

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.—30 cents per line, agate, flat. Live-stock advertising rates given on application.
 4. THE FARMER'S ADVOCATE is sent to subscribers until the explicit order is received for its discontinuance. All payment of arrears must be made as required by law.
 5. THE LAW IS, that all subscribers to newspapers are held responsible until all arrears 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 for 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.

managed should be allowed to remain solvent and put enough into reserve to insure a continuance of that solvency; but they should be obliged to give service, which means heavy annual outlays and extensions. The problem now before the Board of Railway Commissioners is one not easy of solution; vital questions are involved, great principles are at stake. Will the Board allow one of the strongest labor unions in the world to wrest seventy millions of dollars from the Canadian railways and thus indirectly from the Canadian people. By granting the increases asked for, the Board puts the stamp of approval on labor's demand for this extra seventy million dollars. Is it not time some one said no? Again, how long must international affiliations and relationships be allowed to influence the whole administration of Canadian affairs? It is almost time we ruled in our own household and ceased to accept United States rulings as solutions of our own domestic problems. That is a principle involved. Furthermore, how far is the Board justified in protecting the shareholders of the C. P. R. and insuring them reasonable annual dividends? Upon this the whole matter hinges, for the deficits of the Government railways can be taken care of out of Mr. Taxpayer's pocket.

The Crops in Glengarry.

BY ALLAN MCDIARMID.

The subject that is above all others in interest, at this time of the year, is the one that has to do with the results of the farmer's year of labor. What of the crops?

This question is universal because it concerns every individual that has taken up his quarters on this planet called the Earth. They all eat. And until they stop doing that the outcome of the farmer's effort is of vital importance to them.

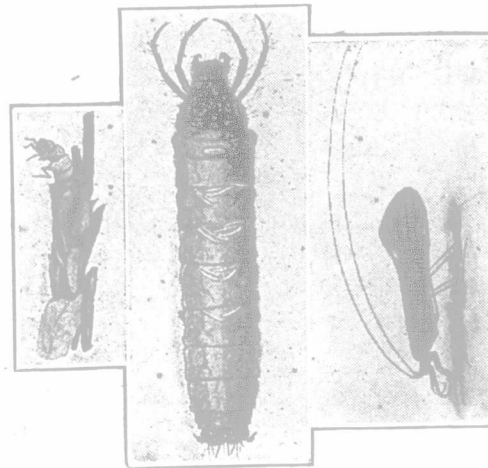
We take it for granted that all men are naturally a little selfish, so the reason for this general interest is varied. The farmer wants a good crop so that he may have a surplus to sell and have the means to supply his other wants, besides those merely relating to food. To buy a better car, perhaps, than the one that he has had now for nearly a year.

Then the city-dweller hopes for a good crop so that prices may come down and that, as a consequence, he won't have to continue spending so much of his income for food that there will be nothing left to pay the rent. As to wearing apparel, we all know that the city man has no money for such luxuries and has been wearing his old clothes for some years now—in fact, since before the war.

Finally, that wolf in sheep's clothing, the middleman, is anxious for good crops so that he may have the greater amount of produce to handle and on which to levy that unrighteous commission of his.

So, whether it would be good for our souls, or not, to have a "bumper crop" every year, the fact remains that the world is hoping for it and looking forward with interest for the "reports" that will give them an idea as to whether the coming year will be, for them, "lean" or "fat."

"The world's trade and commerce depend on the crops, the crops depend on the weather, to a great extent, and the weather depends on some controlling force that we are, as yet, not very well acquainted with. So it would seem that, as the old Romans would say, we are in the hands of the gods, and will have to take it for granted that they are doing the best they can for us, under the circumstances. They probably know that it wouldn't be good for us to have our barns 'filled with plenty' whether we earned it or not. The aim seems to be to get us to put forth our best efforts every year—to make it hard for us, in other words—without, at the same time, discouraging us altogether.



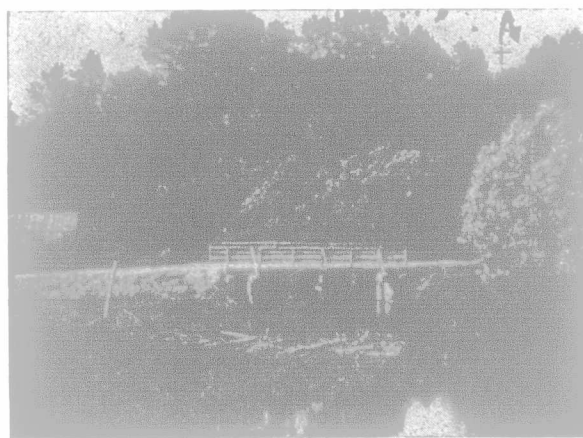
The Caddis Fly in Three Forms.

From left to right they are: Caddis-fly with its case; free larva (enlarged); and adult.

Apparently it is only under unusual circumstances that there is a good crop the country over. As in 1915, for instance, when all America had a record-breaker, and was able, in consequence, to keep Europe from starving.

We're not prophesying another world-war in the near future but the news of the crops that we have been reading for the past few weeks would indicate that, if it comes, we are going to be ready for it, so far as food supplies are concerned. It seems to be the same everywhere. All parts of the country are reaping a harvest "above the average," from California to Labrador. And no doubt the world will find a use for it. It will be interesting to watch and note whether or not the farms are undermanned to such an extent that they cannot reduce the cost of food, even in an "above the average" year. If they can't there are hard years coming.

Through this part of the country (that is to say, the most easterly part of Ontario and the adjoining



On the Lyn, near Simcoe, Ontario.

counties in Quebec) we are glad to say that the crops are well up to the standard that has been set almost everywhere else.

Hay was the first to be harvested and it disappointed the grumblers and calamity howlers. The greater part of the clover had been killed last winter and the early prospects weren't any too good. But a very fair crop of timothy was put in the barns, with fine weather prevailing most of the time.

On the whole it has been a pretty dry summer. And this fact, along with the lack of clover, made the pastures unusually poor. With a lower milk-yield from the cows, as a matter of course. The price of cheese and butter being about the same as a year ago it follows that farmers will have less money from this line of their business than formerly.

But the shortage may be made up on grain. Oats, barley and spring wheat are all turning out well, and there should be a surplus for sale. Last year the farmer who had enough of these grains for his own use was lucky. And the continued dry weather has made it

possible to get everything into the barns in the best of condition. To have grain of good quality fairly dry weather seems necessary; weather that is even too dry for hay or pastures.

Corn is a splendid crop again this year. Because of its ability to make use of all the rain that comes, by catching it on the leaves and running it down the stalk to the roots, it does its best in a year that is too dry for almost anything else. Silage will take the place of clover on the cow's bill-of-fare this winter.

It isn't likely that farmers will be buying seed potatoes at six dollars a bag, next spring, as was the fashion around here about five months ago. Potatoes have been doing well, with no sign of rot or other disease. Those who have been using rice and other substitutes during the shortage will be glad to get back to the "Murphies" again and leave rice to the Chinaman and other easily satisfied mortals who have never been affected by the high cost of living.

In a report of this kind the question of farm labor is generally touched upon. But it is hardly necessary, any more, to so much as mention the "hired man." We might use that expression we have all heard, and say "there ain't no such animal." Farmers are getting their work done some way or other, usually with the help of their wives or children and occasionally by exchanging time with a neighbor. The crops are put in and taken off, even if there isn't much done in the way of permanent improvements about the home.

In the majority of cases the farmer can't compete with the city when it comes to offering attractive wages, and, even if he could, I don't think he'd get the help. The class that used to work on the farm have found the city, and its ways, more to their liking than the quiet "movieless country."

Anyway, it's an undisputed fact that if you can't get the help you won't have to pay for it, which is no small consolation to the majority of us. There's compensation even in the lot of the Twentieth Century American farmer—All kinds of it, I think.

Nature's Diary.

BY A. BROOKER KLUGH, M. A.

When we look down into a clear "pool," particularly if it be a pool in a rapid stream, we may see many little cylindrical cases of sticks, small pebbles, sand, or leaves, and as we watch we notice that these cases are moving about. The cases are the homes of the Caddis-fly larva, and these larvae move about by projecting the head and legs from the case and crawling along, dragging their homes behind them.

There are many species of Caddis-flies in our waters, and each builds a characteristic style of case, but all are made by fastening pieces of material together with silk. Some make their houses of sticks laid longitudinally, some of little sticks laid cross-wise, some of bits of leaves, others of small pebbles or of sand. One species makes a cigar-shaped case of small strips of birch-bark, and another constructs a rectangular case of flat pieces of wood. One of our Caddis-flies *Helicopsyche borealis*, makes a spiral case of sand and very small pebbles.

The larval Caddis-fly is elongated and usually cylindrical, (See Fig. 2), the head and thorax being chitinated and hard, but the abdomen soft. It breathes by means of tracheal gills, which hang like little threads from the sides of the abdomen, the water being passed in and out of the case by the rhythmic movements of the body of the larva. At the posterior end of the abdomen are a pair of little hooklets by means of which the larva maintains its hold upon its case while crawling about.

Most species of Caddis-flies are vegetable feeders in the larval stage, but some are carnivorous. They live for several months and pass the winter in the larval stage.

When the larva is ready to pupate it withdraws wholly within the case and closes up the opening with a loose wall of material held together with silk. In many instances before pupation the cases are fastened with silk to submerged sticks or stones.

When the adult emerges it comes out of the case, crawls up on some support above the water, moults and flies away. The adults are two-winged insects with very long antennae ("feelers") and with the wings covered with fine hair-like scales. They do not fly about much during the day, but are active at night. They are really very abundant, but they are comparatively little known and most people take them for some kind of moth, and certainly do not associate them with the animated cases of our ponds and streams. The wings of the adult Caddis-fly when at rest are not held horizontally, like those of most species of moths, but are "roofed" as is also the case with some species of moths. The adults are obscurely colored, grays, browns and fawns predominating in their coloration.

The eggs of the Caddis-flies are laid in the water in gelatinous clusters. In some cases the female apparently crawls beneath the surface of the water to deposit her eggs, as they have been found on submerged objects.

We have a good many species of Caddis-flies, but just how many it is impossible to say, as up to the present this group has received comparatively little attention in Canada.

College professors complain of being under-paid, but Dr. A. A. Sachmatov, Professor of Russian Language at Petrograd, is said to have died of starvation. Here is an instance where far-away pastures do not look green.