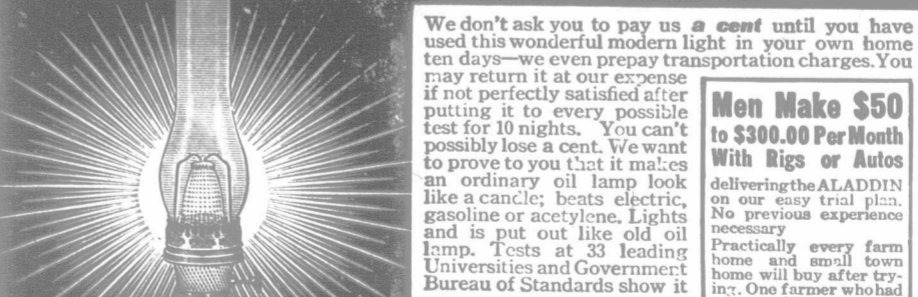
Smooth, Hard, Clean-cut,
Write for Booklet.

MILTON PRESSED BRICK COMPANY
Milton, Ont.

Please mention "The Farmer's Advocate."

10 Days Free Trial Charges Prepaid Send No Money

TWICE THE LIGHT HALF THE OIL
NEW COAL OIL LIGHT
Beats Electric or Gasoline



We don't ask you to pay us a cent until you have used this wonderful modern light in your own home ten days—we even prepay transportation charges. You may return it at our expense if not perfectly satisfied after putting it to every possible test for 10 nights. You can't possibly lose a cent. We want to prove to you that it makes an ordinary oil lamp look like a candle; beats electric, gasoline or acetylene. Lights and is put out like old oil lamp. Tests at 33 leading Universities and Government Bureau of Standards show it

Burns 70 Hours on One Gallon

Awarded GOLD MEDAL at World's Exposition San Francisco

equal to the new Aladdin (details of offer given in our circular.) Would we dare make such a challenge if there were the slightest doubt as to merit of the Aladdin? We want one user in each locality to whom we can refer customers. Be the first and get our special introductory offer under which you get your own lamp free for showing it to a few neighbors and sending in their orders. Write quick for 10-Day Absolutely Free Trial. Just say, "Show me how I can get a strong white light from coal oil, without risking a cent." Address our nearest office.

MANTLE LAMP COMPANY, 222 Aladdin Building
Largest Coal Oil Mantle Lamp House in the World
MONTREAL - WINNIPEG

Men Make \$50 to \$300.00 Per Month With Rigs or Autos
delivering the ALADDIN on our easy trial plan. No previous experience necessary. Practically every farm home and small town home will buy after trying. One farmer who had never sold anything in his life before writes: "I sold 61 lamps the first seven days." Another says: "I disposed of 37 lamps out of 31 calls." Thousands who are coin- ing money endorse the Aladdin just as strongly.

NO MONEY Required
We furnish capital to re- liable men to get started. Ask for our distributor's plan, and learn how to make big money in un- occupied territory. Sam- ple sent for 10 days FREE TRIAL.

the necessity of four well-established breeds of heavy horses. Why in draft horse a draft horse? Why we prefer one breed to another for purposes when each breed is supposed to measure up to all requirements. John Paterson, of Lanark County, and, is given much credit for using a smish stallion on Scottish mares producing the foundation stock for Clydesdale breed. Undoubtedly Shire was also used in the beginning, after the breed has been maintained relatively pure, for the Scottish or preferred perfection in the feet legs to a heavy, compact body, so us has come the modern Clydesdale with trappy action, clean bone and quality than was found in the original stock. In Canada (Clydesdales) other breeds of heavy horses, largely on account of a sentiment will live long where the blood of Scotia flows in the veins of the breed. An unbiased writer says regarding Percherons, "The legs and feet quite distinctive of the breed. No shapely and well-developed feet are on any draft horse than on the Percheron." The observations upon the statement is based were obtained in France and the United States, but western Canada too is producing a better representative of the French breed than are we in the United States. Altogether the Percheron is a drafty animal, strongly coupled, no feather on the legs, a feature which recommends the breed to many. Clydesdale leads in Canada, the Percheron in the United States; why, advocates of either breed can not satisfactorily explain. Many prefer the Percheron because of the heavy frame and ability to move extremely fast loads. The Belgian is reputed to carry a maximum of weight within a small space, and though somewhat slow in its great weight and strength for it many friends. Canadians have staked a good deal on quality; the Percheron that can show that attribute to best advantage has a promising future indeed.

BEEF CATTLE.

Cattle are kept for milk or beef while breeds are reputed to be serviceable for both. Beef and dairy breeds are numerous, and here again it might be strange that so many different breeds are required to supply practically the same demand. However, there are peculiarities of type, some characteristic, some predominating feature in that recommends it to the stock-raiser. The great number of Shorthorn, northern grades throughout Canada is the best recommendation a breed possibly have. So thorough, so fast and so correct in judgement were Colling Bros., Bates, the Booths, Amos, Cruickshank in their breeding and aims that we have in the United States that tendency to flesh that feeders admire, and the name of Bates is coupled with the milking propensity of the Shorthorn which elevate it to an unchallenged position among beef breeds in this regard. The make excellent mothers, and if a sire is desired for early maturing quality for grazing purposes the Shorthorn is still in high repute.

ough size, quality of flesh, and superiority as a grazer the Hereford is being for "a place in the sun." John R. of one of the early English breeders particular emphasis on scale, quality and uniformity of color. In these breeds the rank high, but Hereford are especially desired on the ranch where grazing is an important consideration. Feeders also admire the Hereford steers for the stall or feeding even though it show Shorthorn improvement. The Hereford and Shortblend well for this purpose.

Green-Angus cattle are fast growing and in public favor. Since the baby-beef industry has passed through the period of its infancy it might be termed the Hereford and has become an established fact, one is able to see an Aberdeen-Angus bull as head of a herd of good or pure-bred Shorthorn cows on farms. The Angus in the pure is used for this purpose because of its maturing qualities, superiority of and reputation as good feeders are annually bringing more breeders to the Angus standard. Their

enviable records in killing tests, the numerous championships won at the Chicago Fat Stock Exposition, and their performances in the show-ring elsewhere have placed them in a position that is hard for other breeds to attain.

In their native country the Galloway is looked upon with considerable favor. They are hardy and good beef makers. In 1853 these cattle were introduced into Canada, and other representatives of the breed came over in 1861. Although they have been maintained and bred in this country for over half a century Galloways often appear at our largest exhibitions, unfitted and represented by only one herd. We are not prepared to say that they are not suited to Canadian agriculture, but it does not speak well for the breed to see them making such little progress. They have been here longer than some of the other breeds, but in all that time they have not developed enough or become well enough known to be considered rivals of the Angus, Shorthorn or Hereford.

DAIRY CATTLE.

Of the dairy breeds there are four recognized in the Dominion to be worthy of a place, the Guernsey is bred more extensively in Eastern Canada than in Ontario or in the West, but they have not gained the importance attributed to either the Holstein, Ayrshire or Jersey. The first mentioned, namely, the Holstein-Friesian, originated on the plains of Holland. The country is generally fertile, the climate mild, and they were bred for size and great production. With us they are still the great producers, and although their records of performance are almost beyond belief the maximum is not yet reached, for their ability to produce appears unlimited. For the dairyman with a fertile farm who is prepared to feed liberally and wisely they are especially suited. The calves are large and if not desired for breeding purposes make estimable veal. Ayrshires, too, rank high in ability to produce, yet they were developed under more severe conditions. Grazing on the hills of Scotland, they became accustomed to a more rigorous climate and less liberal rations. They will thrive where the Holstein does not do so well and give good returns and satisfactory profits. In the early days considerable stress was laid upon the conformation of the udder, and the efforts of former breeders in this regard is still evidenced in the Ayrshire breed, for no other dairy cattle carry an udder so correctly placed with quarters so near perfectly balanced. This feature of the breed is still important, while the breeders are striving for more scale, larger teats, and greater production.

On the Island of Jersey in the Channel Isles, a breed has been developed and kept pure for probably a century and a half. These cattle bear the name of the Island itself, and over 40,000 head are kept annually on an area of a little over 28,000 acres. Although not so rugged as the Ayrshire or such great producers of milk as the Holstein, they are reputed to give good financial returns with less labor. In quality of milk they are perhaps supreme. In ability to reproduce they rank among the best, and a breeder has little trouble with them at the time of parturition. For the man with a small farm or for the man who only wishes to keep one cow they are a very popular breed, yet as a recognized and standard breed of cattle for the dairy business they have a widespread patronage.

In Quebec the French-Canadian cow has grown into popularity. Under conditions unsuited for many of the other strains of dairy cattle they still continue to do well, and although they do not show the uniformity of type and conformation possessed by other breeds exhibited at our larger fairs they are popular with the habitants, and have a future.

SHEEP.

Many of the differences and qualifications to be found in beef cattle appear also in the sheepfold. However, a sheep has a dual function to perform which divides that class of live stock into two categories, viz., mutton and wool breeds with some that conform fairly well to both requirements. As a mutton type the Southdown now ranks pre-eminently high. Although individuals of the breed are not large in size the mutton

Here's the load for DUCKS

It's a fast, hard-hitting load that gets what it goes after. And it's a dependable load *always*.

Dominion Shot Shells are primed with the new "3 B" primer, the largest and most sensitive; the powder used is the best that can be obtained; the shot is double chilled; loading is accurate and uniform; inspection and testing are thorough.


Every element that enters into the making of a perfect shell is to be found in

the "Canuck"

the best load for every kind of shooting that requires a speedy shell.

Made by the makers of the old reliables—Regal, Sovereign and Crown; nearly twice as many of which are shot in Canada as all other makes combined. Your dealer can supply you. Send 10 cents for 16 game pictures.

DOMINION CARTRIDGE CO., Limited
858 Transportation Bldg., Montreal.



Ideal Fence

Made in Canada

The Extra-Value Fence

Your scales will tell you that rod for rod, style for style, "Ideal" is the heaviest Fence you can buy. That extra weight means extra strength, extra service and durability an extra value for your money.

"Ideal" has that snappy, springy, hard steel full gauge No. 9 wire that you want in your Fence—that heavy but even coating of galvanizing you insist upon. Every wire and every spacing is as represented in catalogue. "Ideal" is made with even tension so that when erected it goes up straight and true—no slack wires to bag—no tight wires to break. It's a pleasure to stretch it. It's the same Fence that has enclosed for many years the thousand head of unruly buffalo at Wainwright, Alberta, for the Canadian Government. Isn't that test enough to convince you of "Ideal's" strength and service.

Don't experiment, but buy "Ideal." A postal with your name and address will bring you our catalogue No. 4 telling you more about "Ideal" Fence and Steel Fence Posts.

The McGregor Banwell Fence Co., Limited
Walkerville, Ont. 20



PREMIER QUALITY Owl Brand Cotton Seed Meal

Fully 41% Protein Guaranteed. The Standard for Forty Years. We Take a Pride in It.

Good For 

They All Need Protein—Feed a Balanced Ration—Our Booklet, "Science of Feeding" Free on Request.

F. W. BRODE & CO., Memphis, Tenn.

Established 1875. "The Owl on the Tag Means Quality in the Bag" DEMAND IT.

RIDER AGENTS WANTED

everywhere to ride and exhibit a sample 1915 Hyslop Bicycle, with all latest improvements.

We ship on approval to any address in Canada, without any deposit, and allow 10 DAYS' TRIAL. It will not cost you one cent if not satisfied after using bicycle 30 days.

DO NOT BUY a bicycle, pair of tires, lamp, or sundries at any price until you get our latest 1915 illustrated catalogue and learn all about our special proposition. The low prices will astonish you. It will cost to write us a postal, and catalogue with full particulars will be sent to you Free, Postpaid, by return mail. Do not wait. Write it now.

HYSLOP BROTHERS, Limited
Dept. 7 TORONTO, Canada

Please mention "The Farmer's Advocate."



WAR!

The Farmers' Opportunity

Never before have circumstances combined so favorably to make money for the farmers of Canada. **HIGH PRICES** on all kinds of stock will be the rule from now on. Be prepared for it, condition and fatten your stock by feeding

Wodehouse's Animal Invigorator

Thousands of farmers are using it and finding it exceedingly profitable. For raising swine and calves and fattening beef cattle there is nothing in the world like it.

The wise farmer should take warning from the above and feed **Wodehouse's Animal Invigorator** and receive the highest price for his stock.

POULTRYMEN!

If you are not using **WODEHOUSE'S POULTRY INVIGORATOR** you are not getting the best results and making the money you should from your flock. As an egg producer and conditioner its success has been marvelous.

You will find in almost every town and city a merchant who is handling **Wodehouse's Famous Preparations**.

Wodehouse's Animal Invigorator—Unequalled for all kinds of stock.

Wodehouse's Poultry Invigorator—The chicken fanciers' best friend.

Wodehouse's Creameal—The perfect food for calves and pigs.

Wodehouse's Lice Killer—Sure death to all vermin.

Wodehouse's Baby Chick Food—The purest of all Baby Chick Food.

MANUFACTURED BY

The Wodehouse Invigorator Limited

Hamilton, Ontario

Canadian Airmotors



WIND and GASOLINE

—The TWO CHEAPEST MOTIVE POWERS ON THE FARM.

Cheaper than hired men—cheaper than horses. The windmill and Gasoline engine are taking the place of both. Every modern, up-to-date farmer uses these mechanical helps to successful farming.

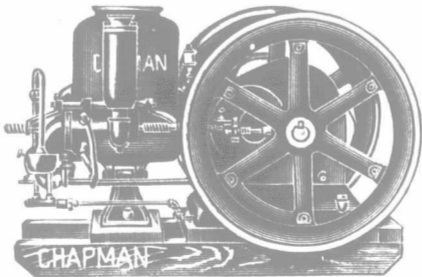
Toronto Windmills Chapman Gasoline Engines

are the recognized leaders in Canada. Every farmer knows them—the most successful are using them

For Grinding—
Sawing—Pumping

The power furnished by our windmills and gasoline engines is the cheapest and most efficient for running your grinder, pump, cutting box, pulper or separator.

SEND FOR CATALOGUE.



Ontario Wind Engine & Pump Co., Limited

Atlantic Avenue, Toronto

Write to Head Office or nearest branch: MONTREAL, WINNIPEG, CALGARY

holds premier place in the discriminating markets, and at the present time when small cuts are in favor Southdown mutton meets with ready sale. As a feeder the Southdown is considered superior. They adapt themselves tolerably well to conditions, in breeding qualities they are about average, but as producers of wool the breed occupies a subordinate position. Another general-purpose sheep is the Shropshire, which is heavier than the Southdown, and almost equals it in quality of mutton. Cross-bred or grade Shropshires are most common on the market, which proves the adaptability of the breed to different localities, and substantiates the claim that they do well when crossed upon ordinary farm flocks. Like the Southdown the "Shrop" matures at an early age, and this combined with easy-fattening qualities and a good wool clip, explains the popularity of the breed. The Oxford Down satisfies the farmer as to the weight of the annual wool clip, which tends to coarseness and length of staple, and in the amount of mutton. The size of the individual Oxford recommends it to many for they are among the largest; they also rank deservedly high as feeders. They are prolific and have met with favor for crossing on common sheep. Another medium-wool breed almost as large as the Oxford is the Hampshire Down. It occupies a superior position on account of its ability to produce early lambs, and although not reputed to be exceptionally prolific the breed ranks high in this respect. In England they adapt themselves to grazing in small areas; they pasture closely with the whole flock often formed in a semi-circle. The Hampshire has been mentioned relative to the production of early lambs, but in this regard the Dorset Horn occupies an unchallenged position. Not only will they breed twice a year, but they often give birth to twins and sometimes triplets. The lambs grow rapidly and appear especially suited for the hot-house lamb trade. As a grazer the Cheviot demands the most attention of the English breeds, and the Suffolk Down is noted for fecundity. These two breeds are not largely patronized in Canada, but they have established themselves in the favor of many farmers. Of the long-wooled breeds the Leicester, the Cotswold and the Lincoln are supreme. They meet the desire of the farmer for size, and in this respect perhaps the Lincoln leads. These three breeds require abundant pasturage, but in return they yield heavy fleeces of long wool and good carcasses. As yet the Merino has not been mentioned, but for the finest quality of wool and for grazing propensities superior to those of any other breed we must go to the Merino. Their great stronghold is on the ranch where they herd in large numbers and endure many hardships.

SWINE.

The hogs seen in Canada and the United States differ in one essential. To the South they breed and feed the lard or fat hog, while our market demands bacon and toward that end breeds are chosen. We do have the Chester White, however, as a representative of the lard breeds, but the Yorkshire, Berkshire and Tamworth hold sway in Canada with a herd of Hampshires, Duroc-Jerseys or Poland-Chinas, to be seen on occasional farms. In England, Ireland, Denmark and Canada, where bacon is produced, the Yorkshire or Yorkshire grade is perhaps the most common. It is considered a prolific breed, and will furnish a 200-pound hog at six months on fair feeding. The Tamworth was introduced into the Canadian industry on account of the quality of the bacon which it produces. In it there is no excessive fat; the sides are long and the admixture of the fat and lean meat is very acceptable. The fecundity of the Tamworth is also a striking feature and so is their ability to rustle. The Berkshire, in the eyes of Canadian breeders, is a compromise between the extreme lard and bacon types. They mature early, are good feeders, and when young the pork is found very acceptable on the market. Some stockmen have been successful in topping Yorkshire sows with Berkshire boars. The prolificacy of the dam is thus made use of while the pigs combine some of the good features of each breed.

You couldn't make one for the same money



Griffith's Handy Tie

A simple tie that can't bind or slip! Nothing to break! You could tie or untie it with mitts on. If your dealer can't supply you, send a quarter and we will send one by mail postpaid. You couldn't buy the rope that goes into this tie, and snaps and rings, for the same money—and you wouldn't have half as good a tie if you made it yourself.

Griffith's Saves You Money. Your dealer can show you a lot of Griffith money savers. Ask him. Or write to us for a list. FREE if you mention this paper.

G. L. GRIFFITH & SON,
68 Waterloo St., Stratford.

We Want Your Samples

of FALL WHEAT and FALL RYE

also FLAX and new crop ALSIKE CLOVER

Highest prices paid. State quantity, origin of Fall Wheat and price f.o.b. your station.

Sample Bags mailed on application.

Rennie's Seeds

TORONTO

Improved Manitoba Farms

640 ACRES, half-mile from town in Southern Manitoba—800 acres under cultivation, 40 acres pasture. Large eight-roomed house, 26 x 28, and second house for help, 18 x 26, four rooms. Fine barn, 52 x 70, built in 1913, two granaries, driving shed and other buildings. Nevery failing supply of excellent water. Buildings well surrounded by trees, good garden. Farm all fenced. This splendid farm and home can be bought for

\$35 per acre

\$5,000 cash, balance arranged on easy terms.

We have also a good list of small improved farms, from 160 to 320 acres, ranging in price from \$20 to \$40 an acre, according to location and improvements. Also, we have some selected unimproved land at from \$14 per acre up, in good district. List and prices will be sent on application.

STEWART & WALKER, LIMITED
202 Sterling Bank Building
WINNIPEG, MAN.

AN EVEN BALANCE

It takes 300 lbs. of BRAN to supply as much PROTEIN as is contained in 100 lbs. of **"GOOD LUCK" BRAND COTTON SEED MEAL**. For Prices and Feeding Directions write to **CRAMPSEY & KELLY**, 100 LEBANON ST., TORONTO, ONTARIO. LARGEST IMPORTERS OF COTTON SEED MEAL IN CANADA.



MAKE YOUR BIKE A MOTORCYCLE

at a small cost by using our Attachable outfit. FITS ANY BICYCLE. Write today for brochure and FREE BOOK describing the SHAW Bicycle Motor Attachment. Motorcycles, all makes, new and second-hand, \$35 and up.

SHAW MANUFACTURING CO.
Dept. 9, Galesburg, Kansas, U.S.A.

Please mention "The Farmer's Advocate."

When writing advertisers, will you kindly mention "The Farmer's Advocate."

FOUNDED 1866

You couldn't buy one for the same money.



Griffith's Handy Tie

A simple tie that can't slip! Nothing to break! You could tie or untie it with mitts on. Your dealer can't supply you, send a quarter and we will send one by mail postpaid. You couldn't buy the rope that goes into this tie, and snaps and clips, for the same money—and you wouldn't have half as good a tie if you made it yourself.

Griffith's Saves You Money. Your dealer can show you a lot of Griffith money savers. Ask him to write to us for a list. FREE if you mention this paper.

A. L. GRIFFITH & SON,
188 Waterloo St., Stratford.

We Want Your Samples

of FALL WHEAT and FALL RYE

of FLAX and new crop ALSIKE CLOVER

Highest prices paid. State quantity, origin of Fall Wheat and price f.o.b. your station.

Paper Bags mailed on application.

Rennie's Seeds

TORONTO

Improved Manitoba Farms

100 ACRES, half-mile from town in Southern Manitoba—600 acres for cultivation, 40 acres pasture. Large 2-roomed house, 26 x 28, and second floor for help, 18 x 26, four rooms. Fine 52 x 70, built in 1913, two granaries, building shed and other buildings. Nevery well supplied of excellent water. Build-well surrounded by trees, good garden. Farm all fenced. This splendid home can be bought for

\$35 per acre

\$5,000 cash, balance arranged on easy terms.

have also a good list of small improved farms, from 160 to 320 acres, ranging in price from \$20 to \$40 an acre, according to location and improvements. Also, we have some selected unimproved land at \$14 per acre up, in good district. List and prices will be sent on application.

WART & WALKER, LIMITED
202 Sterling Bank Building
WINNIPEG, MAN.

AN EVEN BALANCE

It takes 300 lbs. of BRAN to supply as much PROTEIN as is contained in 100 lbs. of

'GOOD LUCK' BRAND COTTON SEED MEAL

For Prices and Packing Directions write to

CRAMPSEY & KELLY
TORONTO & ONTARIO
SOLE IMPORTERS OF COTTON SEED MEAL IN CANADA

MAKE YOUR BIKE A MOTORCYCLE

at small cost by using our Attachable outfit. FITS ANY BIKE. Immediately attached. No special tools required. Write today for our **FREE BOOK** describing the SHAW Bicycle Motor Attachment. Motorcycles, all makes, new and second-hand, \$35 and up.

SHAW MANUFACTURING CO.
Dept. 9, Galesburg, Kansas, U.S.A.

U. S. Dressed Hogs May Come in.

The order under "The Animal Contagious Diseases Act," of date the 9th day of May, 1915, as amended by orders of date the 15th, of May, 12th of June, 22nd of July, and 5th of August, 1915, is hereby further amended as follows:

The importation of dressed hogs from the United States of America is permitted under the following conditions:

Hogs must have been killed and dressed in an establishment under Federal inspection.

Carcasses must have been singed, and feet, head and viscera removed, including kidneys, tenderloins and leaf lard.

Car lots only will be admitted.

Cars are to be sealed by a Bureau of Animal Industry Inspector, consigned to a Canadian establishment under inspection, and received there with unbroken seal. Seals are to be broken by the Inspector of the Health of Animals Branch stationed at the establishment.

Importers of dressed hogs under this amendment will be required to export every portion of the hogs so imported, with the exception of such small trimmings as are rendered, or lean trimmings, which must be cooked before being offered for sale.

After unloading, the cars are to be cleansed and disinfected to the satisfaction of the Inspector at the expense of the importer.

GEO. F. O'HALLORAN,
Deputy Minister of Agriculture.

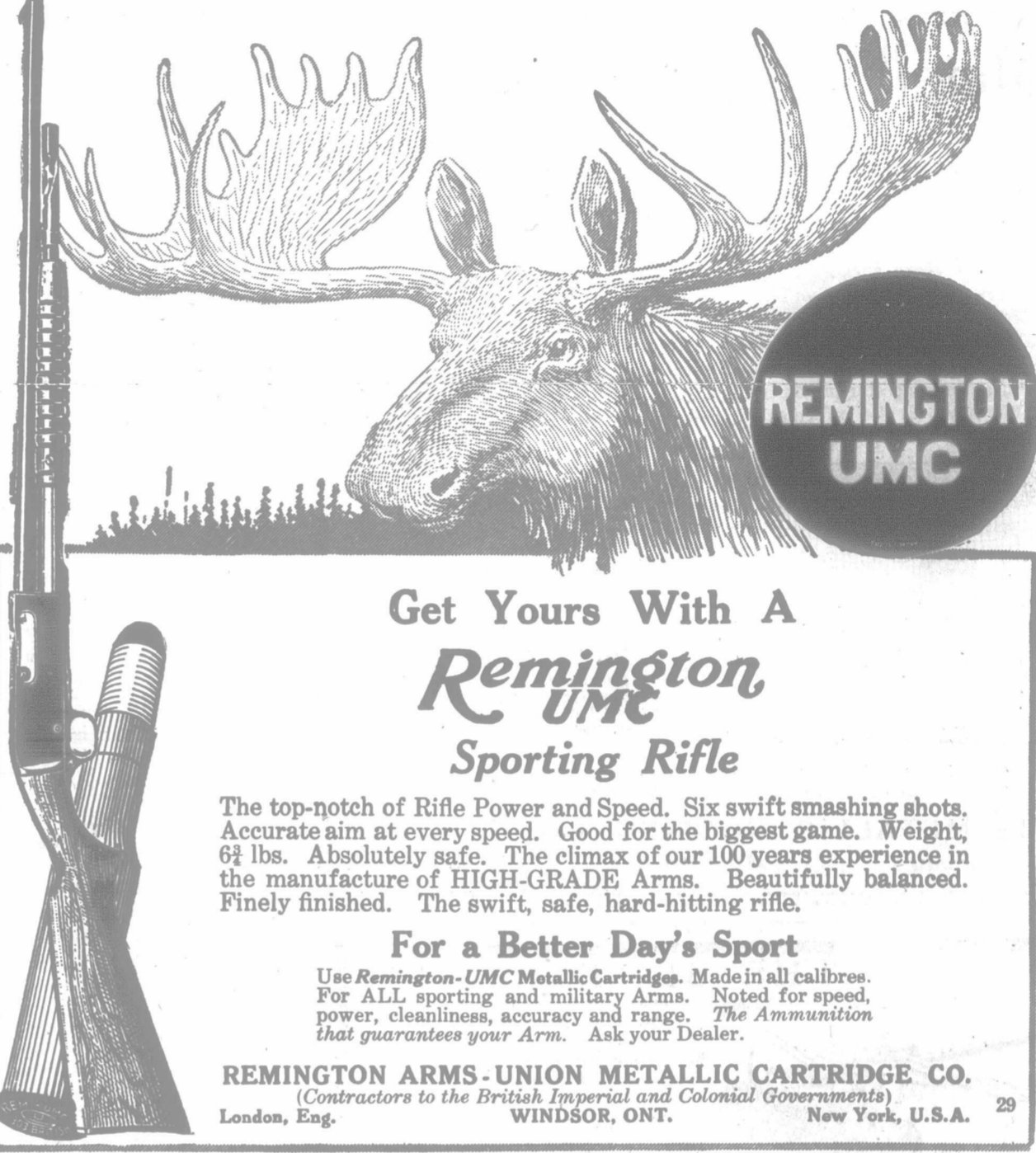
Gossip.

100-LB.-BRED HOLSTEINS BY AUCTION.

G. A. Kingston, of Campbellford, Ont., is opening the fall sale season of 1915 on Tuesday, Sept. 21, by selling on that date his entire herd of exceedingly richly-bred Holsteins. Mr. Kingston has sold his farm and the cattle must go to the highest bidder. In the issue of Sept. 16 a short resume will be given of the royal breeding of these cattle, but for full particulars parties interested should write Mr. Kingston at once for a catalogue. Suffice it here to say that they are full of the blood of such great cows as May Echo Keyes, May Echo Sylvia, and Lulu Keyes, which has lately made the phenomenal test of 36 lbs. in seven days. The sale will be held at his farm, five miles from Stirling Station, on the Belleville-Peterboro branch of the G. T. R. Conveyances will meet all morning trains at West Huntingdon and Stirling, also at Ivanhoe, C. P. R., on day of sale.

A. J. HOWDEN'S SHORTHORNS.

The rapid rise in value of Shorthorn cattle in the last few months, and the present outlook for still higher values for some years at least, make the present a most opportune time for the foundation of a herd or the strengthening of an existing one. The large and high-class herd of A. J. Howden, of Columbus, Ont., offers an exceptionally favorable opportunity to buyers looking for well-bred and high-class Shorthorns. With about 50 head to select from, with breeding unexcelled and fleshing qualities unsurpassed, buyers can make no mistake in visiting this herd whether wanting some young cows safe in calf, some one- and two-year-old heifers, or a young herd-header. The majority of the younger ones are the get of the big, thick, lavender bull, Lord Lavender 70558, a son of Lancaster Champion, and out of Lavender Beauty 4th, one of the best milking cows in the famous herd of the Alberta Government Farms. The present stock bull is the beautifully-balanced and good breeding roan Nonpareil Lord 87184, a son of Ben Cecil, by Imp. Ben Lomond, dam Dalmy Nonpareil 6th (imp.). On blood lines the herd is composed of Cruickshank Crimson Flowers, Cruickshank Butterflies, Cruickshank Duchess of Glosters, Cruickshank Nonpareils, Cruickshank Lady Fannys, and Miss Ramsdens, Kinellar Claretts, Marr Emmas, Brides-aids, Minas, and the great milking tribe, Maid of Athas. Mr. Howden is also pretty strong in Yorkshire hogs, and has for sale young stock of both sexes of choicest quality.



Get Yours With A Remington-UMC Sporting Rifle

The top-notch of Rifle Power and Speed. Six swift smashing shots. Accurate aim at every speed. Good for the biggest game. Weight, 6 1/2 lbs. Absolutely safe. The climax of our 100 years experience in the manufacture of HIGH-GRADE Arms. Beautifully balanced. Finely finished. The swift, safe, hard-hitting rifle.

For a Better Day's Sport

Use Remington-UMC Metallic Cartridges. Made in all calibres. For ALL sporting and military Arms. Noted for speed, power, cleanliness, accuracy and range. The Ammunition that guarantees your Arm. Ask your Dealer.

REMINGTON ARMS-UNION METALLIC CARTRIDGE CO.
(Contractors to the British Imperial and Colonial Governments)
London, Eng. WINDSOR, ONT. New York, U.S.A. 29

Things to Plant in September



Hyacinths, all colors, per doz. 40c., 55c., 65c., and \$1.00. If required by mail add 20c. per doz.

Single and Double Tulips, all colors, per doz. 15c., 20c., 25c., and 40c. If required by mail add 15c. per doz.

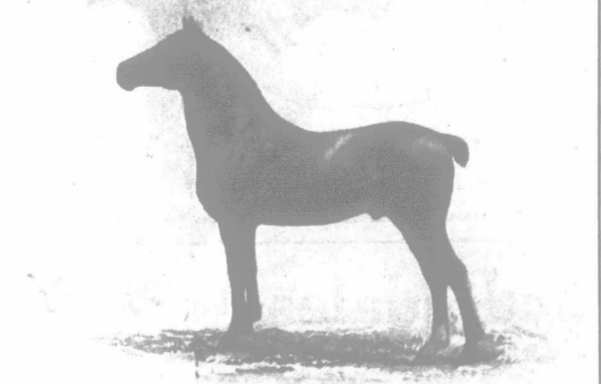
Narcissus and Daffodils, all shades, per doz. 25c., 40c., and 60c. If required by mail add 15c. to 20c. per doz.

Our Autumn Bulb Catalogue contains a list of bulbs, suitable for all purposes, and will be mailed on request.

Wm. Rennie Co., Limited, Head Office and Warehouse: Adelaide and Jarvis Sts., Toronto

BRANCHES:
190 McGill St., Montreal, Que. 384 Portage Ave., Winnipeg, Man. 1138 Homer St., Vancouver, B.C.

FOR SALE--HACKNEY PONY STALLION



Glendermott Wildfire Imp. [709] (12059), color brown, 14 hands, full brother to Mel Valley Masterpiece. He will be shown at Ottawa and Sherbrooke Exhibitions with some of his get; also a few Hackney pony mares, imp. and Can. bred, from 12-2 to 13-1 hands; show stock. Two Shetland pony colt foals, from Champion Silver Star, and a few extra good, big Clyde foals, from well-bred imp. mares and sired by Lord Aberdeen Imp. and Netherlea Imp.

Glendermott Wildfire Imp. [709] (12059). Hackney Pony Stallion by Fireboy, and full brother to Masterpiece, Champion Harness Pony of America.

MOUNT VICTORIA STOCK FARM, Hudson Heights, Que.
E. WATSON, Manager.
T. B. MACAULAY, Proprietor

When writing advertisers, will you kindly mention "The Farmer's Advocate."

Gossip.

CHRISTIE'S SHORTHORNS AND SHROPSHIRE.

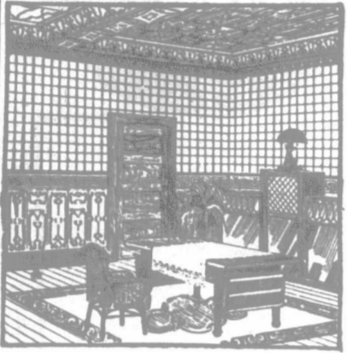
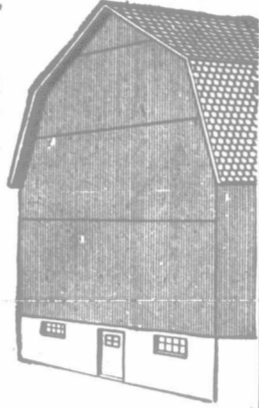
The splendid milking herd of Shorthorn cattle owned by Peter Christie & Son, of Manchester, Ont., are still going ahead in the matter of milk production. Miss Dundrennan gave 1,500 lbs. a month for the first two months after calving, then got her udder injured. She is a big cow, with a big, well-balanced udder, and, although she has now lost one quarter, she gives a big flow. Daughters of hers in the herd look like making as good individuals as their dam, which we believe is one of the greatest milking Shorthorn cows in Canada. Another, a half-sister to the old cow, is milking 50 lbs. a day. These cows trace to Beauty (imp.). Another, tracing to Wild Daisy (imp.), is giving 40 lbs. a day, and Wedding Gift 41st, in six months in R. O. P. test, has given 6,000 lbs. testing 4 per cent. These represent the producing ability of the herd. For sale are one- and two-year-old heifers, daughters of these cows, and several young bulls, some of breeding age. The stock bull is the red seven-year-old 2,500-lb. Ben Scott, out of Scottish Queen (imp.), and sired by Ben Lomond (imp.). He is a right good bull, heavy in fleshing, and exceptionally well balanced, a proven sire of worth, safe, and very sure. He is for sale or exchange, and is well worth looking after. The Shropshire flock is a large one, and up to date. This year's crop of lambs of both sexes are, for sale. In Clydesdales, Mr. Christie is offering for sale one two-year-old stallion sired by the noted Royal first-prize stallion, Acme (imp.), and dam by Sir Erskine (imp.). He is a well-grown colt of true draft character, and will make a stallion with size, and plenty of quality of underpinning.

"Metallic" Building Materials

Are Famous All Over Canada For Their Durability and Economy

If you are about to build a new barn or repair an old one, you will do well to post yourself on the superior value of "Metallic" materials. We have a reputation of over 30 years successful business with Canadian farmers. "Eastlake" Steel Shingles "Empire" Corrugated Iron; roof lights; ventilators; siding, ceiling and wall plates—all "Metallic" goods have a wonderful reputation for honest materials, careful, accurate manufacture and sterling durability.

We have all the information ready to mail you in book form, waiting your request.



THE FAMOUS "EASTLAKE" STEEL SHINGLE

Is the original and most successful of all steel shingles in use. "Eastlake" Shingles laid 30 years ago are in splendid shape to-day. Their heavy zinc coating and high-grade steel, with special patent, economical, easy-laying features, have given them wonderful favor. Booklet free.

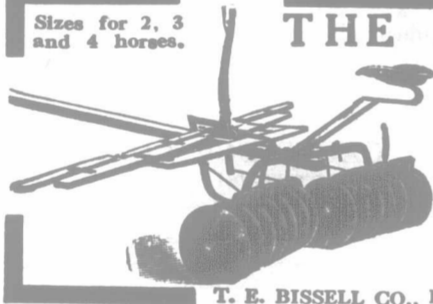
"METALLIC" STEEL PLATES FOR THE HOME

Don't neglect your home. Get our suggestions and prices on how to make ceilings and walls beautiful, fire-retardant and all but imperishable. Patterns are new, exclusive and handsomely embossed. "Metallic" Sheets are easily laid over plaster.

Our line of Sheet Metal products is very complete. Get our prices and booklet. You'll be glad you did.

The METALLIC ROOFING CO., LIMITED
Toronto Manufacturers Winnipeg

Sizes for 2, 3 and 4 horses.



THE BISSELL DISK

has made a great record throughout all Canada. There are good reasons why this is so. Balanced Right—Does not hump up. Improved Plate—Cuts and turns soil over. Hitches well Back—Easy draught. This Disk has several imitators, but no equal. None genuine without the name "BISSELL." Test trials given on hard land with anything that cultivates. Write Dept. W for free Catalogue. 92

T. E. BISSELL CO., LIMITED, ELORA, ONT.

Don't fail to call and see us at Toronto, London, Ottawa Exhibitions

Get Your Horses in Condition to Command the Top Prices

HORSES never have been so much in demand as they are to-day, but buyers are only interested in sound horses—sound horses bring good money. It will be money in your pocket to keep your horses in good condition, and if any are lame or blemished get them sound NOW!



My booklet, "How to Remove Blemishes," is free for the asking. It recommends ABSORBINE, of course, because this is the famous preparation that I have been making for about a quarter of a century, and I believe it is the safest and most effectual liniment you can use.

ABSORBINE is safe and pleasant to use—it is made of herbs, and does not blister or remove the hair—horse can be used while being treated. In addition to being a liniment it is a powerful antiseptic and germicide, which doubles its efficiency and uses. Applied to sores, cuts and boot chafes it prevents infection, kills the germs and promotes rapid healing.

ABSORBINE is economical, as only a few drops are required at each application. One ounce of ABSORBINE added to a quart of water or witch hazel makes a good antiseptic, general purpose liniment.

Use ABSORBINE

to reduce Bursal Enlargements, Bog Spavins, Thoroughpins, Puffs, Shoe Boils, Capped Hocks, Swollen Glands, Infiltrated Parts, Thickened Tissues, Rheumatic Deposits, Enlarged Veins, Painful Swellings and Affections; to reduce any strain or lameness; to repair strained, or ruptured tendons, ligaments or muscles, to strengthen any part that needs it.

Your druggist can supply you with Absorbine or I will send you a bottle postpaid for \$2.00. Write me if you have a case requiring special directions or about which you would like information.

Made in Canada by

W. F. YOUNG, P.D.F., 258 Lyman's Bldg.
Montreal, Can.

Questions and Answers. Miscellaneous.

Diseased Cow.

A purchased a cow from B. B purchased the cow from C. B only owned the cow two or three days. About three months after A bought the cow he was compelled to kill it, because of tuberculosis, about a year or eighteen months ago. About fifteen months ago C was compelled to kill a cow out of his herd because of the same trouble, but never had the rest tested.

1. Can A collect value, or part value, for cow?
2. Who would be responsible for cow?
3. Who would A come on, B or C?

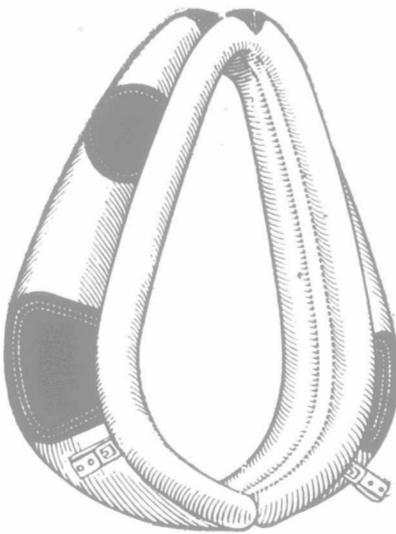
Ontario. C. B. M.
Ans.—1, 2 and 3. A certainly cannot collect from C. Nor, so far as we can judge from the statement of facts furnished us, is A in a position to collect from B. He may be able to obtain compensation from the Dominion Government, under The Animals Contagious Diseases Act (Revised Statutes of Canada, 1906, Chap. 75), provided he has complied with the provisions of that Act and amendments thereto. We would refer him more particularly to sections 3, 4, 35-38 of the Act, and Sec. 1 of Chap. 6 of the Amending Act, 3-4, Geo. V.

Feeding Grain in the Sheaf.

1. Where a person has no silo is it wise to feed oats in the sheaf to cattle, and how many should a cow or steer get at a meal?
2. Are oats in the sheaf as good a corn in the silo? Should any other feed be fed?
3. Does it pay to feed a horse on

The New "Brown Lankford" Lankford Collars

FOR PLOWING AND TEAMING



Price, \$1.75 each

Express paid on two or more collars

Lankford Collars

increase horse power. They relieve horse shoulders at work like slippers ease men's feet on the job.

Open throat principle, and oily, springy cotton fibre filling that holds no heat, and the closely-woven army duck—like a surgical bandage, give exclusiveness to Lankford, as

A Collar That Can't Fail

to remove Lumps—and cure Galls or Soreness—and prevent either. Every horse working in a stiff-throat collar (no matter how soft and big the draft) needs a Lankford for relief, to keep shoulders in good repair.

Order size smaller than in leather collars.

Ask your dealer for them, or write

T. I. THOMSON, LTD.
Owen Sound, Ont.

Clydesdales That Are Clydesdales

Three, four and five years of age, prizewinners and champions at Ottawa and Guelph, up to 2,100 lbs. in weight, with the highest quality and choicest breeding. When buying a stallion get the best, we have them; also several big, well bred, tried and proven sires from 7 to 12 years of age, cheap.

SMITH & RICHARDSON, COLUMBUS, ONTARIO

Percheron Stallion

ALBERT MITTFELDELT, Port Davison, T. H. & B. R. R. WELLANDPORT, ONTARIO

For Sale — Three-year-old, grey, a 15 good one will make a ton horse and will be sold at a reasonable price.

oats and feed the oats and straw separately to the cattle?

4. Is it a good practice to feed oats in the sheaf to horses in the winter?

J. H. S.

Ans.—1. The feeding of grain in the sheaf is not considered a good practice. It is almost impossible to keep mice and rats from destroying a large quantity of the grain while in the mow, and furthermore it is also argued that the stock will not digest the grain so well. In any case the very fact that it is very rarely fed in this way is conclusive proof that the practice is unwise. However, a few men have fed oats in the sheaf with what they considered tolerable success. The oats were cut on the green side, so the straw was more palatable than is generally the case. As to the number of sheaves fed to a cow or steer each day, that would depend altogether on the size of the sheaves and upon the quantity of grain in each sheaf. One correspondent who had followed this practice fed one sheaf in the morning and one the last thing at night, in each case after they had a fair allowance of good clover hay and sometimes corn.

2. There is no way in which we can judge the comparative values of oats and corn fed in this way. Weight for weight, the oats in the sheaf would probably be more concentrated feed than would corn in the sheaf. However, without knowing how the oats were headed or whether the ears on the corn amounted to anything or not it would be impossible to make a statement in connection with this phase of the question.

3 and 4. It is the general practice to thresh and feed the oats and straw separately. Taking everything into consideration we would advise that the ordinary method be followed.

**in Condition
at Top Prices**



...al liniment you can use.
...it is made of herbs, and does
...e used while being treated. In
...l antiseptic and germicide, which
...to sores, cuts and boot chafes it
...otes rapid healing.
...ew drops are required at each
...ped to a quart of water or witch
...se liniment.

RBINE

...pavins, Thoroughpins, Puffs,
...ds, Infiltrated Parts, Thickened
...Veins, Painful Swellings
...ness; to repair strained, or rup-
...tured any part that needs it.
...rbine or I will send you a bottle
...case requiring special directions

...a by
...58 Lyman's Bldg.
...an.

...and feed the oats and straw
...tely to the cattle?
...is it a good practice to feed oats
...sheaf to horses in the winter?
J. H. S.

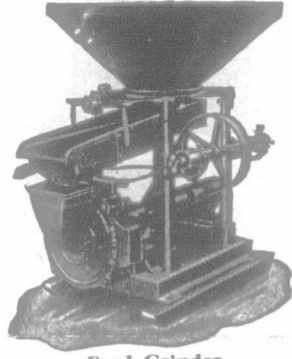
...-1. The feeding of grain in the
...is not considered a good practice.
...almost impossible to keep mice and
...from destroying a large quantity of
...ain while in the mow, and further-
...it is also argued that the stock
...not digest the grain so well. In
...ase the very fact that it is very
...fed in this way is conclusive
...that the practice is unwise. How-
...a few men have fed oats in the
...with what they considered toler-
...uccess. The oats were cut on the
...side, so the straw was more palat-
...man is generally the case. As to
...umber of sheaves fed to a cow or
...each day, that would depend alto-
...on the size of the sheaves and
...the quantity of grain in each
...One correspondent who had fol-
...this practice fed one sheaf in the
...ng and one the last thing at night.
...ch case after they had a fair
...nce of good clover hay and some
...corn.

...here is no way in which we can
...the comparative values of oats and
...fed in this way. Weight for
...the oats in the sheaf would
...ly be more concentrated feed than
...corn in the sheaf. However, with-
...owing how the oats were headed
...ether the ears on the corn
...ted to anything or not it would
...ossible to make a statement in
...tion with this phase of the ques-

...d 4. It is the general practice to
...and feed the oats and straw
...tely. Taking everything into con-
...sion we would advise that the
...y method be followed.

**THE "VESSOT"
FEED GRINDER**

The Best in the World
A Money Saver



Highest awards wherever exhibited

Our feed grinder enables the practical farmer to do his grinding easily right in his own barn. Built in different sizes, suitable for farmers and millers. We also manufacture an Oat Crusher. Write for catalogues. You will be interested.

S. VESSOT & CO., Joliette, Que. Sole Manufacturers Sold exclusively by International Harvester Co. of Canada, Limited

London, Ont.; Hamilton, Ont.; Ottawa, Ont.; Quebec, Que.; Montreal, Que.; St. John, N.B.; Brandon, Man.; Winnipeg, Man.; Calgary, Alta.; Edmonton, Alta.; Regina, Sask.; Saskatoon, Sask.

MADE IN CANADA

SAVE-THE-HORSE
(Trade-Mark, Registered)

Is Doing This Everywhere

FRANCIS McKENNA

Vienna, Wis., April 16, 1915, writes: I have a horse, eight years old, that had two bone spavins, one on each hock. I sent him to a veterinarian and had the worst one operated on, cutting open the bunch perpendicularly with the knife. I let him rest three months. I would not consent to cutting again, but began to try liniment and blisters. I had about concluded to give him away when a friend in Burlington, Wis., told me about your Save-the-Horse, as he had used it with most favorable results. I did so and found it to be all that he claimed. It was the best investment I ever made, as I would not part with that horse now for a hundred dollars in gold.

Over 19 Years a Success

No blistering or loss of hair. Horse works. Every bottle sold with Signed Contract to return money if remedy fails on Ringbone-Thoropin-SPAVIN-or ANY Shoulder, Knee, Ankle, Hoof or Tendon Disease. Book, Sample Contract and Advice all FREE. Troy Chemical Co., 147 Van Horn St., TORONTO, ONT.

Druggists and dealers everywhere sell Save-the-Horse WITH CONTRACT or we send by Parcel Post or Express Paid.

Dr. Page's English Spavin Cure

Cures the lameness from Bone-Spavins, Side-Bones, Ringbones, Curbs, Splints, etc., and absorbs the bunched hair, absorbs Capped Hocks, Bog-spavins thick pastern joints, cures lameness in tendons, most powerful absorbent.



ent known, guaranteed, or money refunded. Mailed to any address, price \$1.00. Canadian Agents: J.A. JOHNSTON & CO., Druggists, 171 King St., East Toronto, Ont.

Contains over 35% protein
Contains over 33% carbohydrate
Keeps all live stock healthy if fed daily

MAPLELEAF OIL CAKE MEAL

THE CANADA LINSSEED OIL MILLS LTD. TORONTO & MONTREAL

WRITE TO-DAY FOR FREE SAMPLE & PRICES

CHURCH BELLS
CHIMES AND PEALS
MEMORIAL BELLS A SPECIALTY
FULLY WARRANTED

McSHANE BELL FOUNDRY CO., BALTIMORE, Md., U. S. A.
Chicago Office: Room 64, 124 W. Randolph St.
Established 1856

Dr. Bell's Veterinary Medical Wonder, 10,000 \$1.00 bottles to horsemen who will give the Wonder a fair trial. Guaranteed for inflammation of the Lungs, Bowels, Kidneys, Fevers, Distress, etc. Send 10 cents for mailing, packing, etc. No return. Write address plainly Dr. Bell, Kingston, Ontario

Experiments with Autumn Sown Crops.

About two hundred and eighty-five varieties of winter wheat and a large number of selections and crosses have been grown under experiment at the Agricultural College within the past twenty-six years. Nearly all the varieties have been carefully tested in each of five years, after which the inferior kinds have been discarded and those which have given the best results have been continued in the experiments. Within the past year forty varieties, fourteen hybrids, and a number of straight selections were grown under test. Of the named varieties fourteen have been grown in each of twenty years, and the results of these are of particular value. The average results for the twenty-year period show that the following varieties gave the highest average yields of grain per acre: Dawson's Golden Chaff, 51.4 bushels; Imperial Amber, 48.5 bushels; Early Genesee Giant, 47.1 bushels; Egyptian Amber, 46.9 bushels; Early Red Clawson, 46.6 bushels; and Rudy, 45.8 bushels. In comparison with these yields the Turkey Red gave an average of 43.7 bushels, and the old Treadwell variety 42.4 bushels per acre.

From enquiries made throughout Ontario during the past year it was evident that the Dawson's Golden Chaff is still the most extensively grown variety of winter wheat in Ontario. Seventy per cent. of the answers mentioned Dawson's Golden Chaff as the most extensively grown variety in the different counties. This variety, in the results at Guelph for twenty years, has given an average of practically three bushels per acre more than any other variety grown under similar conditions. The Dawson's Golden Chaff was originated in Ontario thirty-four years ago. It produces a very stiff straw of medium length, beardless heads with red chaff, and white grain which weighs slightly over the standard per measured bushel. There seems to be evidence that the Dawson's Golden Chaff is improving somewhat in quality for bread production. Farmers' Bulletin No. 616 of the United States Department of Agriculture states that the Dawson's Golden Chaff is probably the leading variety of soft white winter wheat in the North, Central and the North Atlantic States. It also refers to this wheat as follows: "This variety stands up well in the field and is above the average in winter resistance. The grains are somewhat harder than those of most other white wheats. In several milling and baking tests that have been made it has given a good yield of flour, rather low in total protein content, but containing gluten of excellent quality." The Imperial Amber variety produces a large amount of straw which is medium in strength, a bearded head with red chaff, and a red grain of very good quality.

In the experiments conducted at the College in 1915 the winter wheat gave an average yield of grain of 13.5 bushels per acre over the average of the past twenty years. The straw was somewhat heavier, but the grain weighed one-half pound per measured bushel less than the average.

For nine years in succession experiments were conducted in treating winter wheat in different ways to prevent the development of stinking smut, and the results have been very satisfactory. In the average for five years, untreated seed produced 4.2 per cent. of smutted heads, while seed which was immersed for twenty minutes in a solution made by adding one pint of formalin to forty-two gallons of water, produced a crop which was practically free from smut. A material called Corvusine, claimed to have been made in England, and sold in Montreal, has been rather extensively advertised for the prevention of smut. We treated winter wheat last autumn and oats and barley this spring, but in every case the germination of the greater part of the seed treated with Corvusine was destroyed, and the crop produced was very small. The following quotation is taken from the booklet advertising Corvusine: "All chemicals used in this preparation are so treated as to prevent injury to the germinative power of the grain." This statement seems inconsistent with our results. Owing to excessive rains this season a

Gombault's Caustic Balsam

The Worlds Greatest and Surest

Veterinary Remedy

HAS IMITATORS BUT NO COMPETITORS!

SAFE, SPEEDY AND POSITIVE.

Supersedes All Caustery or Firing. Invaluable as a CURE for

FOUNDER, WIND PUFFS, THRUSH, DIPHTHERIA, SKIN DISEASES, RINGBONE, PINK EYE, SWEENEY, BONY TUMORS, LAMENESS FROM SPAVIN, QUARTER CRACKS, SCRATCHES, POLL EVIL, PARASITES.

REMOVES BUNCHES or BLEMISHES, SPLINTS, CAPPED HOCK, STRAINED TENDONS.

SAFE FOR ANYONE TO USE.

We guarantee that one tablespoonful of Caustic Balsam will produce more actual results than a whole bottle of any liniment or spavin mixture ever made. Every bottle sold is warranted to give satisfaction. Write for testimonials showing what the most prominent horsemen say of it. Price, \$1.50 per bottle. Sold by druggists, or sent by express, charges paid, with full directions for its use.

The Accepted Standard VETERINARY REMEDY

Always Reliable. Sure in Results.



None genuine without the signature of The Lawrence-Williams Co. Sole Proprietors & Distributors for the U.S. & CANADA. CLEVELAND, O.

NOTHING BUT GOOD RESULTS. Have used GOMBALT'S CAUSTIC BALSAM for more than 20 years. It is the best blister I have ever tried. I have used it in hundreds of cases with best results. It is perfectly safe for the most inexperienced person to use. This is the largest breeding establishment of trotting horses in the world, and use your blister often.—W. H. RAYMOND, Prop., Belmont Park Stock Farm, Belmont Park, N.Y.

USED 10 YEARS SUCCESSFULLY. I have used GOMBALT'S CAUSTIC BALSAM for ten years; have been very successful in curing curb, ringbone, capped hock and knee, bad ankles, rheumatism, and almost every cause of lameness in horses. Have a stable of forty hays, mostly track and speedway horses, and certainly can recommend it.—C. C. CRANE, Training Station, 690 Seneca Street, New York City.

Sole Agents for the United States and Canada. **The Lawrence-Williams Co.** TORONTO, ONT. CLEVELAND, OHIO.

No More Sore Shoulders



EFFICIENCY

A watch word of many of Canada's most prosperous business houses—the dictionary says efficiency means productive of effects; why not use VENTIPLEX HORSE PADS thereby making your horses efficient in their drawing power.

VENTIPLEX PADS

cure gall sores by removing their cause. Ventiplex pads are made of our patent Ventiplex fabric, it's soft, cool and comfortable on the horse and easily washed when soiled.

Your dealer will gladly supply you, and your booklet giving further information is at our office, send us your name and address and we will forward it to you.

The Burlington-Windsor Blanket Co. TORONTO :: CANADA



BALMEDIE ABERDEEN ANGUS

Get a high class Angus bull and breed the champion steers, I have show ring quality bulls from 10 to 24 months of age, also choice one and two yr. old heifers.

T. B. BROADFOOT,

Fergus, Ont

The Battle of Gettysburg

In this, the most terrible engagement of the Civil War, out of each 1,000 engaged 55 were killed. And this is exactly the number of those now in good health aged 49 who will die before reaching 68.

In the battle of Shiloh, of each 1,000 combatants 42 were killed, which is the number of those now in good health aged 30 who will die before they reach 38.

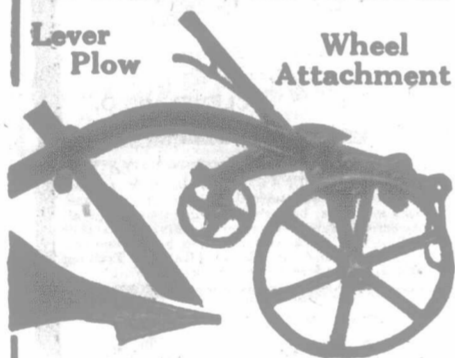
Therefore, those who fight the everyday battle of life should seek protection for their families just as earnestly as those who fight the battles of their country. We issue insurance on all approved plans.

THE MUTUAL LIFE ASSURANCE COMPANY OF CANADA
WATERLOO, ONTARIO

106

THE DICK

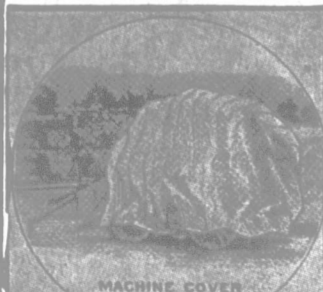
Lever Plow Wheel Attachment



will fit all makes of single walking plows. Any boy that can drive a team is capable with this Attachment of doing as good work as the best plowman. Write for full particulars and illustrated catalogue.

DICK AGRICULTURAL WORKS
Bolton, Ontario

Threshermen and Farmers



A good Canvas Cover will protect your Machinery and save its cost in one season.

12 x 18, 10 ft. first class duck, \$7.75—other sizes proportionately cheap.

WINDSOR SUPPLY CO., WINDSOR, ONT.
Belting, Hose, Rope, Pipe Fittings, Tanks and Pumps.
Write for catalogue "Engineers' Bargains."

The Glengore Angus

Some choice bulls from 7 to 15 months for sale. For particulars write

GEO. DAVIS & SONS
R. R. No. 1 Erin, Ontario

Angus Cattle

FOR SALE—If you want something good

ABERDEEN FARM
J. W. Burt, Prop. Hillsburg, R.R. No. 1

1854 "MAPLE LODGE STOCK FARM" 1915

Shorthorns and Leicesters. We have for sale one Shearling Ram sired by Connaught Royal (imp.). Also 10 ram lambs and a few ewe lambs of good quality and choice bred.

MISS. C. SMITH, Clondeboye R.R. No. 1
Long distance Phone. Farm one mile west of Lucan Crossing.

Spring Valley Shorthorns

Herd headed by the two great breeding bulls Newton Royal (imp.) 73783, and Nonpareil Royal 54122. Can supply a few of either sex.

KYLE BROS., DRUMBO, ONTARIO
Telephone Telegraph 474 Ave

Please mention "The Farmer's Advocate."

considerable amount of winter wheat throughout Ontario became sprouted before it could be harvested. Information regarding the value of sprouted wheat for seed purposes is important. In each of two years when winter wheat was sprouted in the field, germination tests of the grain were made. The following results show the average percentages of germination from each selection: skin over germ, unbroken, 94; skin over germ, broken, 76; sprouts one-quarter inch long, 30; and sprouts one inch long, 18. Not only were the sprouted seeds low in germination but the plants produced were very uneven in size.

RESULTS OF CO-OPERATIVE EXPERIMENTS.

Three hundred and eighty-eight farmers throughout Ontario conducted experiments with autumn-sown crops during the past year. Reports have been received from thirty-seven counties and districts throughout Ontario. Those sending the greatest number of reports were Nipissing, Simcoe, Ontario, Hastings, Huron and Parry Sound. The greatest number of good reports were furnished by Simcoe, Ontario, Welland, Lambton, and Haliburton.

Five varieties of winter wheat were distributed last autumn to those farmers who wished to test some of the leading varieties on their own farms. The average results of the carefully conducted co-operative experiments with these five varieties showed the following yields per acre: Imperial Amber, 35.8 bushels; American Banner, 32.5 bushels; Banatka, 30.3 bushels; Crimean Red, 27.1 bushels; and Yaroslaf, 28.8 bushels.

In another co-operative experiment the Petkus winter rye surpassed the Imperial Amber winter wheat by an average of 380 pounds per acre.

The co-operative experiments with hairy vetches and winter rye for fodder production showed that the yields in tons of green crop per acre were as follows: hairy vetches 11.1 in 1915, and 11.4 in the average of four years; and winter rye 8.7 in 1915, and 8 in the average of four years.

DISTRIBUTION OF MATERIAL FOR EXPERIMENTS IN 1915.

As long as the supply lasts, material will be distributed free of charge in the order in which the applications are received from Ontario farmers wishing to experiment and to report the results of any one of the following tests: 1, three varieties of winter wheat; 2, one variety of winter rye and one of winter wheat; 3, spring applications of five fertilizers with winter wheat; 4, autumn and spring applications of nitrate of soda and common salt with winter wheat; 5, winter emmer and winter barley; 6, hairy vetches and winter rye as fodder crops. The size of each plot is to be one rod wide by two rods long. Fertilizers will be sent by express for Number 4 this autumn and for Number 3 next spring. All seed will be sent by mail except that for Number 4, which will accompany the fertilizers.

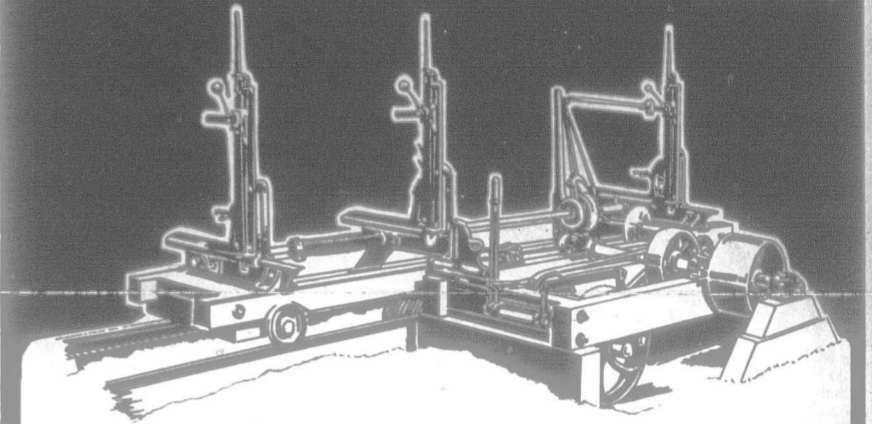
C. A. ZAVITZ.

Gossip.

A NEW IMPORTATION OF SHORTHORNS.

J. A. & H. M. Pettit, of Freeman, Ont., sons of the late W. G. Pettit, whose fame as an importer and breeder of high-class Scotch Shorthorns was continental wide, intend keeping the name "Pettit" prominently before the breeders of Canada as a name synonymous with the highest standard of excellence reached in the breeding of Scotch Shorthorns. In addition to the large and high-class herds at present on both the farms, the Pettit Bros. expect to land in this country about the first of October a specially-selected importation of not less than thirty head, selected for individual merit and richness of breeding. Of this lot a dozen will be young bulls, the balance will all be in calf or have calves at foot. Full particulars will appear in these columns on their arrival. In the present eruptive state of affairs in the Old Country, and the danger in transportation, it certainly requires a little more than the ordinary amount of courage to risk so valuable a shipment of Shorthorns, and it is to be hoped they may be landed safely, as a change of Shorthorn blood is needed in Canada just now.

WATEROUS PORTABLE SAWMILLS



If the trees on your farm are first quality timber, why cut them on a mill that will lower their market value? The Waterous Portable Outfit will cut your trees into lumber that is as fine as that turned out by any custom mill. Hundreds of users, who didn't know any more about timber sawing than you do, are proving that every season. The secret is that the Waterous Portable Mill is built just a little better than is necessary to do portable work—it has special fittings found only on higher priced mills, that help you cut your logs as they should be. What is more, the Waterous Portable is dead easy to set up, simple to operate, and is built so strong that it will keep on cutting first-class lumber year after year without trouble.

The profit in your trees, and in your neighbors' is worth your investment in this reasonably priced, high-grade mill. Quality counts every time—and especially in lumber making, with prices as high as they are now.

Send us a card to-day for our Portable Sawmill Catalogue

The Waterous Engine Works Co., Ltd., Brantford, Canada

Shorthorns of Show Ring Quality

We have this year the best lot of young bulls we ever bred from the famous sire, Mildreds Royal, Sr. Calves, Matchless and Emmilines, they are all of show ring Calibre. Look them up at Toronto show.

GEO. GIER & SON, Waldemar P. O. & Station, R. M. D.

FLETCHER'S SHORTHORNS

Young bull for sale, Roan Sailor (=100457=). A choice dark roan, 15 months old. Roan Lady bull from imported dam. Our shorthorn herd, imported or direct from imported stock consisting of Orange Blossoms, Duchess of Glosters, Matchless Clementines, Missies, Mysies, Butterflies, etc., is headed by the choicely bred show bull, Victor Stamford =95959=. Both Victor Stamford and Roan Sailor may be seen at Toronto Exhibition.

GEO. D. FLETCHER R. R. No. 1, ERIN, ONT.
L. D. PHONE ERIN STATION, C.P.R.

The Auld Herd

SHORTHORNS—We are making an exhibit at Toronto and London on their return from the Western Fairs. Breeders should see our cattle as we are offering several young bulls of OUR OWN BREEDING for sale.

A. F. & G. AULD, R. R. No. 2, GUELPH, ONT.

Maple Grange Shorthorns

Pure Scotch and Scotch-topped—Booth. Also five (5) young bulls from ten to twenty months old, of the low down, thick kind, good colors—reds and roans. Prices reasonable.

R. J. DOYLE, Owen Sound, Ontario

Northlynd R. O. P. Shorthorns and Jerseys

For Sale—Our noted sire of big milkers, St. Clair =84578= a Clara-bred son of Waverley. Several of his sons out of R.O.P. dams; also Shorthorns and Jersey females. Official records in our specialty.

G. A. JACKSON, DOWNSVIEW P. O., ONTARIO, WESTON STATION.

Shorthorns

Pure Scotch and Scotch topped—Booth. Also five (5) young bulls from ten to twenty months old, of the low down, thick kind, good colors—reds and roans. Prices reasonable.

G. E. MORDEN & SON, Oakville, Ontario

Meadow Lawn Shorthorns

Five Scotch bulls, 16 months old, from good milking dams. Low-set, thick, deep, well formed, growthy fellows, showing breeding, quality and scale. You are invited to inspect this offering. Bell Telephone.

F. W. EWING, ELORA, R. R. No. 1
G. T. R. and C. P. R.

Willow Bank Stock Farm

Shorthorns and Leicester Sheep. The imported Cruickshank Butterfly Roan Chief =60865= heads the herd. Young stock of both sexes to offer. Also an extra good lot of Leicester sheep of either sex; some from imported sires and dams.

James Douglas, Caledonia, Ont.

Shorthorn Cattle and Lincoln Sheep

Established 50 years our herd was never so strong as now, of strictly high class quality and breeding we have young cows in calf, heifers all ages, high class young bulls, show animals a specialty. Lincoln sheep, ram and ewe lambs of highest quality.

JOHN GARDHOUSE & SONS, Weston, Ontario

SHORTHORNS AND SHROPSHIRE

FOR SALE:—Three young bulls fit for service—One well-bred Duchess of Gloster. Two sired by Sittytown Victor (imported) =50093=, your choice for \$160. 10 shearing ewes, 2 shearing rams, 20 ram lambs and a few ewe lambs. Come and see these before choosing.

WM. D. DYER, R.R. No. 3, Oshawa, Brooklin, G. T. R.; Myrtle, C.P.R.

Shorthorns and Clydesdales

Bulls of serviceable age all sold; have some good ones a year old in September, and am offering females of all ages. Have a choice lot of heifers bred to Clansman =87809=. Also four choice fillies, all from imported stock.

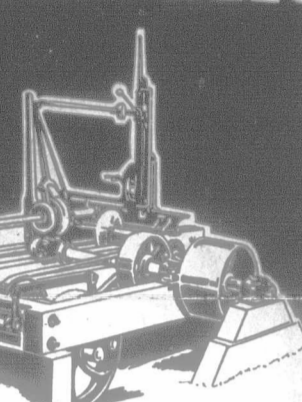
L. D. Phone A. B. & T. W. DOUGLAS, Strathroy, Ontario

IRVINEDALE SHORTHORNS

Bulls and heifers of the very best quality. Sired by Gainford Select (One of the great sons of the celebrated Gainford Marquis).

JOHN WATT & SON, R. R. No. 3, Elora, Ont.

SAW MILLS



on higher priced mills, that help you cut logs as they should be. What is more, Vaters Portable is dead easy to set up, to operate, and is built so strong that it keeps on cutting first-class lumber year year without trouble.

profit in your trees, and in your neighbors' worth your investment in this reasonably d, high-grade mill. Quality counts every and especially in lumber making, with as high as they are now.

le Sawmill Catalogue

Ltd., Brantford, Canada

Ring Quality

we ever bred from the famous sire, and Emmilines, they are all of a up at Toronto show.

O. & Station, R. M. D.

SHORTHORNS

ice dark roan, 15 months old. Roan Lady or direct from imported stock consisting of Pentines, Missies, Mysies, Butterflies, etc., is d =95959 =. Both Victor Stamford and

R. R. No. 1, ERIN, ONT.
STATION, C.P.R.

are making an exhibit at Toronto and London on their return from the could see our cattle as we are offering OUR OWN BREEDING for sale.

R. No. 2, GUELPH, ONT.

Pure Scotch and Scotch-topped Breeding unsur- number of thick, mossy heifers.

en Sound, Ontario

Shorthorns and Jerseys

8 = a Clara-bred son of Waverley. Several females. Official records in our specialty.

WESTON STATION.

ch and Scotch topped—Booth. Also five (6) lls from ten to twenty months old, of the thick kind, good colors—reds and roans. sonable.

Morden & Son, Oakville, Ontario

Five Scotch bulls, 16 months old, from good milking dams. Low-set, thick, deep, well and scale. You are invited to inspect this

G, ELORA, R. R. No. 1

rm Shorthorns and Leicester Sheep. Herd established 1855; flock 1843. Chief = 60865 = heads the herd. Young stock ot of Leicester sheep of either sex; some from

es Douglas, Caledonia, Ont.

Lincoln Sheep

g, of strictly high class quality and breeding ing bulls, show animals a specialty. Lin-

Weston, Ontario

SALE:—Three young bulls fit for service— well-bred Duchess of Gloster. Two sired by on Victor (imported) = 50093; = your choice for 10 shearing ewes, 2 shearing rams, 20 ram and a few ewe lambs. Come and see these choosing.

Bulls of serviceable age all sold; have some good ones a year old in September, and am offering females of all ages. Have so four choice fillies, all from imported stock

T. W. DOUGLAS, Strathroy, Ontario

SHORTHORNS

quality. Sired by Gainford Select (celebrated Gainford Marquis).

SON, R. R. No. 3, Elora, Ont.

Potato Diseases.

Editor "The Farmer's Advocate":
From time to time the Potato Blight, called generally "Late Blight of Potato" (Phytophthora infestans) recurs doing untold destruction to potato crops. It appears in this district in 1910, 1912, and appears again this year. It is a fungous disease which affects leaves, stalks and tubers. On dry seasons it rarely appears at all, and when it does, the attack is so slight that it passes unnoticed. Damp weather is very favorable to the development of this fungus and also to infection. It is called "Late Blight" because it usually occurs late in the season—about the middle of August. If potatoes have been regularly sprayed with Bordeaux there will be little, or no, infection in any season. Spraying is the only sure method of prevention of the trouble. But one difficulty of spraying is that, on wet seasons, when the potato tops are straggling all over the ground, frequent and thorough applications of the spray mixture are necessary, and this is a difficult matter.

However, when the blight does attack the crop seriously enough to be noticed, there is no remedy but to dig the potatoes. This should be done, no matter how green the tops may be, because in about ten days after infection is first noticed on the leaves, the tubers commence to turn black. When the tubers become infected it is too late. To save the crop, dig the potatoes and let them dry thoroughly—in the sun if possible—and then spread them out on the barn floor for three or four weeks. A little air-slaked lime should be sprinkled over the potatoes while on the floor. After this they may be placed in the cellar, but care should be taken to see that any showing signs of infection are culled out. The chief point to remember is that the disease can not infect a dry potato, and therefore, if the tuber is dug before infection, it is reasonably safe from infection.

Potatoes are not of the best quality when dug green, but it is surprising how they improve and how well they keep. If left in the ground until the usual time for digging, ninety per cent. will be rotten. By attending to the crop in time, then, would save the country thousands of dollars.

Another potato trouble which occurred here and there this year is a disease of the roots and stems caused by a fungus, very possibly Fusarium. This has been noticed in New Brunswick quite commonly, and also in Ontario. Wet ground is very favorable to the disease; and plants once affected wither away and are soon dead. Infection is not nearly so general as with the late blight, and the damage, consequently, is slight in comparison.

For this there is no direct remedy. Potatoes should not be planted after potatoes; and heavy land is more likely to harbor the disease than light land. Tubers from an infected field may infect the crop the following year unless the "seed" be treated with a fungicide. In fact it is a wise precaution to treat the "seed" regularly every year.

A disease quite similar to this, from the descriptions published, has been reported from two or three places in Ontario, but the accounts are so vague as to be of very little use. One author gave the very wise statement concerning it, saying it was caused by wet weather.

Durham Co., Ont., J. B. DANDENO.

Senator Hear used to tell with glee of a Southerner just home from New England who said to his friend, "You know those little white round beans?" "Yes," replied the friend, "the kind we feed to our horses?" "The very same. Well, do you know, sir, that in Boston the enlightened citizens take those little white round beans, boil them for three or four hours mix them with molasses and I know not what other ingredients, bake them, and then—what do you suppose they do with the beans?" "They" — "They eat 'em, sir," interrupted the first Southerner impressively; "bless me, sir, they eat 'em!"

I saved \$34.00 on this Roof



Three-Ply 1.85 Freight Paid

I saw an advertisement of The Halliday Company a few weeks ago offering Pure Asphalt Ready Roofing under a plain label 3 ply for only \$1.85 per square, freight paid to my station with nails and lap cement free. The advertisement said this Roofing was as good as regular trademarked Roofing of the same quality at upwards of \$3.00 per roll. This appeared to me a pretty broad statement but as the firm is a reliable one (I did business with them nearly 25 years ago) and as they asked for no money in advance I thought it too good a chance to miss. To my satisfaction I found the Roofing fully as good as advertised.

THESE MEN DID AS I DID, READ WHAT THEY SAY

Mr. R. R. Black, Nova Scotia. "Roofing arrived O. K. and was decidedly better than I expected. Send me ten rolls more of the same."
Mr. J. Herbert Cohoe, Ont. The six Rolls of 3 ply Roofing received and am well pleased with it. Want you to send me 8 more Rolls of the same.
Mr. Andrew Calder, Saskatchewan. The Roofing arrived in good condition and am more than satisfied with the quality.
Mr. Harold Boyce, New Brunswick. My father received a shipment of your Roofing and was pleased to receive such good quality.

HERE IS YOUR OPPORTUNITY---RISK FREE

Where so many have dealt with satisfaction and profit you cannot fail.

You have read the statements of men who accepted our remarkable offer on Roofing. We told them, as we now tell you, that we will ship this Roofing on approval to any R. R. Station where there is an agent. If the Roofing is found to be as represented you pay for it. If not refuse it and tell the agent to write us for instructions.

Hundreds of men all over Canada have accepted our Risk Free Offer. Not one shipment of Roofing has failed to measure up to our statements. On the contrary many customers have written to say how much better the Roofing is than they expected it to be. It is all pure asphalt felt roofing, government standard saturation. Contains no tar or paper and has no sand or gravel added to make weight.

FREE SAMPLE BY MAIL IF YOU WISH—ADDRESS DEPT. 32

RISK FREE COUPON

32

Ship to me in your name and at your risk.....rolls 3 ply pure asphalt roofing, each roll 108 square feet complete with cement, nails and directions for laying. If I find this roofing equal to similar roofings selling at upwards of \$3.00 per roll I will pay for it at your special out price of \$1.85. If not you take it back and I pay nothing.

If no agent at station send cash with order, money back if not satisfactory.
FREIGHT PAID ON SIX ROLLS OR MORE ONTARIO AND EAST.
To Western Canada we pay freight as far as Winnipeg.

My Name..... P. O.....
Station..... Nearest Bank.....

The HALLIDAY COMPANY Limited

HAMILTON Factory Distributors Established 1888 CANADA

Robt. Miller Still Pays The Freight

And in addition he can furnish great, strong thick fleshed Shorthorn bulls at a price that will surprise you. Many of them bred to head good herds and improve them. Many of them of a kind to get good feeders and great milkers, and all of them low down, thick and smooth with good heads and horns, that will grow into big weights and bring more money in the market than you are asked for them now. Some high-class heifers for sale too. Write for what you want.

ROBERT MILLER, STOUFFVILLE, ONTARIO

Escana Farm Shorthorns

For Sale—Herd header, one Red 15 months bull, Grandam Imp. he is a son of the noted sire Right Sort, imp. eleven of his get won 14 prizes at Toronto last fall. Visit our farm, see Right Sort and our this years show herd 12 head all by him.

MITCHELL BROS., BURLINGTON, P.O. ONT.
JOS. McCRUDDEN, Manager Farm 1/4 mile from Burlington Jct.

H. SMITH HAY P.O., ONT.
21 SHORTHORN BULLS and as many heifers for sale. Write your wants.
You know the Harry Smith Standard.

Shorthorns and Clydesdales

We have five young bulls of serviceable age that we will sell at moderate prices. In Clydesdales we have eight imported mares with foals. We can spare some of these, and will sell them worth the money, or would consider some good Shorthorn females in exchange. We also have a two-year-old stallion and a pair of good yearling fillies.

Station: Burlington Jct., C.T.R.
J. A. & H. M. PETTIT (formerly W. G. Pettit & Sons), FREEMAN, ONT. Phone Burlington.

GLENGOW SHORTHORNS

For this season's trade we have the best lot of young bulls we ever bred. Wedding Gifts, Strathallans, Crimson Flowers and Kiblean Beauties, sired by Broadhooks Prime. These are a thick, mellow, well-bred lot. Heifers from calves up.

WM. SMITH & SON, COLUMBUS, ONTARIO

The Salem Shorthorns

One of the largest collections of Scotch Shorthorns in America. Can suit you in either sex, at prices you can afford to pay.

J. A. WATT, ELORA, ONTARIO

Blairgowrie Shorthorns

Having bought out two Shorthorn herds puts me in a position to have cattle suitable in breeding and ages for all who want to buy. Cows, heifers and bulls all fashionable bred.

John Miller, Ashburn, Ont. C. P. R. and G. T. R.

Shorthorns

RICH IN BREEDING, HIGH IN QUALITY.
My herd of Scotch and Scotch-topped Shorthorns was never stronger in number nor in quality than now. I have the most fashionable blood of the breed in pure Scotch, as well as the greatest milking blood strains. Visit the herd. Also some right choice Yorkshires, both sexes. A. J. Howden, Myrtle, C.P.R.; Brooklin, G.T.R.; Columbus, R.M.D.

Having bought the SPRUCEDALE STOCK FARM, ST. THOMAS, ONT., my whole herd of **60 PURE-BRED DAIRY SHORTHORNS** will be found at their new home "SPRUCEDALE STOCK FARM," instead of Janefeld Farm, Guelph, as formerly. Visitors will always be welcome as heretofore.

WM. J. BEATY, St. Thomas, Ont.

Ourvilla Holstein Herd

The first herd in Canada to develop a 31-lb. cow. The only herd in Canada to develop 27 two-year-olds averaging 16.20 lbs of butter in 7 days. We have also developed 7 three-year-olds averaging 23.23 lbs. in 7 days. If you want a bull backed by Ourvilla reputation and records, sired by a 31.76 lb. bull, write us

LAIDLAW BROS., AYLMEY, ONTARIO

ONTARIO VETERINARY COLLEGE

Under the Control of the Department of Agriculture of Ontario
Established 1882.

AFFILIATED WITH THE UNIVERSITY OF TORONTO.

College will reopen on Friday, the 1st of October, 1915; 110 University Avenue, Toronto, Canada.
Calendar "A" on Application.
E. A. A. GRANGE, V.S., M.S., Principal.

SHORTHORNS

Present offering—20 cows and heifers and a few extra choice young bulls; they are bred so that they will produce money makers in the dairy and steers that will be market toppers and the prices are so low it will pay you to buy. Come and see them.

Stewart M. Graham - Lindsay, Ont.

Oakland—61 Shorthorns

For Sale—Our stock bull Scotch Grey 72892; one of the finest aged Roan bulls in Ontario, also 11 others from 6 months to 2 years old and a dozen females of the profitable kind.

Jno. Elder & Sons, Hensall, Ontario

SHORTHORNS

Three bulls, 11 months, a number of young cows with their calves, cows in calf and yearling heifers for sale. Good individuals. Good Pedigrees. Inspection solicited.

J. T. GIBSON, DENFIELD, ONT.

Shorthorns and Swine

Have some choice young bulls for sale; also cows and heifers of show material, some with calves at foot. Also choice Yorkshire sows.

ANDREW GROFF, R.R. No. 1, ELORA, ONT.

SHORTHORNS, bulls, females, reds, roans, size, quality, breeding milkers over 40 years, cows milking 50 lbs. a day. The English, Rothchild's bull Mortimere in herd, the kind you want. Prices easy. Thomas Graham, R.R. 3, Port Perry, Ont

Please mention "The Farmer's Advocate."



Mixing concrete with this 1915 Model Hand Mixer saves you time, labor and money. You get a better mix with less cement. Write for catalogues.

WETTLAUFER BROS.
Improved Concrete Machinery
178A Spadina Avenue TORONTO, ONT.



Ring-Bone
There is no case so old or bad that we will not guarantee
Fleming's Spavin and Ringbone Paste
to remove the lameness and make the horse go sound. Money refunded if it ever fails. Easy to use and one to three 5-minute applications cure. Works just as well on sidebone and Bone Spavin. Before ordering or buying any kind of a remedy for any kind of a blemish, write for a free copy of
Fleming's Vest Pocket Veterinary Adviser
Ninety-six pages of veterinary information, with special attention to the treatment of blemishes. Durable, bound, indexed and illustrated. Make a right beginning by sending for this book.
FLEMING BROS., Chemists
75 Church St. Toronto, Ont.



WHEN USING WILSON'S FLY PADS
READ DIRECTIONS CAREFULLY AND FOLLOW THEM EXACTLY
PATENTS TRADE MARKS and DESIGNS
PROCURED IN ALL COUNTRIES
Special attention given to Patent Litigation
Pamphlet sent free on application.
Ridout & Maybee
CROWN LIFE BUILDING, TORONTO, ONT.

Maple Grove Holsteins
If you are in need of a bull to improve your dairy herd, and want one that you can feel proud of, then get a son of the great King Lyons Hengerveld.—You can buy him right.
H. Bollert, R.R. No. 1, Tavistock

HOLSTEINS
One yearling bull by King Segis Pontiac Duplicate, whose dam is a g. daughter of King Segis; 18 bulls under a year old, one from a 29-lb. cow and sired by a son of Pontiac Korn-dyke. Females any age.
R. M. HOLTBY, R. R. 4, Port Perry, Ont.

Pioneer Farm Holsteins—Bulls nearly ready for service from daughters of Prince Aaggie Mechthilde whose first junior two year old daughters averaged 14600 lbs. milk, 656 lbs. butter in R. O. P., and five juniors now in R.O.P. test have averaged 10893 lbs., have nearly four months to complete records and still giving from 40 to 50 lbs. each daily. For prices write
WALBURN RIVERS, R.R. No. 5, Ingersoll, Ont.

RIDGEDALE HOLSTEINS For Sale. One bull calf ready for service, and 3 young bulls, one of them sired by King Segis Pontiac Duplicate; also 2 young cows. Prices low for quick sale. **R. W. Walker & Sons, R. R. No. 4, Port Perry, Ont.** Manchester, G. E. R., Myrtle, C. P. R. Bull Phone
Please mention "The Farmer's Advocate."

Business Methods in Horse Breeding.

Business men have many customs in their ways of doing things in order to increase their trade, and it is a very good plan for farmers to keep their eyes open when they have an opportunity to come in touch with the most up-to-date and prosperous firms.
A short time ago the telegraph companies were running their offices all night and doing very little business, yet they had practically the same expense at night as during the day. One of the large companies saw an opening for more business, and by a reduced rate, or, rather, giving more for the same money, induced people to send short letters by telegraph at night, allowing them fifty words for the same price as they had formerly asked for ten. The result was an enormous increase in the business after business hours.

Another business practice that is followed very extensively, and which, when properly worked, is very profitable, but requires skill and training or poor results are likely to follow, I refer to the circular letter. Probably the most effective work along this line has been done by the book publishers. Some of their letters are simply wonderful in their persuasive power. They have, of course, regular methods in the hands of trained men for writing these letters, and they are not of hap-hazard construction or form, but well worded and well-built-up in appearance, color of paper and style of letter-head. Everything must be the best, for every letter they send out is going to cost about five to seven cents, and it does not take long to run away with a few dollars, and if they get no results it is an expensive venture. The only way to guard against failure is to make the letter say what it should. Training and thought will do that; then send it where it will be read.

I was pleased the other day to see these two ideas being worked into a rancher's business. He has a very valuable Hackney sire, and his spring term is just over. He, in anticipation of the fall, tried to work up a fall term for the horse and had some letters printed at the local printers, and is mailing one to every mare owner in the place. It is a very fair letter, and should get him results. He deserves to win out, and he will.

Here are some of the points in his letter: He makes the statement that a fall colt can be raised more cheaply and will have the best chance. Then he backs up his statement by adding: "Your mare will have light work, probably no work before and after foaling-time. Spring colts come, and you must let your mare off, and that's no time to have to let her off, either."

"A spring colt must be weaned on to dry feed, but the fall colt goes on grass and gets a full six months of pasture, and never stops growing."

"A fall colt gets handled; you have time to handle it. It is trained, and you don't need to break it."

Then he has another farmer's experience who claimed that mares he never could get to catch would conceive at a fall service.

At the end of his letter he has a comment on his Hackney, claiming that it is heavy enough for the work of the fruit-growers, has style enough for the most stylish, and fast enough for any man. He put his fees down \$5 below the usual spring rates to make it more attractive.

It shows that there are more business methods finding their way into farming, and the more we use the surer we will be of our results.

B. C. WALTER M. WRIGHT.

According to Architect and Engineer the highest street in the world is Main Street, Denver; the richest is Fifth Avenue, New York; the widest is Market Street, Philadelphia; the shortest is the Rue Ble, Paris; the dirtiest is Tehanki, Nankin; the cleanest is the Via Castille, Seville; the most aristocratic is Grosvenor Place, London; the most beautiful is the Avenue des Champs Elysses, Paris; and the narrowest is Via Sol, Havana, which has a width of no more than forty-two inches.

DISPERSION SALE
PUREBRED HOLSTEINS
Wednesday, September 15th, 1915
GLENESCOTT FARM
Cows with fine official butter and milk records. Heifers and young bulls of the highest official backing. A rare opportunity for anyone wishing to improve their herd to secure an animal cheap. (The buyer names the price.)
Richmond street car runs to the farm.
Sale commences 1.30 p.m., rain or shine.
WRITE FOR CATALOGUE:
T. B. ESCOTT - LONDON, ONT.

Holsteins by Auction
100-lbs.-a-day-bred. No better bred alive.
G. A. KINGSTON, OF CAMPBELLFORD, ONT., to whom applications must be made for catalogues, has sold his farm, and at the farm, five miles from Stirling Station, on the Belleville-Peterborough line of the G. T. R., will, on
Tuesday, September 21st, 1915
sell by auction his entire herd of 23 Holsteins, 17 females, none over 3 years of age, and 6 young bulls. Without doubt, this is one of the best bred lots of Holsteins in Canada. Daughters, granddaughters, sisters, etc., to May Echo Keyes, May Echo Sylvia, Lula Keyes, etc. They are full of the blood that has produced from 100 to 131 lbs. of milk a day. For full particulars write for catalogue. Conveyances will meet morning trains at Stirling Sta., and the noon train at Ivanhoe, C. P. R., and West Huntingdon Sta. on the Madoc branch line.
TERMS—Six months on bankable paper with 6%. Send for catalogue to:
NORMAN MONTGOMERY Brighton, Auctioneer G. A. Kingston, Prop., Campbellford, Ont.

HOLSTEIN CATTLE
Purebred cows, heifers and heifer calves.
66 Head Must Be Sold
Having disposed of my two stock farms. Come and make your selection. Price and terms to suit. Cattle will be in good working shape, not forced or fitted for sale purposes.
HAMILTON FARMS, Southend P.O. Ontario
Telegraph and 'phone Niagara Falls.
Farms 10 minutes trolley from Niagara Falls.

King Segis Walker whose dam, granddam and great granddam have records over 30 lbs., the greatest producing and transmitting family of the breed. I have for sale some of his Sons combining the blood of Pont. Korndyke, King Segis and King Walker, the greatest trio of bulls obtainable. King Segis Walker's oldest daughter with her first calf has just completed a record of 24 lbs. butter in 7 days.
Send for Pedigree and Photo.
A. A. FAREWELL, OSHAWA, ONTARIO

Holstein Cattle
Canary Mercedes Pietertje Hartog 7th heads our herd. His dam gave 116 lbs. milk in one day and 6197 in sixty days and made 34.60 lbs. butter in 7 days. There are more cows in our herd giving over one hundred lbs. of milk a day than any other in Ontario. We have both bulls and heifers for sale.
D. C. FLATT & SON, R. R. No. 2, HAMILTON, ONTARIO
Long-distance Telephone

LAKEVIEW STOCK FARM, Bronte, Ont. Breeders of high class Holstein-Friesian cattle, offers for sale: A choice young bull, born May 27, 1915, out of a 25-lb. three-year-old dam, and sired by Dutchland Colantha Sir Mona, herd sire No. 2, who is a full brother to the world's champion two-year-old milk cow. **E. F. OSLER, Prop. T. A. DAWSON, Manager**

HOLSTEINS Do you want a young herd header backed up by generations of record-makers, g. sons of an ex-world champion? If so, write me. Am
now booking orders for Hampshire and Chester White Swine.
C. E. KETTLE, Wilsonville P.O., Ontario
Long-distance telephone from Waterford

SALE
HOLSTEINS
ber 15th, 1915
T FARM
milk records. Heifers and
acking. A rare opportunity
herd to secure an animal
(e.)
e farm.
or shine.
ATALOGUE:
LONDON, ONT.

Auction
better bred alive.
RD, ONT., to whom applica-
s sold his farm, and at the
ation, on the Belleville-
G. T. R., will, on
er 21st, 1915
ins, 17 females, none over 3 years
t, this is one of the best bred lots
ddaughters, sisters, etc., to May
, etc. They are full of the blood
milk a day. For full particulars
nd morning trains at Stirling Sta.,
nd West Huntingdon Sta. on the
with 6%. Send for catalogue to:
on, Prop., Campbellford, Ont.

CATTLE
bred cows, heifers and heifer calves.
66 Head Must Be Sold
ng disposed of my two stock farms-
e and make your selection. Price
erms to suit. Cattle will be in good
ing shape, not forced or fitted for
urposes.
MILTON FARMS, Southern P.O.
Ontario
egraph and 'phone Niagara Falls.
10 minutes trolley from Niagara Falls.
randdam and great granddam have
0 lbs., the greatest producing and
r Sale some of his Sons combining
King Walker, the greatest trio of
laughter with her first calf has just
nd Photo.
OSHAWA, ONTARIO

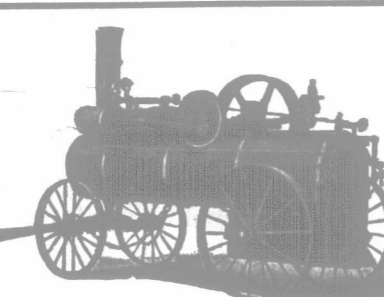
Cattle
ur herd. His dam gave 116 lbs. milk
34.60 lbs. butter in 7 days. There
undred lbs. of milk a day than any
ers for sale.
2, HAMILTON, ONTARIO
phone
bronte, Ont., Breeders of high-
class Holstein
rn May 27, 1915, out of a 25-lb. three-year-
old sire No. 2, who is a full brother to the
SILER, Prop. T. A. DAWSON,
Manager
o you want a young herd backed up
generations of record-makers, g. sons of an
ter White Swine? If so, write me. Am
ville P.O., Ontario
ne from Waterford

THE Western Fair

London, Sept. 10 to 18

The Live Stock Prize List this year is the best ever offered. Parade of prizewinners before the Grand Stand daily. Increased prize list in Dairy, Agriculture and Horticulture Departments. Buttermaking competition daily. Excellent programme twice daily. A change of fireworks programme each night. Machine guns, shells, etc., on exhibition.

All Soldiers Admitted to the Grounds Free.
Entries close Sept. 9th
Dog entries close Sept. 7th
Prize Lists and all information from the Secretary.
Single fare over all railroads west of Toronto.
W. J. REID President
A. M. HUNT Secretary



Rebuilt Portable and Traction Engines and Threshers
All sizes, for sale cheap. Complete threshing outfit, traction engine with cab, separator, wind stacker, \$875 in good operative conditions
The Robt. Bell Engine & Thresher Company, Limited
SEAFORTH, ONTARIO

Ask your dealer for "LACTOLIN" and increase your milk production by 30 per cent. 50 cents per five pounds box, or write for it to The National Stock Food Co. Ltd. OTTAWA, ONT.

BLACK FOX RANCHING
And General Fur Farming
The most profitable and interesting of all industries. Equally attractive to the small investor and the capitalist. Offering the safest and sanest of investments, either as a small privately-owned ranch or as a stock company. Write for free information and book on Fox Ranching. Correspondence solicited.
Blake Vannatter, Fur Farm, Georgetown, Ont.

"Sepoy Special" Wheelbarrows
FARM and GARDEN Varieties
The best that can be produced. If your local dealer does not handle them write us and we'll quote you an interesting price. Ask us about our
FARM and SLOOP Sleighs
Satisfaction guaranteed. Agents wanted everywhere
THE SEPOY MFG. CO., LUCKNOW, ONT.
INGLEWOOD AYRSHIRES AND CHESTER WHITE SWINE.—We are now offering boars four months old and pigs six weeks. Pairs or trios. Young sows of breeding age. Also a few bull calves. WILSON McPHERSON & SONS, St. Ann's, Ont.
For Sale: Southdowns and Oxfords
Both sexes; all ages.
S. LEMON, POPLAR LODGE, KETTLEBY, ONTARIO

British Live Stock Breeding Schemes.

Editor "The Farmer's Advocate":
The British Government is thoroughly determined that now is the time when live-stock breeding, by farmers, large and small, shall be carried on to the fullest extent. They are out with a number of schemes that are helpful in attaining this object, and, believing that their ideas may be helpful to you in Canada, I send you a summary of what they are doing. In order to impress upon farmers the advantages of co-operation in securing the services of good sires, grants in respect to stallions and boars will be made only to clubs and societies. The same procedure will also be followed wherever possible in the case of bulls, but in the districts where bull societies cannot be formed, grants will be made to individual breeders who are willing to place approved bulls at the disposal of their neighbors. Preference will be given in the assistance offered, to occupiers of holdings which either do not exceed 100 acres in extent, or, if exceeding 100 acres, are of an annual value for purposes of income tax not exceeding £100.

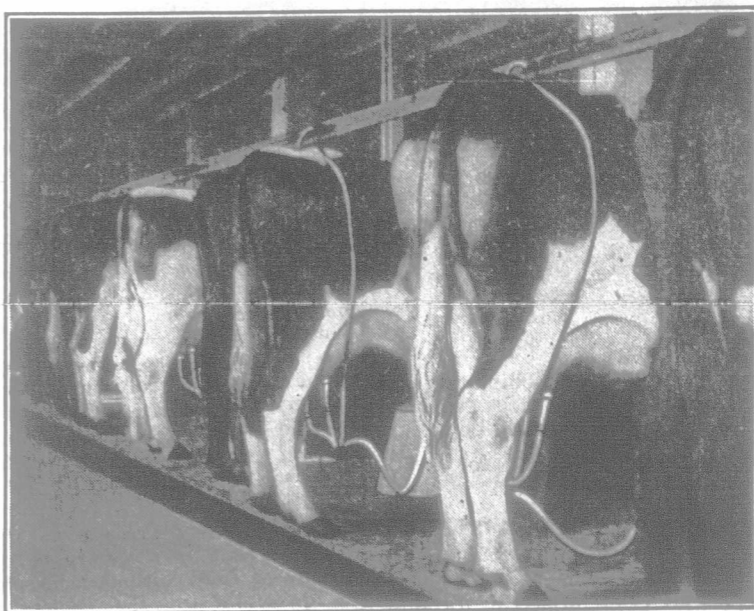
BULLS.
Grants for the provision of bulls will be made on the following conditions: (1) No grant exceeding £12 per annum is to be made to any individual bull owner, or exceeding £15 per annum to any society in respect of any one bull. (2) Not more than four annual grants of £12 are to be made to any individual; and not more than five annual grants of £15 to any society for each approved bull provided by it. (3) Grants are only to be made to individuals when the live-stock officer for that area is satisfied, after full inquiry, that it is not possible to form a bull club for a district in which the provision of a good bull is necessary. (4) No grant is to be made to any individual in respect of a bull previously owned by him unless the live-stock officer for the district is satisfied that in return for the grant the bull can and will be made available for an appreciably greater number of cows belonging to small farmers than it now serves.

A society may provide a bull for the use of its members—(a) By purchasing a bull and placing it in the custody of one of its members; or (b) By arranging with an owner of a bull—whether he be a member of the society or not to place a bull at the disposal of the society on terms agreed between them.

If a society arrange to purchase a bull, it will be necessary to provide by means of contributions from members or donations to the society, sufficient capital to defray the cost of the purchase of the bull, and also an annual income sufficient to cover the insurance and keep of the bull, the salary of the secretary of the society, the general expenses of the management, and sinking-fund charges in respect of the depreciation of the bull sufficient to provide for the replacement of the bull when necessary. If a society arrange with an owner of a bull to place a bull at their disposal, they must guarantee the service of not less than twenty-five cows belonging to their members. The owner of a bull will be entitled under these circumstances (1) to payment from the society of a sum not exceeding £12 as may be agreed upon; (2) to a fee of not less than 2s. 6d. for each cow served, and (3) to have not more than fifteen of his own cows served by the bull: If a society arrange for the provision of a bull in this manner, the grant of £15 made to them by the Government, together with a nominal subscription of, say, 1s. per member, would probably suffice to defray all expenses, as the owner of the bull and not the society will be responsible for the keep, insurance, and care, etc., of the animal.

HEAVY HORSE SOCIETIES.
Grants will be made on the following conditions to heavy horse stallion societies which hire stallions: (1) No grants will be given to societies which hire stallions to travel at a fee exceeding £3 3s. (2) In no case will the grant to a society exceed £80 for each approved stallion provided by it, of which not more than £40 may be a direct grant, the remainder being used, if necessary,

HINMAN The Universal Milker



On the L. McLeod Dairy Farm, Thamesford, Ontario
MADE IN CANADA
Intending Purchasers of Mechanical Milkers and Others:
It will be of INTEREST for you to know that the HINMAN UNIVERSAL MILKER WAS AWARDED THE GOLD MEDAL AT THE PANAMA PACIFIC EXPOSITION over ALL OTHER makes of Milking Machines, foreign and domestic. FOR: EFFICIENCY, DURABILITY, SIMPLICITY and ECONOMY
See the HINMAN in the Model Barn at Toronto Exhibition.
Price \$50 per unit
H. F. BAILEY & SON, SOLE MANUFACTURERS FOR CANADA
GALT, ONTARIO, CANADA
DEPT. H

Brampton Jerseys
We are busy. Sales were never more abundant. Our cows on yearly test never did better. We have some bulls for sale from Record of Performance cows. These bulls are fit for any show ring.
B. H. BULL & SON, BRAMPTON, ONTARIO

Don Jerseys
Special Offering—A few choice yearling bulls fit for service also heifer calves six months old sired by Eminent Royal Fern. Write for what you want.
D. Duncan & Son, Todmorden, R. R. No. 1, Duncan Sta., C.N.O.

Humeshaugh Ayrshires
We have several February, March and April, 1915, bull calves, bred from some of our best imported and home-bred females, which we offer at good value for quick sale.
Alex. Hume, & Co., Campbellford, Ont., R. No. 3

Glenhurst Ayrshires
For 50 years I have been breeding the great Flos tribe of Ayrshires, dozens of them have been 60-lb. cows; I have lots of them get 60 lbs. a day on twice-a-day milking. Young bulls 1 to 10 months of age, females all ages. If this kind of production appeals to you write me.
James Benning, Williamstown, Ont.

Stonehouse Ayrshires
Are a combination of show-yard and utility type seldom seen in any one herd. A few choice young males and females for sale. Write or 'phone your wants to Stonehouse before purchasing elsewhere.
Hector Gordon, Howick, Que.

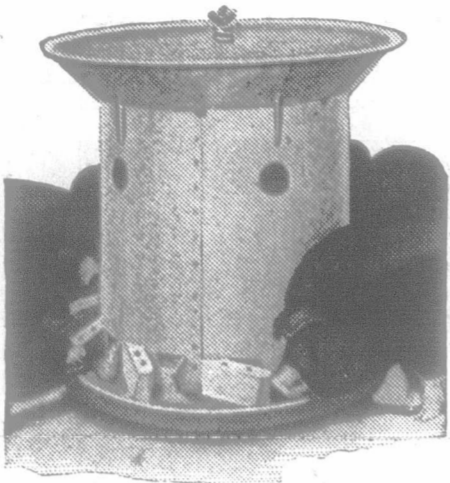
HILLHOUSE AYRSHIRES
Show-ring winners. Dairy test winners. 75 head to select from. Bull calves and females of all ages for sale. Before buying, come and inspect our herd and get prices.
F. H. Harris, Mt. Elgin, Ontario.

Gladden Hill Ayrshires
Present herd bull, Tam O' Menie = 35101 =, for sale. Also young bulls. See our exhibit at Toronto Fair.
LAURIE BROS., MALVERN, ONTARIO

ALLOWAY LODGE STOCK FARM
Angus, Southdowns, Collies
Special this month: **Yorkshires**
ROBT. McEWEN, Byron, Ont.

Forster Farm Dorsets
Sheep breeding was never so bright as now. Our large flock of Dorsets are this year stronger than ever in numbers and in quality. For sale are shearing rams and ram lambs, shearing ewes and ewe lambs, strictly high-class.
Forster Farm, - Oakville, Ont.

Oxford Downs—We are in a particularly favorable position this year to supply Oxford Down breeders with a right choice Ram Lamb, also Ewe Lambs and Shearlings. WM. BARNET & SONS, R. R. No. 3, Fergus, Ont.
150 Pure Shropshires For Sale—50 ram and ewe lambs, descendants from imported stock, sired by a Campbell ram, price from ten to twelve dollars each including pedigrees. Also twelve yearling rams, young and old ewes and pure bred Jerseys all ages, male or female all at moderate prices. H. E. Williams, Sunnyside Farm Knowlton, P.Q.



If you could purchase a machine to grind the grain and feed your hogs, with no trouble to yourself, you would be willing to pay **\$42.50** for it.

THE HOG MOTOR

has, the past six years, done this for hundreds of farmers, and not one has been troubled with crippled pigs. The Motor will do the same for your hogs. For full information address:

The Canadian Hog Motor Co., Ltd.
LISTOWEL, ONT.

IMPROVED Yorkshires

FOR SALE—Young sows just being bred, also a few choice pigs, both sexes, 12 weeks old (only a few left). All will be registered.

WELD WOOD FARM
FARMER'S ADVOCATE
London, Ontario

HIGHEST PRICES PAID FOR
HIDES, WOOL, &c.
JOHN HALLAM, LIMITED
TORONTO

SUNNYSIDE STOCK FARM
Champion herd at
Chester White Swine Toronto and London Fairs; also Dorset Horn Sheep, young stock of both sexes for sale.
W. E. Wright & Son, Glanworth, Ontario

CLEARVIEW CHESTER WHITES
For many years my herd has won the highest honors at Toronto, London, Ottawa and Guelph. For sale are both sexes of any desired age, bred from winners and champions.
D. DeCoursey, R. R. No. 5, Mitchell, Ont.

Tamworths Buy your hogs now, as they will be very scarce this fall. I have a nice lot of boars and sows four to five months old; prices reasonable.
Herbert German, St. George, Ontario

Poland-China Swine Duroc Jerseys Berkshires and Chester Whites, also Dorset Horn sheep. Young stock of both sexes. Come and see, write or phone.
CECIL STOBBS, Leamington, Ontario
Phone 284.

Tamworths Young sows bred for fall farrow and some choice young boars. Registered.
Before buying write for prices
JOHN W. TODD, R. R. No. 1, Corinth, Ont.

Morrison TAMWORTHS & SHORTHORNS Bred from the prize winning herds of England. Boars and sows all ages 150 head to choose from. Choice Shorthorns both sexes, good milking strain, one Clydesdale colt two-year-old bred from imp. stock.
CHAS. CURRIE, Morrison, Ontario

Elmfield Yorkshires Four young sows about ready to breed, one boar farrowed in March, some young sows farrowed in April and May, and expect lots of young pigs for Sept. from good breeding stock on side of both dam and sire. G. B. Muma, R. R. No. 3, Ayr, Ont. Phone Ayr R.R. 55 ring 2. G.T.R. P.O. or Drumbo; C.P.R. Ayr.

IMPROVED YORKSHIRES—Overstocked. We offer one champion silver sweepstake sow coming two years old guaranteed in pig, one year-old boar extra type, and any number of young pigs to be sold we need three weeks hence and later.
POMONA FARM, COBOURG, ONT.

ELMDALE CHESTER WHITES
Having purchased some AI breeding stock, write for my advertisement in a short time.
John Pollard, R. 4, Norwich, Ontario

for "assisted nominations." (3) Except in the case of "assisted nominations," no reduction in the amount of the service fee usually charged is to be made by the societies receiving grants. (4) The stallions hired by societies receiving grants must be registered with the Government through its Board of Agriculture; and the mares for which assisted nominations are given must be approved by the society as suitable for the purpose. The value of an assisted nomination is not to exceed half the amount of the service fee.

BOARS.

Grants will be made to societies only. The amount of the grant for a boar will be £3 per annum. A society may provide a boar for the use of its members: (a) By purchasing a boar and placing it in the custody of one of its members; or (b) by arranging with an owner of a boar—whether he be a member of the society or not—to place the boar at the disposal of the society on terms agreed between them.

If a society arrange to purchase a boar, it will be necessary to provide, by means of contributions from members, or a donation to the society, sufficient capital to defray the cost of the purchase of the boar, and also an annual income sufficient to cover the insurance and keep of the boar, the salary of the secretary of the society, the general expenses of management, and sinking-fund charges in respect of the depreciation of the boar sufficient to provide for the replacement of the boar when necessary. If a society arrange with an owner of a boar to place a boar at their disposal, they must guarantee the service of not less than twenty sows belonging to their members. The owner of a boar will be entitled, under these circumstances, (1) to a payment from the society of a sum not exceeding £3 per annum, as may be agreed upon; (2) to a fee of not less than one shilling for each sow served; and (3) to have not more than six of his own sows served by the boar. If a society arrange for the provision of a boar in this manner, the grant made to them by the Government, together with a nominal subscription of, say, 6d. per member, would probably suffice to defray all expenses, as the owner of the boar and not the society will be responsible for the keep, insurance, and care, etc., of the animal.

MILK-RECORDING SOCIETIES.

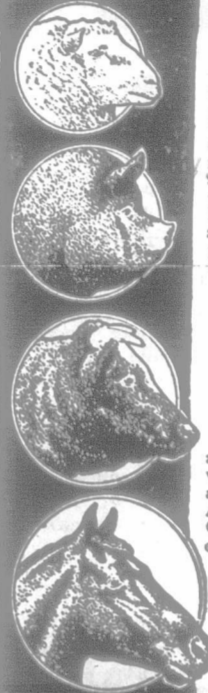
Grants will be made annually to societies whose members record the milk yield of their dairy cows not less frequently than once a week, and who employ a recorder to pay surprise visits to check, at least once every six weeks, the records taken. The amount of the grant will be half the expenses of the society up to £30 in respect of each whole-time recorder employed for every twenty herds in the possession of members of a society.

Gossip.

BLAIRGOWRIE SHORTHORNS.

1915 is surely expansion year in the noted Blairgowrie herd of John Miller, Jr., of Ashburn, Ont., for just now roaming in luxurious pasturage is an exceptionally choice lot of two-year-old heifers whose remarkable thickness and balance of flesh is up to a standard seldom seen. Coupled with this is gilt-edged breeding, the vast majority of them have imported dams or grandams, and nearly all are sired by that noted Cruickshank Butterfly bull, Imp. Bandsman, and are safe in calf to the great sires, Imp. Right Sort and Imp. Raphael, two Toronto prizewinners, and two of the best individuals and breeding bulls in Canada. On blood lines, these heifers represent the Village Girls, Orange Blossoms, Roan Ladies, Lady Anns, Jills, Cranberrys, Minas, Lovelays, Cecilians, Meadowflowers, Rosemarys, and Joyces. One of them whose breeding is particularly choice, is out of Imp. Joyce, and is sired by the great Uppermill Omega (imp.). Parties looking for high-class Shorthorn females should visit this herd. Mr. Miller has also on hand a large and choice flock of Shropshires that in general excellence are up to the usual high standard maintained in the Blairgowrie flock.

ANIMAL DIP AND INSECTICIDE FOR LIVE STOCK AND POULTRY Make Live Stock Pay Better



Only healthy live stock pays. Beef, pork and mutton lose weight and quality and may even be a total loss if disease gets among them. Kill all disease germs by using Zenoleum as a disinfectant and germicide around the pens, stalls, barns and poultry houses. Write us for copies of letters from the greatest breeders and live stock authorities on this continent. Zenoleum kills lice, mites, maggots, sheep ticks; cures mange, scab, sores and removes stomach and intestinal worms and as a preventative is worth fifty times its price. Safe and sure; will not burn or poison. For live stock protection keep Zenoleum handy.

ZENOLEUM

MADE IN CANADA

There has been no trace of disease at, or following, the Canadian Live Stock Shows at Guelph, Ottawa and Toronto, where the management used Zenoleum exclusively. Used and recommended by Canadian and United States Agricultural Colleges. It is wise to their methods. OUR GUARANTEE: If Zenoleum is not what you think it ought to be, your money back. Home-made mixtures are more expensive, dangerous and seldom really effective. Stick to the tested standard—Zenoleum. Ask your dealer, or send us \$1.50 for enough for 80 gallons, carriage prepaid. We ship from a pint to a barrel. Write for 64-page book, "Veterinary Advertiser." Free if you mention this paper.
ZENNER DISINFECTANT CO.
332 Sandwich St. E., Windsor, Ont.

Tower Farm Oxford Down Sheep



We are offering a choice lot of ram and ewe lambs, a few shearlings and two shear rams, and a choice lot of shearling ewes, some fit for show purposes, sired by a ram bred by James T. Hobbs, Maisey Hampton, Fairford, England, a winner at the Royal. See our Exhibit at Toronto National and other leading exhibitions.
L.D.-Phone

E. BARBOUR, Hillsburg, Ont., R.R. No. 2. Erin and Hillsburg Stations



Farnham Farm Oxford and Hampshire Downs

Flock Established in 1881 from the best flocks in England

We are offering a splendid lot of yearling rams and ram lambs for flock headers or show purposes. We ourselves have retired from the show ring so hold nothing back. We are also offering a few superior Hampshire yearlings and ram lambs. All registered, prices reasonable.
HENRY ARKELL & SON, Route 2, GUELPH, ONT.
Guelph, G.T.R.; Arkell, C.P.R. Telegraph Guelph, Long-distance phone in house.

Maple Shade Shropshires

A few shearling rams and ram lambs are for sale. They are the right kind and out of imported ewes and sired by an imported "Buttar" ram. You may order any time now for delivery later.

WILL A. DRYDEN, :: **Brooklin, Ontario**

Shropshires and Cotswolds for Sale—Yearling rams and yearling ewes, a few imported 3-shear ewes, an extra good lot of ram lambs from imported ewes. I expect an importation of rams of both breeds from England 1st of August. Prices very reasonable.
JOHN MILLER, Clarendon, Ont.
Clarendon, C.P.R., 3 miles. Pickering, G.T.R., 7 miles. Greenbarn, C.N.R., 4 miles.

SHROPSHIRES AND SHORTHORNS

Our Shropshire lambs this year by a Butter ram are an extra lot, well covered and well balanced. They are for sale, both sexes, also milking bred Shorthorns, young bulls, cows and heifers.
P. CHRISTIE & SON, Manchester, Station and P.O.

Spruce Lodge Stock Farm—Shorthorns and Leicesters Sheep
Have always on hand a few choice heifers and bulls from good milking families. In Leicesters we have the best lot we ever offered in shearlings and ram lambs and ewe and ewe lambs, all got by choice imported rams.
W. A. DOUGLAS, R. R. No. 2, Caledonia.

DUROC JERSEY SWINE, JERSEY CATTLE

In Duroc Jerseys we have either sex of any desired age, bred from winners and champions for generations back. In Jerseys we have young cows in calf and young bulls, high in quality and high in producing blood.
MAC. CAMPBELL & SONS, NORTHWOOD, ONT.

Poland-Chinas—Buy the right kind of Poland-China Swine from Canada's champion herd. High-class stock, any age, imported and Canadian bred, including many noted winners and their produce, 100 head. Also choice young stock in Chester whites and Shorthorns, heifers and calves of right quality. Good thrifty condition. Moderate Prices. See my wine exhibit at Toronto and London shows.
GEO. G. GOULD, Essex, Ont. Route 4.

ELMHURST LARGE ENGLISH BERKSHIRES
From our recent importation of sows, together with the stock boar, Suddon Torredor, we can supply select breeding stock, all ages. Satisfaction and safe delivery guaranteed.
H. M. VANDERLIP Breeder and Importer, CAINSVILLE ONTARIO
Langford Station on Brantford & Hamilton Radial.

Sunnybrook Yorkshires and Shropshires

Your opportunity to secure stock bred from our CHAMPION hog which is winner of twelve firsts and five CHAMPIONSHIPS in the last four years and has never been beaten. Are offering choice rams of the best breeding. Stock guaranteed as represented. **Wm. Manning & Sons, Woodville, Ont.**

Newcastle Tamworths and Shorthorns Boars ready for service. Sows due to farrow in August and September. oars bred and ready to breed and a lot of both sexes ready to wean. Descendants of Imp. and championship stock. Several extra choice young bulls and heifer calves, recently dropped; grand milking strain, 2 bulls 5 and 8 months old. All at reasonable prices.
A. A. COLWILL, NEWCASTLE, ONTARIO
Long-Distance Telephone

INSECTICIDE FOR PIGS AND POULTRY Give Stock Any Better

Disease gets among them. Kill all disease germs with Zenoleum. Write us for copies of letters from the authorities on this continent. Zenoleum kills ticks; cures mange, scab, sores and removes dandruff as a preventative is worth fifty times its cost in time or poison. For live stock protection

ZENOLEUM

IN CANADA

Use at, or following, the Canoe, Guelph, Ottawa and Toronto, Zenoleum exclusively. Used in Canada and United States. Write us for copies of letters from the authorities on this continent. Zenoleum kills ticks; cures mange, scab, sores and removes dandruff as a preventative is worth fifty times its cost in time or poison. For live stock protection

WINDSOR, ONT.

Down Sheep

We are offering a choice lot of ram and ewe lambs, a few shearlings and a few shear rams, and a choice lot of shearling ewes, some fit for show purposes, sired by a ram bred by Messrs T. Hobbs, Maisey Hampstead, Fairford, England, a winner of the Royal. See our Exhibit at Toronto National and other leading exhibitions. L.D.-Phone

R. No. 2. Erin and Hillsburg Stations

ford and Hampshire Downs

1881 from the best flocks in England. Yearling rams and ram lambs for flock. We ourselves have retired from the show ring so as offering a few superior Hampshire yearlings. See our Exhibit at Toronto National and other leading exhibitions. L.D.-Phone

Shropshires

They are the right kind and out of "Buttar" ram. You may order any

Brooklin, Ontario

Yearling rams and yearling ewes, imported 3-shear ewes, an extra good lot of ram lambs of both breeds from England. JOHN MILLER, Claremont, Ont. 7 miles. Greenburn, C.N.R., 4 miles.

SHORTHORNS

An extra lot, well grown, well covered (and) Shorthorns, young bulls, cows and calves. See our Exhibit at Toronto National and other leading exhibitions. L.D.-Phone

Shortorns and Leicesters Sheep

JERSEY CATTLE

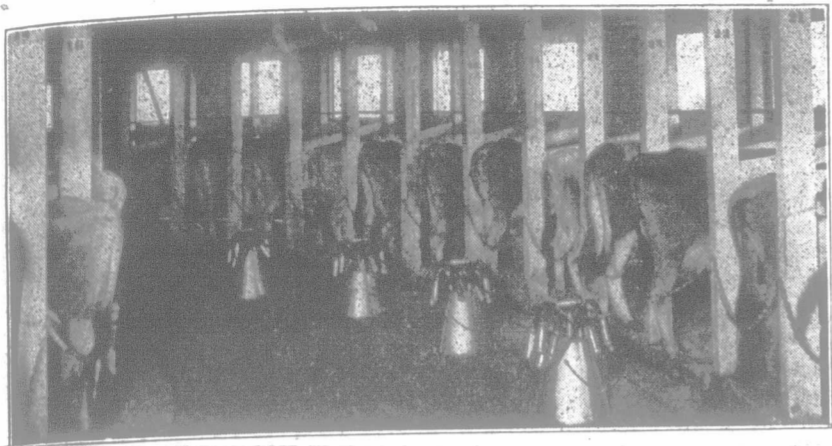
Age, bred from winners and champions for calf and young bulls, high in quality and quantity. See our Exhibit at Toronto National and other leading exhibitions. L.D.-Phone

ENGLISH BERKSHIRES

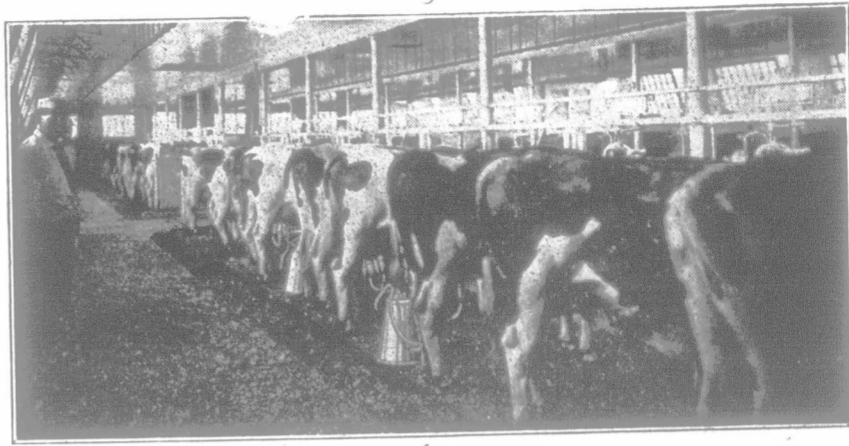
Other with the stock boar, Suddon Torredor, and other choice young stock in Chester whites and thrifty condition. Moderate Prices. See my Exhibit at Toronto National and other leading exhibitions. L.D.-Phone

and Shropshires

PIGION hog which is winner of twelve firsts and never been beaten. Are offering choice rams and lambs. See our Exhibit at Toronto National and other leading exhibitions. L.D.-Phone



Empire Mechanical Milker in circular barn



Empire Mechanical Milker in operation in the model dairy barn

The Solution of the Milking Problem

How Large and Small Dairies in All Parts of the Country Are Doing Away With the Drudgery of Milking — Cutting Down the Cost — Increasing the Milk Yield — and Insuring Their Patrons' Healthy, Sanitary Milk

SINCE the beginning of time milk has played a most important part in the world's diet. It stands with wheat as one of the world's most important foods.

Yet, while in every form of agriculture there has been a distinct advance in the method of harvesting the crop, until a few years ago milking was done in much the same way that it was in the earliest ages of which we have any record.

A Big Step Forward

This announcement of the advent of the Empire Mechanical Milker, therefore, seems to us to be one that should be of the utmost importance, not only to the practical dairymen, for whom it will save many hundreds of dollars in a year, but to all.

In recent years it has been proved that much of the suffering and disease that humanity is heir to is traceable directly to impure and insanitary milk.

The Empire Milker corrects this evil wherever installed. It keeps the milk absolutely free from dirt, disease germs and contaminating stable odors.

More Important Than the Harvesting Machine

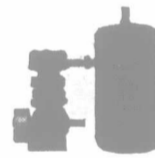
What the harvesting machine was to the wheat farmer the Empire Milker is to the dairyman. Just as the harvester enabled the wheat farmer to extend his acreage—garner his crop in less time, with less help and at less expense—so the Empire Mechanical Milker permits the dairyman to milk more cows in quicker time, with less expense.

Thus the advent of the Empire Mechanical Milker should mean a great extension of the dairy business, for when the danger from impure milk is removed the public will learn to depend more upon this most naturally healthful of all foods—and because the drudgery and expense of dairying are eliminated there will be more incentive to the farmer to keep a fine herd of dairy cows.

Even a comparison of the milker with the harvesting machine, however, does not indicate the importance of the advent of the Empire Mechanical Milker—for even the harvester, with all its advantages, did not increase the yield per acre nor the quality of the crop, whereas the Empire Mechanical Milker does, in many cases, increase the yield per cow, and in every case produces more sanitary milk.



Empire Mechanical Milker



The Empire Achievement

For years past the attention of experts who had to do with the dairy industry has been directed toward the perfection of a machine of this character, but it remained for the engineers and experts of the Empire Company—studying all that had been done in the past and adding to it with their own experience—to perfect this machine which has, at the present time, on thousands of dairy farms, under varying conditions, solved the problem in a thoroughly practical and economical manner.

The Empire machine not only insures milk free from bacteria and germs, removes the drudgery, cuts down the time and expense of milking, but it is easier on the cow than hand milking, as has been proved by the fact, over and over again, that the cows take to it readily—stand more quietly—let down the milk more easily—and give more milk where the machine is used.

For the Small Dairy Too

The Empire Milker is a practical, economical, sensible solution of the

milking problem—not alone for the big dairyman, but for the farmer with ten or more cows.

Its construction and operation are simple, and its cost trifling in comparison with the amount that it saves.

One man with an Empire Mechanical Milker can milk 20 to 30 cows per hour, at the same time doing the stripping and carrying the milk. Thus a dairyman can keep more cows with his present help or milk the cows he now has with less help—and be relieved forever from the drudgery of hand milking.

Briefly—How It Works

An Empire Mechanical Milker installation consists of a pump, actuated by any suitable power, a vacuum tank, necessary piping and the milker units.

In operation the pump draws the air from the tank. The vacuum thus created is transmitted by means of the piping to the milker unit, which consists of a pail, a pail lid, teat cups complete with rubber connections for air and milk and a pulsator. By means of this pulsator, vacuum and

atmospheric pressure are alternately applied to the rubber lining of the teat cup, causing a collapsing and expanding of this lining so as to massage the teat at the time the milking is being done, by means of the vacuum.

This, very briefly, explains the principle on which the milker works.

A full description, together with complete information about the machine, can be had by reference to the Empire Mechanical Milker Book, which will be sent to interested parties upon request.

Users All Satisfied

As to proof of the satisfaction and success of the users of the Empire Milker, space does not permit us to print the numerous letters we are receiving from users, but we have yet to hear of one installation of the thousands we have already made that has not proved satisfactory in operation.

We made sure of this machine by long-time tests before we put it in the hands of the practical dairymen; and now that it has been in use by them for over a year our judgment has been so vindicated that we are convinced that a thorough knowledge of what the machine will do is all that is necessary to convince any cow owner that it is to his best interest to install one.

Send for This Book

We have prepared a book telling all about the Empire Mechanical Milker, and we want to send a copy to every practical man who has his own and the best interests of the dairy business of the country at heart. It is not a long book but you will find it well worth reading. It tells simply and fully all about the Empire Milker—what it is, what it does, and how it does it—and then gives proof of the saving it effects for its users. Send for your copy today. Use the coupon NOW while you are thinking of it.

Date _____ 1915

The EMPIRE CREAM SEPARATOR CO. of Canada, Limited
Gentlemen: Please send me the Empire Mechanical Milker Book as advertised in London Farmer's Advocate.

Name _____
Address _____
Town and Province _____

THE EMPIRE CREAM SEPARATOR CO.

OF CANADA, LIMITED

TORONTO

and

WINNIPEG

Manufacturers of Empire Mechanical Milkers, Empire Cream Separators and Empire Sta-Rite Gasoline Engines

See our exhibit under the grand-stand, in what is known as the Manufacturers' Annex, at the Canadian National Exhibition at Toronto, and also at the London and Ottawa Fairs. The Empire Mechanical Milker is in use at the Central Experimental Farm at Ottawa.

FIRST AND PARAMOUNT,
ABSOLUTE SECURITY TO POLICYHOLDERS

Will Your Widow Dress as Well as Your Wife Does?

A queer question? Well, perhaps—but it's intensely serious.

It means, in other words—Have you made adequate provision for your family in the event of your sudden death?

Not a pleasant thought, maybe, but a far more unpleasant one is that the wife and little ones you love and cherish may next week be left penniless and dependent upon the charity of friends.

But by investing a few dollars a year in an Imperial Home Protection policy you can ensure that they will be comfortably provided for even though you should die next week. And they deserve that much sacrifice on your part—don't they?

Write to-day for our booklet, "The Creation of an Estate." You never know when you may be uninsurable.

THE IMPERIAL LIFE Assurance Company of Canada

HEAD OFFICE - TORONTO

Branches and Agents in all important centres

*The Imperial provides security of over \$134 for every
\$100 of liability to policyholders.*

COPYRIGHT 1913

London Concrete Machinery Co., Limited

London, Canada

The largest manufacturers of

CONCRETE MACHINERY

in the world.



"LONDON" BULL DOG BATCH MIXER

Capacity, 50 cubic yards per day. Just the machine for small jobs. Pays for itself in 20 days' use. Built to last a lifetime. Send for Catalogue No. 1 B.

See our exhibit at Western Fair, London, September 10 to 18.
Also visit our factory only two blocks from Fair Grounds.

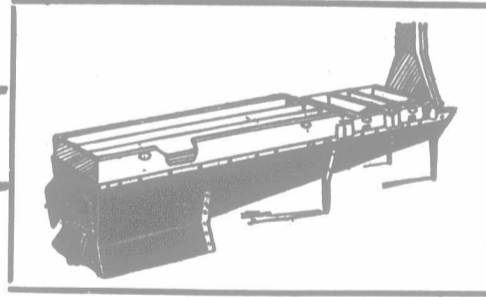
Live Stock a Strong Feature at Edmonton Fair.

From August 9 to 14 the city of Edmonton gloried in fine weather. This period of sunshine was opportune, for during that week their exhibition was being held. Rural patronage was not quite up to par, but residents of the city turned out in a liberal manner to make the Fair a success financially. The grounds were a pleasing sight. A good display of the country's resources were on exhibition, and the Live Stock Department was superior to anything in the past. Consequently, visitors could not fail to appreciate the attempt that was made to place the possibilities and the resources in every line which exist in that Province before the people once again.

Year after year there has been a marked growth in the live-stock industry, which has annually been registered at the Edmonton exhibition. This year the showing made surpassed even previous records, and furnished the most outstanding feature of the entire exhibition. The showing of horses, especially in the Clydesdale and Percheron classes, was heavy, being featured by strong competition. Many were the difficult decisions made, and the Horse Department as a whole, in fact, recorded the highest water-mark in the annals of the institution. This was partly due to the innovation of the Percheron Futurity, which brought forward the greatest quality Percheron display of home-bred and imported stock that the Province of Alberta has witnessed. Clydesdales were fully up to the previous standard, and in most classes having individuals of great merit in the premier place.

Expressions regarding the equine exhibit can, to a certain extent, be applied to the cattle classes. The dairy cattle did not supersede, nor did they hardly attain, on the whole, the marks set in previous years. However, in these, individuals of considerable excellence were in evidence throughout the various classes which came before the judge for decision. In the dairy breeds Holsteins were numerically strong, while Ayrshires and Jerseys appeared in only moderate strength. To the Beef Cattle Department credit is due for making the bovine

Ontario Maple Syrup Makers



If visiting the big fairs, call at our exhibit in the **Industrial Building, Toronto; Machinery Hall, Ottawa and London**, and we will show you the most improved utensils for making the highest quality Maple products. Competent demonstrators in charge.

The Grimm Mfg. Co., Limited

56 and 58 Wellington Street, MONTREAL

\$1,000

\$100 DOWN, \$10 A MONTH, buys 5-acre garden plot in Westminster Gardens, splendid clay loam soil, good water easily obtained, first-class facilities for getting to city (a few rods to stopping place on city's new electric line); Commutation rates given to city; six miles to city. Come in and let us take you to see these places. You will be delighted with them. Hundreds of farms on our lists for sale and exchange. Send for free catalogues describing them.

THE WESTERN REAL ESTATE EXCHANGE Limited
78 DUNDAS ST., LONDON, ONT. Phone 696

For Sale—Registered Percherons, Shorthorns, Berkshire pigs and Shropshire ram lambs.
JOHN W. COULTER, St. Thomas, R.R. No. 7
Or Traction Sta. No. 35

Shropshires of superior quality; both rams and ewes. Special offering for 30 days in Shropshires, Welsh ponies and Berkshire pigs.
J. LLOYD-JONES, Burford, Ont.

display of such an outstanding order. Throughout, the Shorthorns, Aberdeen-Angus and Herefords, classes of almost utmost quality, breed character, and marvellous deep conformation, demanded the admiration of the public, and presented throughout almost every class, competition that was keen indeed.

In the sheep and swine pens, flocks and herds better than usual forced intense competition. This was especially true in the Swine Department, where every breed presented competition, sometimes very strenuous, and in other cases of a light order.

Although considerable space of the building was utilized by the military authorities, the association erected seven new buildings to allow adequate accommodation for the live-stock display, and by so doing they created an air of satisfaction among the stockmen which was most pleasing.

The judges, on the whole, did very satisfactory work in their various tasks. The judges were as follows:
Robt. Graham, Toronto, Ont.; J. M. Gardhouse, Weston, Ont.; J. M. Fletcher, Elgin, Ill.; W. F. Stephen, Huntingdon, Que.; Jas. McCaig, Edmonton, Alta.; Capt. T. E. Robson, London, Ont.; Peter White, Pembroke, Ont.; and Wm. Grant, Regina, Sask.

CLYDESDALES.

In the aged stallion class Gay Douglas, by Scotland Yet, won the red ribbon from Royal Trustee which was second and Solicitor General which was third. All three were good, useful, drafty types but not considered good enough for championship. The premier horse in this breed was chosen from the two-year-old class where Dunrobin Pathfinder, exhibited by W. C. Sutherland, defeated General John and Western Hero. This quality two-year-old stallion was hardest pressed for honors by Dunrobin Hiawatha by Perpetual Motion and exhibited by W. C. Sutherland in the three-year-old class. The female competition was even more keen than that in the stallion classes. The many times winner, Poppy, came out in her old-time style and was placed first in the brood mares with Rosie Beauty second and Rosie MacLaren third. Pride of the Craig, a drafty mare and straight

and
are
obje
line
frew
out
dura
pow
Star
8 h
than
T

mover, to
ning in c
ond and t
and Lady
and reser
went to
respective
M. Bredt,

In the
at Edmon
prizes for
display.
lions and
the Perch
stake of
the better
colts. T
to be
February
fully rais
yearlings
adian exp
est induc
intention
sociation
vince, it
offering
stallion
and 5, G
Alta., on
by Halife
4, 6 and
Habitall,
frisse, 7
and Emp
Charlie.
and 6, G
tain Ma
Queen; 2
Habinare
Lane, on
9, Upper
White Sc
In the
Icarie by
weighing
won first
later av
Lord N
won fro
olds. I
Geo Lan
the heav
the yeld
the stru
Rosine,
Irlandais
Superb
Gordon.
Irlandais
and Su

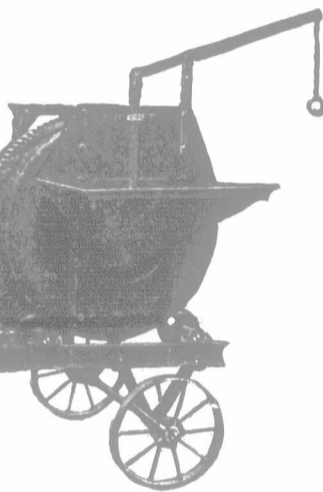
FOUNDED 1866

Concrete
ry Co., Limited
on, Canada

est manufacturers of

ONCRETE
ACHINERY

in the world.



OG BATCH MIXER

achine for small jobs. Pays for itself
ime. Send for Catalogue No. 1 B.

London, September 10 to 18.
blocks from Fair Grounds.

display of such an outstanding order
throughout, the Shorthorns, Aberde-
ngus and Herefords, classes of almost
most quality, breed character, and mar-
lous deep conformation, demanded the
miration of the public, and presented
roughout almost every class, competi-
tion that was keen indeed.

in the sheep and swine pens, flocks
d herds better than usual forced in-
se competition. This was especially
e in the Swine Department, where
ery breed presented competition, some-
es very strenuous, and in other cases
a light order.

Although considerable space of the
ilding was utilized by the military
thorities, the association erected seven
w buildings to allow adequate accom-
modation for the live-stock display, and
so doing they created an air of satis-
faction among the stockmen which was
st pleasing.

The judges, on the whole, did very
satisfactory work in their various tasks.
The judges were as follows:
Robt. Graham, Toronto, Ont.; J. M.
rdhouse, Weston, Ont.; J. M. Fletcher,
rin, Ill.; W. F. Stephen, Huntingdon,
e.; Jas. McCaig, Edmonton, Alta.;
ot. T. E. Robson, London, Ont.; Peter
ite, Pembroke, Ont.; and Wm. Grant,
gina, Sask.

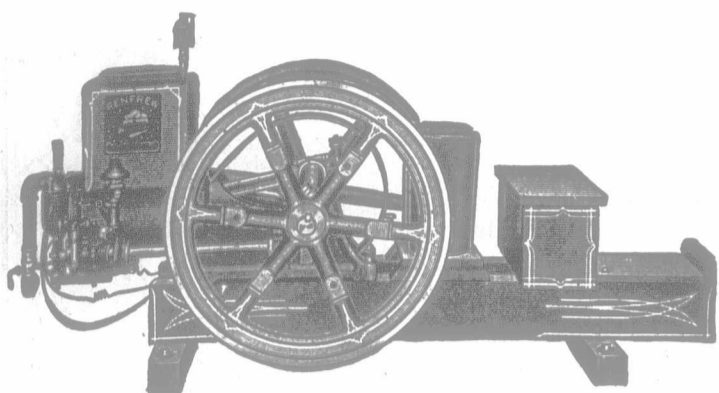
CLYDESDALES.

on the aged stallion class Gay
nglas, by Scotland Yet, won the red
on from Royal Trustee which was
ond and Solicitor General which
s third. All three were good, useful,
fty types but not considered good
ugh for championship. The premier
se in this breed was chosen from the
y-year-old class where Dunrobin Path-
er, exhibited by W. C. Sutherland,
eated General John and Western
o. This quality two-year-old stal-
n was hardest pressed for honors by
robin Hiawatha by Perpetual Motion
d exhibited by W. C. Sutherland in
three-year-old class. The female
petition was even more keen than
t in the stallion classes. The many
es winner, Poppy, came out in her
time style and was placed first in
brood mares with Rosie Beauty sec-
and Rosie MacLaren third. Pride of
Craig, a drafty mare and straight

SEPTEMBER 2, 1915

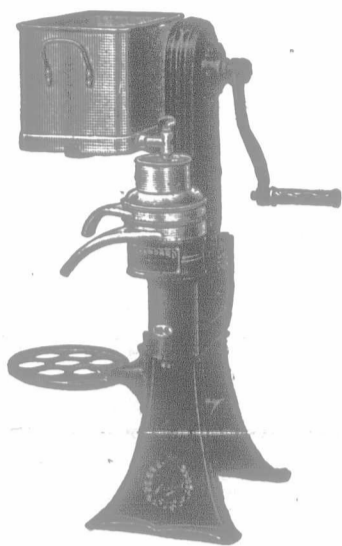
THE FARMER'S ADVOCATE.

1431



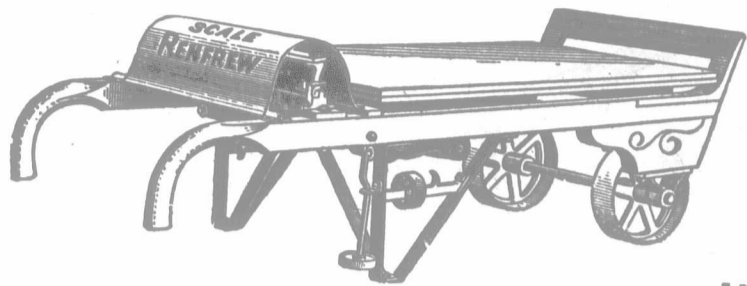
Renfrew Standard Dual Ignition

BE sure and see the Dual Ignition System—the latest feature of the Renfrew Standard engine—at the fall fairs. With the Renfrew Standard High Tension (built-in) Magneto and Battery equipment the delays and tie-ups from the ignition system of a gasoline engine are practically eliminated. This feature removes the last objection a farmer might have against purchasing a gasoline engine. He now is able to get an engine—the Renfrew Standard—which is entirely reliable, that starts without cranking, that is economical to run, and that is very durable. The latest models are exceedingly strong and powerful, being increased in size. The 6 h.-p. Renfrew Standard, for example, is about as large as the average 8 h.-p. engine. More value for your money this year than ever before.



Look
For Our
Exhibits

under the Grand Stand
and on Machinery Row
at Toronto Exhibition,
also at the other fairs.



Renfrew Truck Scale

—the scale that earns big dividends for farmers—is also on exhibit at the fairs. The handiest scale for farm use. Strong, compact, government inspected, guaranteed.

Standard Separator With Glass Sections

The glass sections are put on specially so that you can see the working parts and our famous automatic oiling system in full action at our fall fair exhibits. Another big feature we want you to see is the interchangeable capacity of the Standard Cream Separators. Also the bowl and the discs that have made those great close skimming records at Government Dairy Schools.

Grain Grinders, Saw Frames and
Ensilage Cutters also
on exhibition.

THE RENFREW MACHINERY CO., LIMITED, HEAD OFFICE AND WORKS: Renfrew, Ont.

AGENCIES ALMOST EVERYWHERE IN CANADA

mover, topped the dry mare class, win-
ning in close competition with the sec-
ond and third prize winners Bonnie Doon
and Lady Sylvander. The championship
and reserve championship in females
went to Poppy and Pride of the Craig
respectively, both the property of P.
M. Bredt, Calgary.

PERCHERONS.

In the Percheron department this year
at Edmonton the \$1,000 awarded in
prizes for futurity classes strengthened the
display. There were ten prizes for stal-
lions and ten for fillies, in this part of
the Percheron exhibition. This futurity
stake of \$1,000 is intended to induce
the better growing, care and fitting of
colts. The foals of 1914 were required
to be entered for competition by
February 1, 1915, and they were care-
fully raised and fitted to be shown as
yearlings in competition at any Can-
adian exhibition that offered the great-
est inducements. Next year it is the
intention of the Percheron Breeders As-
sociation to hold a futurity in each pro-
vince, it being held at the exhibition
offering the highest financial bid. The
stallion awards were as follows: 1, 3
and 5, Geo. Lane and Gordon, Pekisko,
Alta., on Marmion by Halifax, Marvel
by Halifax, and Monarch by Halifax; 2,
4, 6 and 10, J. C. Drewry Estate, on
Habitall, Habidit, Habigiges, and Jure-
frisse; 7 and 9, Geo. Lane, on Emperor
and Empire; 8, Upper Bros., on Prince
Charlie. Filly futurity awards: 1, 3
and 6, Geo. Lane and Gordon, on Moun-
tain Maid, Medissa and Maple Leaf
Queen; 2 and 5, J. C. Drewry Estate, on
Habinare and Polyanthus; 4 and 8, Geo.
Lane, on Encore and Energetic; 7 and
9, Upper Bros., on Black Beauty and
White Socks.

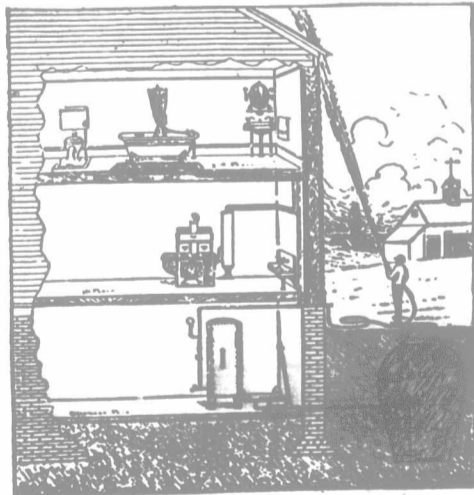
In the open Percheron stallion classes
Icarie by Jasmin, an immense individual
weighing between 2,200 and 2,400 lbs.,
won first place for Geo. Lane, and was
later awarded the championship over
Lord Nelson the three-year-old which
won from Futurity in the three-year-
olds. Lord Nelson was exhibited by
Geo. Lane and Gordon. In the females
the heaviest competition appeared when
the yeld mare class went into the ring;
the struggle for first place being between
Rosine, exhibited by Upper Bros.,
Irlandaise shown by Geo. Lane, and
Superb the property of Geo. Lane and
Gordon. The decision finally landed
Irlandaise in first place, Rosine second,
and Superb third. The championship

The engine farmers have been looking for

That's what some of our customers
have said. One farmer well described
it "The Engine with the trouble left
out." Any user will tell you that the

EMPIRE Hopper-Cooled Engine

more than fulfils its guarantee. It delivers the power smoothly and without fuss, on
much less gasoline than other engines rated as economical. Built by men who know how.
Has few parts; is equipped with gravity sight-feed oil cups, jump-spark ignition and
make-and-break governor. Unfailing starter in coldest weather. Write for booklet to-day.



Put in an EMPIRE Water Supply System

Enjoy the comfort and livability
of a house with running hot and
cold water on each floor—the labor
saving of a plentiful supply of
water in stable and barn. We
make an outfit that will meet your
needs exactly and can install it at
a price that you'll admit is sur-
prisingly moderate.

An Empire Water Supply System
will last a life-time. Simple, easy
to run, nothing to get out of order.
We make Empire Systems to oper-
ate by hand, windmill, gasoline or
electric power. Our pumps furnish water and air at the same time, air alone, or water
alone. Let us help you to greater home comfort, labor-saving convenience and adequate
fire protection. Write for folder to-day.

EMPIRE M'FG CO., Limited East London, Ont.



Central Nurseries, St. Catharines, Ont.

Have a Fine Assortment of
Trees, Vines, Plants, Ornamentals, Etc.
For Fall Planting.

For satisfaction plant HULL TREES. Our prices are
right and so are the trees. Send for priced catalogue, also
your want list for special prices on Apple Trees. Excellent
quality, and at a very reasonable price. Trees grown in
Canada. Look over our price list. No agents.
A. G. HULL & SON, St. Catharines, Ont.



When writing advertisers, will you kindly mention "The Farmer's Advocate."

and reserve championship went to the
first and second winners of this class.

SHIRES AND BELGIANS.

T. Rawlinson exhibited the champion
Shire stallion, Hampton Royal Friar, and
G. Lee Warner had the champion mare
in Queen Carlton. The champion Belgian
stallion was Perfection, shown by
W. R. Gordon, while N. Bilsborrow
brought out Princess Alberta on which
he won championship honors in filly
classes.

SHORTHORNS.

Approximately the same showing in the
Shorthorn breed was made at Edmon-
ton Exhibition as at those held
previously throughout the western circuit.
Gainford Perfection and Silver Queen re-
spectively secured the male and female
championships, thus completing their
western circuit without a single defeat
in the ring. J. A. Watt, won the aged
bull class with Browndale by Avondale.
Although Burnbrae Sultan and Oakland
Star, two bulls with greater scale, made
the decision rather problematical for a
while. Thelma 2nd rightfully won first
place in the aged-cow class, having ex-
cellent Shorthorn character and a wealth
of beef conformation. The senior cham-
pion bull was Gainford Perfection and
the reserve, Browndale, both shown by
J. A. Watt, Elora, Ont. The junior
champion bull was found in J. G.
Barron's Emma's Prince, and reserve in
Yule & Bowes' Oak Bluff Marshall. The
grand champion bull was Gainford Per-
fection and reserve, Emma's Prince.
Senior champion and reserve females
were Silver Queen and Thelma, both
shown by J. A. Watt. The junior
female champion was Countess 16th, ex-
hibited by A. F. & G. Auld, Guelph, Ont.
Silver Queen was made grand champion
and Countess 16th reserve.

HEREFORDS.

There was some keen competition in
the Hereford classes where two notable
eastern herds, one from Manitoba and
two from Alberta clashed for honors.
The majority of the money, however,
went to the Manitoba and Ontario
herds. Breed character was outstanding
throughout the entire exhibits and
most of those competing were Canadian-
bred. Among the exhibitors were V. W.
Smith, of Camrose, Alta.; J. A. Chap-
man, Hayfield, Man.; Frank Collicutt,
Calgary, Alta.; Jas. Page, Wallace town,
Ont., and L. O. Clifford, Oshawa, Ont.
Page won the senior-bull championship



No. 21 Tinkler Wheel Plow

FAMOUS FLEURY PLOWS

No. 21.—The most FAMOUS PLOW in Ontario. Imitated by nearly all other manufacturers of Plows. Imitations are generally inferior in Plows as in other things. Get the "ORIGINAL NO. 21."

The Plow for the boy—or old man—or inexperienced farm hand. Will run from end to end without holding—and do PLOWING-MATCH work. A Tinkler Wheel Plow—original patented—should have a place on EVERY FARM.

No. 13.—High-class General Purpose, ESPECIALLY good in stubble. Extraordinarily light in draught.

"SPECIAL" No. 5, Narrow, General purpose. Fine in sod—the neatest kind of a furrow.

No. 16.—Very light Two-horse plow. One-horse attachment if desired—ESPECIALLY adapted to orchard work.

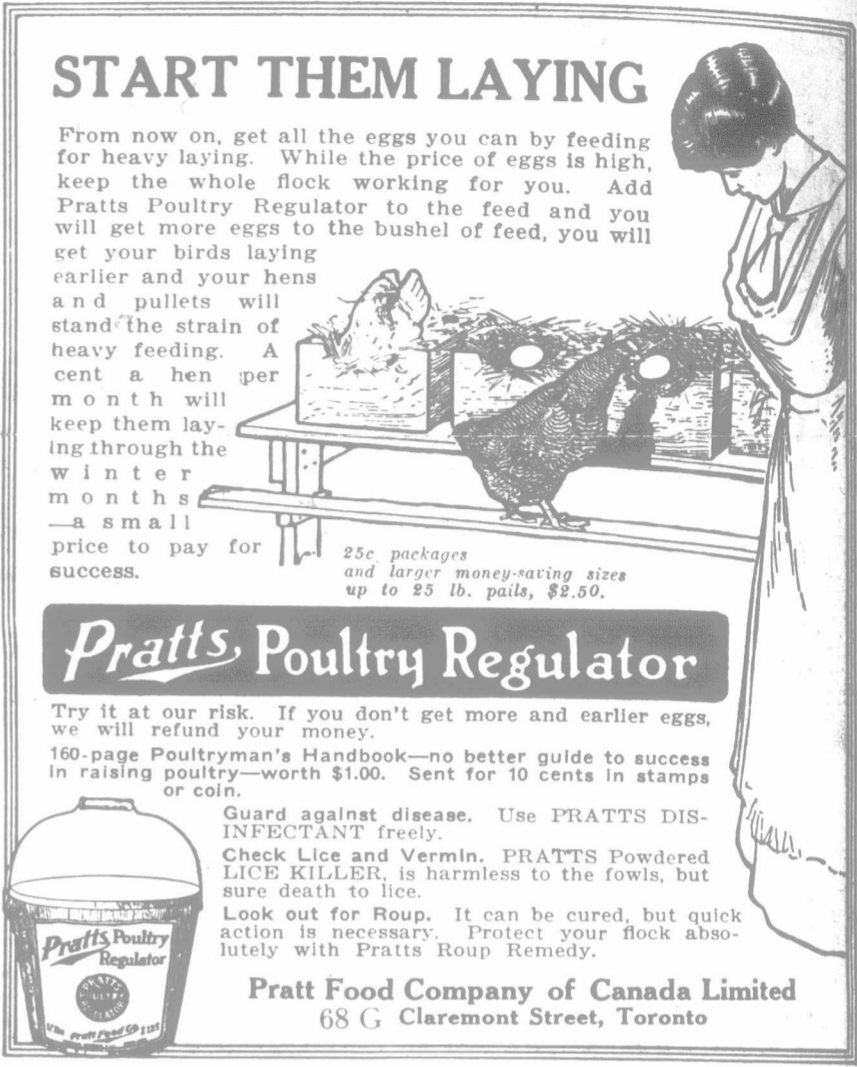
No. 15A.—One-horse Plow, unequalled. Imitated by other manufacturers—poorly imitated! We give our WORD and GUARANTEE that no other One-horse Plow equals this in EASE and COMFORT in handling or in WORK in garden, orchard or field.

J. FLEURY'S SONS, - AURORA, ONTARIO
Medals and Diplomas, World's Fairs, Chicago and Paris.

Contracts for coming season will now be made
DIRECT WITH DEALERS

START THEM LAYING

From now on, get all the eggs you can by feeding for heavy laying. While the price of eggs is high, keep the whole flock working for you. Add Pratts Poultry Regulator to the feed and you will get more eggs to the bushel of feed, you will get your birds laying earlier and your hens and pullets will stand the strain of heavy feeding. A cent a hen per month will keep them laying through the winter months—a small price to pay for success.



25c packages and larger money-saving sizes up to 25 lb. pails, \$2.50.

Pratts Poultry Regulator

Try it at our risk. If you don't get more and earlier eggs, we will refund your money.

160-page Poultryman's Handbook—no better guide to success in raising poultry—worth \$1.00. Sent for 10 cents in stamps or coin.

Guard against disease. Use PRATTS DISINFECTANT freely.

Check Lice and Vermin. PRATTS Powdered LICE KILLER, is harmless to the fowls, but sure death to lice.

Look out for Roup. It can be cured, but quick action is necessary. Protect your flock absolutely with Pratts Roup Remedy.

Pratt Food Company of Canada Limited
68 G Claremont Street, Toronto

on Bonnie Brae 31st, and reserve honors went to Clifford on Lord Fairfax. The junior champion bull was Clifford's Albany Fairfax, and the reserve J. I. Moffatt's Advance. Lonnie Brae 31st was given premier honors with Clifford's Albany Fairfax in reserve. Chapman had the senior champion female in Miss Armour Fairfax, while Page stood reserve with Miss Brae 50th. Chapman had the junior champion females in Beau Fairy, and Beau Fairy 2nd; Miss Armour Fairfax was given the grand championship ribbon and Beau Fairy reserve.

ABERDEEN-ANGUS.

The Edmonton Exhibition had a greater exhibit of Doddies than was to be seen at any other show of the western circuit. Again Evreux of Harviestoun, exhibited by J. D. McGregor, received the grand championship in bulls, while Key of Heather 2nd, also shown by McGregor, received the female championship. Among the exhibitors were Jas. Bowman, Guelph, Ont.; W. R. Stewart, Halkirk, Alta.; Lew Hutchinson, Duhamel, Alta.; and J. D. McGregor, Brandon. Bowman won first place in two-year-old bulls with Elm Park Wizard 3rd; first and third places in the senior-bull-calf class on Elm Park Beater and Elm Park Kelso; also first in the junior-calf class on Elm Park Wizard 6th. These and other first prizes in the female classes were won by the Ontario herd in addition to some placings of less importance. McGregor won senior and junior championships on Evreux of Harviestoun and Enjoiner of Glencarnoch, with highest honors going to the first-named bull. McGregor also won senior female championship on Key of Heather 2nd, with reserve going to Bowman on Rosebud 17th. On Elm Park Keepsake 17th Bowman won the junior female championship, while McGregor came reserve with Lucretia of Glencarnoch 2nd. Key of Heather 2nd and Elm Park Keepsake 17th were made grand champion and reserve grand champion females respectively.

Mr. Lloyd-Jones' Burford flock of Shropshires, established twenty years ago, has distributed over 2,000 sheep, and only four dissatisfied customers have been numbered in the purchasers, two of which returned their sheep. Sheep from this flock have won in all company, Southdown, Leicester, and Welsh Bontes, and are included in the advertisement in another column.




Linseed Oil Cake a Safe Food

There is less danger from overfeeding Linseed Oil Cake than almost any other food.

For years and years graziers and live-stock men in Britain have been feeding this Linseed Oil Cake Meal with wonderful success.

Many of our Ontario farmers are now realizing the money there is to be made out of the summer feeding of their live stock on pasture. That is, by supplementing the pasture feed with the feed of Maple Leaf Oil Cake once a day.

It means your beef cattle, sheep and milch cows by being fed throughout the summer with the proper amount of Maple Leaf Linseed Oil Cake mixed with grain or meal will be gaining all the time and making money for you, whereas, without this in many cases don't hold their own, and milch cows often go back very rapidly. With stockers and beef cattle the Maple Leaf Oil Cake should be nutted and fed to the stock in troughs in the pastures once a day.

LINSEED OIL CAKE

MAPLE BRAND LEAF



A good ration to commence with would be to allow about a quarter of a pound to each head and gradually increase up to about say a pound and a half or two pounds per head per day, watching your stock carefully all the time, so that they are gaining.

For milch cows it would be better perhaps to feed them in the stable at milking time and mix a little grain or chop feed with the Maple Leaf Linseed Oil Cake.

If you will try this you will find your milk supply will increase considerably and be maintained longer.

Write us to-day for prices and copy of our booklet, "Facts to Feeders."

Canada Linseed Oil Mills Limited
TORONTO MONTREAL

Questions and Answers.

- 1st—Questions asked by bona-fide subscribers to "The Farmer's Advocate" are answered in this department free.
- 2nd—Questions should be clearly stated and plainly written, on one side of the paper only, and must be accompanied by the full name and address of the writer.
- 3rd—In veterinary questions, the symptoms especially must be fully and clearly stated, otherwise satisfactory replies cannot be given.
- 4th—When a reply by mail is required to urgent veterinary or legal enquiries, \$1.00 must be enclosing.

Veterinary.

Unthrifty Mare.

Mare showed symptoms of heaves in the spring. In June, after being driven, she suffered from laminitis, for which my veterinarian treated her successfully. Since then the symptoms of heaves have not been noticed except a cough, but she is not doing well. She has lost flesh and is getting very weak and has little appetite. Kidneys and bowels normal. She is hide-bound and tucked up.

J. S. S.

Ans.—Mix four ounces each of powdered sulphate of iron, gentian, ginger, nux vomica and bicarbonate of soda, and two ounces of digitalis. Give her a tablespoonful three times daily, and feed on food of first-class quality. V.

Sequel to Distemper.

Deer hound had distemper last spring and has not fully recovered. He stands for some time in one position, with head down, and it appears to hurt him to raise or lower it. He goes around with back arched, and appears to be losing the use of one hind leg. He eats fairly well, but looks gaunt.

T. W. B.

Ans.—Distemper in dogs is liable to many complications. In this case, partial paralysis exists as a sequel. In many cases the paralysis is progressive, while in others it yields to treatment. Get a mixture of 1/2 fluid ounce each of tincture of nux vomica, tincture of gentian, and tincture of iron, 1 fluid ounce alcohol, and water to make 8 fluid ounces. Give him a teaspoonful of this four times daily. If you notice a twitching of the muscles shortly after giving a dose, reduce the dose one-third. Feed on laxative food and keep comfortable.

Dr. B. J. Lloyd, a surgeon in the United States Health Service, regards the rat-proofing of buildings as an economic as well as a sanitary measure. He is quoted as saying that in this country rats eat \$100,000,000 worth of foodstuffs every year.

When writing advertisers, will you kindly mention "The Farmer's Advocate."

LAYING

can be fed by feeding of eggs is high, for you. Add feed and you of feed, you will

money-saving sizes
pails, \$2.50.

Regulator

more and earlier eggs,
better guide to success
for 10 cents in stamps

Use PRATTS DIS-
n. PRATTS Powdered
ness to the fowls, but
can be cured, but quick
Protect your flock abso-
up Remedy.

pany of Canada Limited
ont Street, Toronto

Questions and Answers.

1st—Questions asked by bona-fide subscribers to "The Farmer's Advocate" are answered in this department free.

2nd—Questions should be clearly stated and plainly written, on one side of the paper only, and must be accompanied by the full name and address of the writer.

3rd—In veterinary questions, the symptoms especially must be fully and clearly stated, otherwise satisfactory replies cannot be given.

4th—When a reply by mail is required to urgent veterinary or legal enquiries, \$1.00 must be enclosed.

Veterinary.

Unthrifty Mare.

Mare showed symptoms of heaves in the spring. In June, after being driven, she suffered from laminitis, for which my veterinarian treated her successfully. Ever since then the symptoms of heaves have been noticed except a cough, but she is not doing well. She has lost weight and is getting very weak and has no appetite. Kidneys and bowels normal. She is hide-bound and tucked up.

J. S. S.

Ans.—Mix four ounces each of powdered sulphate of iron, gentian, ginger, x vomica and bicarbonate of soda, and two ounces of digitalis. Give her a tablespoonful three times daily, and add to food of first-class quality. V.

Sequel to Distemper.

Deer hound had distemper last spring and has not fully recovered. He stands some time in one position, with head down, and it appears to hurt him to rise or lower it. He goes around with neck arched, and appears to be losing use of one hind leg. He eats fairly well, but looks gaunt.

T. W. B.

Ans.—Distemper in dogs is liable to many complications. In this case, partial paralysis exists as a sequel. In many cases the paralysis is progressive, and in others it yields to treatment. Give a mixture of 1/2 fluid ounce each of tincture of nux vomica, tincture of gentian, and tincture of iron, 1 fluid ounce alcohol, and water to make 8 fluid ounces. Give him a teaspoonful of this mixture three times daily. If you notice twitching of the muscles shortly after giving a dose, reduce the dose one-third. Add on laxative food and keep comfortable.

V.

Dr. B. J. Lloyd, a surgeon in the United States Health Service, regards the rat-proofing of buildings as an economic as well as a sanitary measure. He is quoted as saying that in this country rats eat \$100,000,000 worth of foodstuffs every year.

PEERLESS PERFECTION



FENCE

Does all you could wish for a poultry fence and more. Built close enough to keep chickens in and strong enough to keep cattle out. Even small chicks cannot get between the close mesh of lateral and vertical wires. The heavy, hard steel top and bottom wires together with intermediate laterals will take care of a carelessly backed wagon, or an unruly animal and spring back into shape immediately. The wires are securely held together at every intersection by the Peerless Lock. This is not a nothing but a real fence—built in line with our usual good standard of excellence.

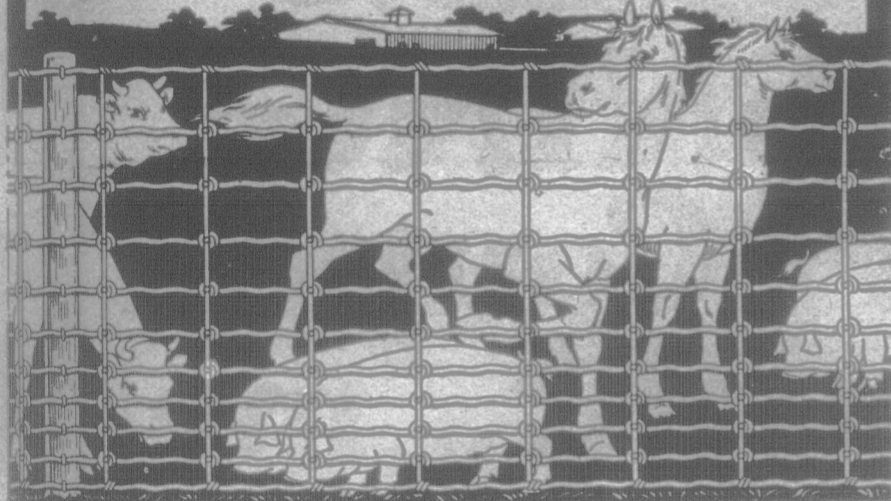
Peerless Perfection Field Fence is Strong—Yet Springy as a Bed Spring. Animals can't break through it no matter how hard their attacks. It simply can't be broken. Just springs back in shape like a bed spring. It's made of heavy close mesh steel galvanized wire with all the impurities taken out and all the strength and toughness left in. Will not corrode or rust. Top and bottom wires are extra heavy. Will not sag. Requires less posts than ordinary fence. Absolutely guaranteed.

Peerless Ornamental Fencing accomplishes two great purposes. It beautifies your premises by giving them that symmetrical, pleasing, orderly appearance, and it protects them by furnishing rigid, effective resistance against marauding animals, etc. We make gates to match, that are equally attractive.

The Fence that never needs repairs. It is the cheapest fence to erect, because, owing to its exceptionally heavy top and bottom wires, but half the usual amount of lumber and posts are required. Saves Expense

Send for Literature and address of nearest agent. We also make a complete line of farm and ornamental fencing. Agents wanted in unassigned territory.

THE BANWELL-HOXIE WIRE FENCE CO., Ltd. Winnipeg, Man., Hamilton, Ont.



"Water, Water, Everywhere," And Comfort for You and Your Wife

In the stables, in the house, in the garden; clean, pure, fresh water at all times, summer or winter. No more heavy lifting and pumping for yourself or your wife. No more unsanitary attic tanks. Water any place on the farm—without work—without trouble—with little expense.

PEERLESS WATER SYSTEMS



Save time, labor, doctors' bills, and inconvenience; they bring city comforts to the farm, make bath rooms, laundries and running water in any part of house, barn or fields possible.

Compact, strong, simple, require little attention and cost almost nothing to operate.

Water is pumped from source of supply to tank located in cellar, outhouse, or underground. Then held under air pressure which purifies and forces it to wherever you run the pipes in house, barns or garden. There's no cost of operation beyond the filling of the tank, and when desired the engine, used for this purpose can be used for driving cutting box, churn, separator or other machines on the farm.

You would be interested in our circulars about Peerless Water Systems.

NATIONAL EQUIPMENT CO. LTD.
1 Wabash Ave., TORONTO.

3 Sole Manufacturers of Peerless Water Systems.

OK CANADIAN

POTATO DIGGER

Made in Canada
FREE to potato growers
our 48-page booklet,
"Money in Potatoes"

CANADIAN POTATO MACHINERY CO., Limited
GALT, ONT.



Saves exactly
HALF the cost

Digs the crop clean and in half the time. New stone shield. Side delivery of vines. The O.K. Diggers are light in draft. Made in sizes and styles to suit every condition of soil.

Gossip.

In a recent communication to "The Farmer's Advocate," A. A. Colwill, of Newcastle, Ont., writes thus: "Owing to a recent and lengthy illness, I do not propose to attend the large fairs this fall with my Tamworths, hence I shall have quite a number of choice show sows and boars on hand, which will be sold at moderate prices, several of which are fit to go into any show ring. I also have a few real choice heifer calves of the dual-purpose kind that will be well worth looking after; also some nice young bulls about ready for service."

There were strong indications before the war started that a large trade would develop between England and Canada in pure-bred Holstein cattle, and there is reason to believe that when the war is over all our surplus stock of Holsteins will find a ready sale in that market at a good profit. The large milk and butter yield is what they are after, and pure-bred Holsteins have demonstrated by official test their ability to meet all requirements in this respect. The low prices that prevail at present should warrant farmers in preparing for this demand, as those who are first in the field usually reap the harvest. The dispersion sale of pure-bred Holsteins at Glenescott Farm (near London), on September 15, should be a good opportunity to make a start, as pedigreed cattle of high official record will be sold at auction to the highest bidder. The present owner is compelled, for health reasons, to live a great part of the year in the South. See the advertisement in this issue.

C. J. LANG'S BERKSHIRES.

With considerably over a hundred head of English Berkshires to select from, breeders can be assured of getting their wants supplied in breeding stock, whether it be a stock boar, a breeding sow, or any quantity desired and of either sex, in the noted herd of C. J. Lang, of Burketon, Ont., R. R. No. 8. The stock boars now in service are British Duke (Imp.), and the Augusta-bred Elmhurst Augusta 2nd (Imp.). All the thirty-odd brood sows are either imported direct or bred from imported sires and dams. Mr. Lang breeds and ships to breeders, probably, more Berkshires every year than any other Canadian breeder. Satisfaction is guaranteed in every shipment, and he ships what he guarantees, hence the secret of his phenomenal success. He has also a well-selected flock of Shropshire sheep, bred from the renowned flock of J. & D. J. Campbell, of Woodville. He is offering for sale ram and ewe lambs of exceptional merit. Write him your wants in Berkshires or Shropshires.

A SIX-HUNDRED-DOLLAR GARDEN.

Oh! Daphne's Garden, it is fair,
And fills the circumjacent air,
And ladens every passing breeze,
With scent of Turnip, Beet, and Pease
The caroling Cabbage rears her head
Beside the blooming Spinach bed,
The while the merry Leek hard by
Flirts with the modest Plant-de-Pie.

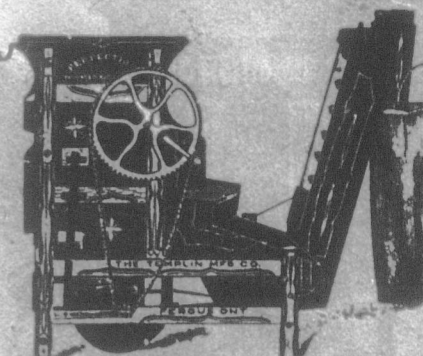
The Bean, ambitious he of soul,
Climbs higher daily on his pole,
While tender little Carrots fout
The glances of the Brussels Sprout.
The soft Tomato, ripe and lush,
The Red Rose rivals with her blush,
While in the depths of every hill
The amorous Potatoes trill.

The Winging Birds with hearts of song
Come wooing here the whole day long.
The Crickets chirp their roundelay
Unto the Garden night and day,
The Hopper hops from out the grass
Amid sweets his hours to pass,
And chiefest lover of its fruits,
The Cutworm serenades its roots.

O Garden blest! O Garden rare!
O Garden ever sweet and fair—
I love thee for that Daphne's hands
Have lured thee from the arid sands;
I love thee for that Daphne's toll
Hath wrested from the earth thy spoil,
E'en though six hundred cold I drop
For fourteen dollars' worth of crop!

—John Kendrick Bangs, in N. Y. Times.

THE PERFECTION SEED AND GRAIN SEPARATOR



This mill is the choice of the Colleges and Government Farms at the O.A.C. and Prison Farm at Guelph, Ont.; Harrow, Ont.; Farnham, and St. Casimir, Portneuf, Que.; Fredericton, New Brunswick; Truro, Nova Scotia; Charlottetown, Prince Edward Island, and hundreds of farmers everywhere throughout Canada.

There must be a reason. It is the best mill on the market to-day for cleaning grain of all kinds, including the clovers. Write for free circular "A," get better prices for your grain and double your crop.

THE TEMPLIN MFG. CO. FERGUS, ONT.

CANADIAN PACIFIC

THE IDEAL ROUTE
TO AND FROM
TORONTO
DURING
Canadian National Exhibition
AUG. 25 TO SEPT. 13, 1915

REDUCED FARES
To Toronto from all stations in Ontario, also from Niagara Falls and Buffalo, N.Y., and Detroit, Mich.

Be Sure to Consult C.P.R. Agents regarding
EXTRA TRAIN SERVICE
To and from Toronto, Parkdale Station and Exhibition Grounds, also
SPECIAL LOW FARES
From Principal Points on Certain Dates
Particulars from J. H. Radcliffe, Agent,
C.P.R., London, Ont., or write M. G. Murphy,
D.P.A., Toronto.

DIGGERS

For potatoes. All growers know that it pays to use diggers even on five acres—they save valuable time, save all the crops in good condition, at less expense.

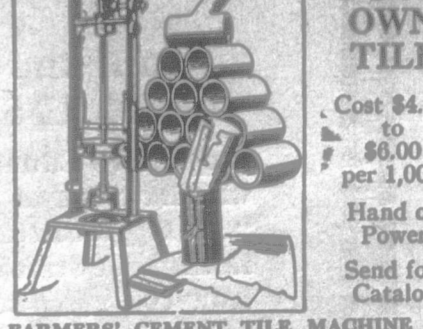
IRON AGE DIGGERS



Wheels 30 or 25 ins. Elevator, 22 or 20 ins. wide. Thorough separation without injury to the crop. Best two wheel forward truck. Right adjustment of plow shifts in gear from the seat. Can be backed, turns short into next row. We guarantee our diggers to do the work claimed for them. Ask your dealer about them and write for booklet.

The Bateson-Wilkes Company, Limited
410 Bymington Ave.
Toronto, Ont.

MAKE YOUR OWN TILE



Cost \$4.00 to \$6.00 per 1,000
Hand or Power
Send for Catalog

FARMERS' CEMENT TILE MACHINE CO.
Walkerville, Ontario.

LEARN THE AUTOMOBILE BUSINESS

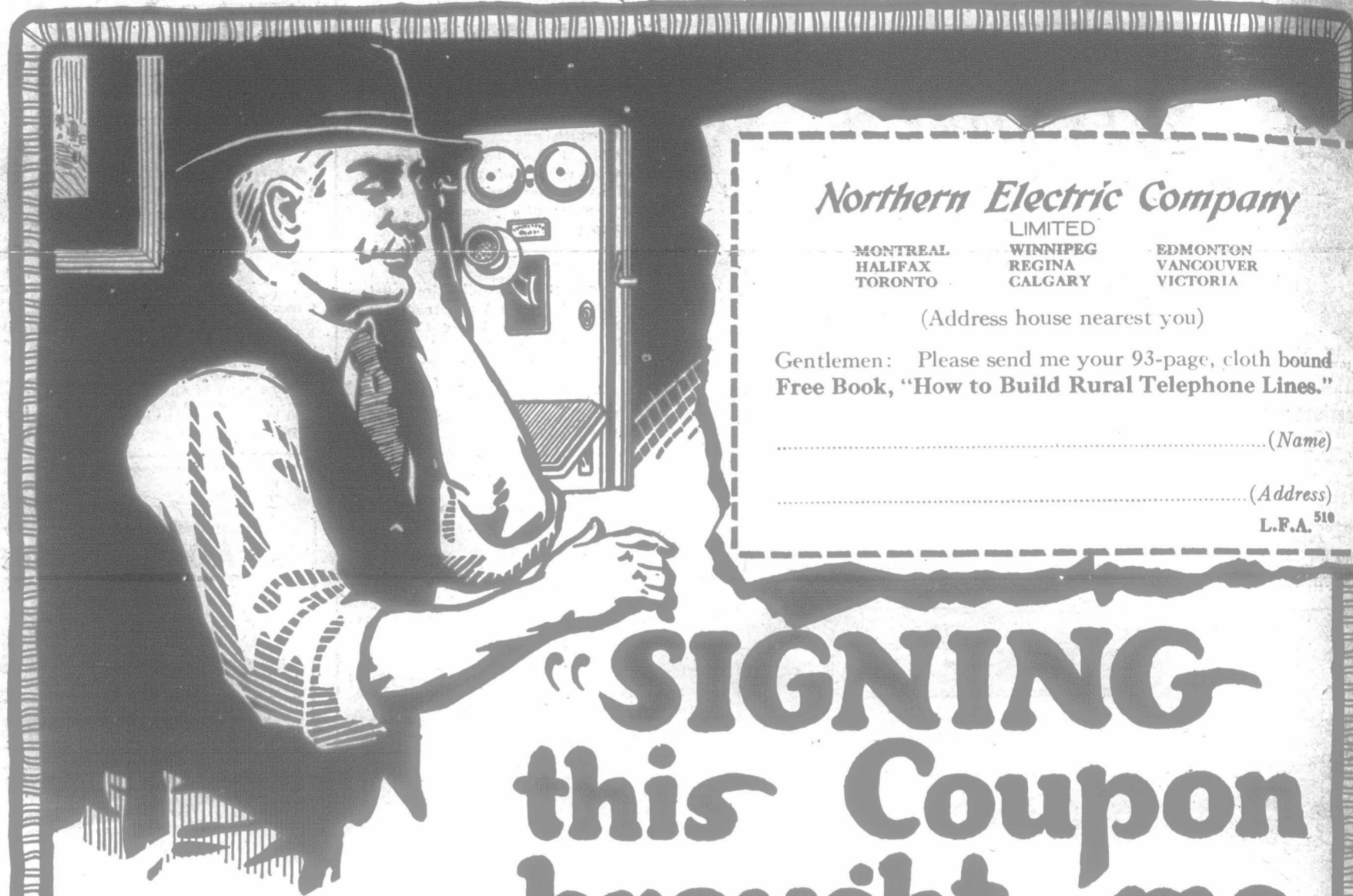
Big demand for men at good salaries. We train you and make you competent in a short time. Booklet free.

TORONTO AUTOMOBILE SCHOOL
85-87 Wellington Street, W.
TORONTO, ONT.

FARM LOANS

Money to loan (First Mortgage) on improved Ontario farms, at lowest current rates.

A.L. MASSEY & CO.
DOMINION BANK BLDG., TORONTO.



Northern Electric Company

MONTREAL	LIMITED	EDMONTON
HALIFAX	WINNIPEG	VANCOUVER
TORONTO	REGINA	VICTORIA
	CALGARY	

(Address house nearest you)

Gentlemen: Please send me your 93-page, cloth bound Free Book, "How to Build Rural Telephone Lines."

.....(Name)

.....(Address)

L.F.A. 510

**"SIGNING
this Coupon
brought me
more profits — more comfort"**

—James McKell, Riverfield, Que.

Over 125,000 farmers throughout Canada have found the telephone a real money-maker. In a dozen different ways it adds to the farmer's income and net profits. The telephone cuts out the costly delays in running a farm. Instead of sending a messenger, you send a telephone message, and get your answer back immediately. The telephone brings *business efficiency* to the farm.

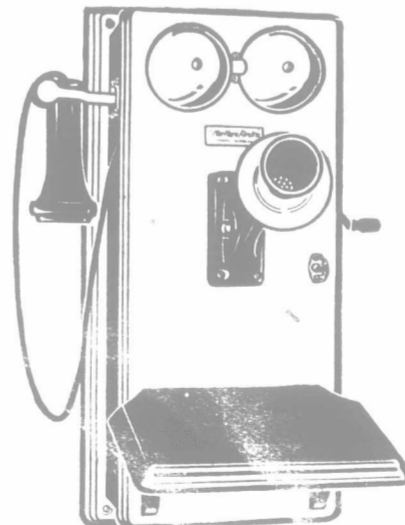
Think of the comfort and satisfaction a telephone will mean to you and your family. City people with neighbors right next door find it indispensable. How much more so will it be to you—who live perhaps a mile from the nearest neighbor?

The telephone cures the "city-fever" in your children and removes the deadening loneliness from your wife's long days.

**Join the Army
of 125,000**

progressive Canadian farmers who have found the telephone "the biggest little thing on the farm." Our free book tells you how to organize your local company and build your lines. Write for it.

Northern Electric Company



Just One Leader—

The hundreds of rural exchanges throughout Canada owe their existence to the *leadership* of usually just one man in the community who signed the coupon and got our free advice and help in organizing the local telephone company. Be that man in your community. Write our nearest office:

Halifax	Winnipeg	Edmonton
Montreal	Regina	Vancouver
Toronto	Calgary	Victoria

Why don't you sign it today?