small, faintly marked "L. helloides" represent L. epixanthe — a determination made 69 years later.

Lycaena helloides is a western species that inhabits drier areas. Its food plants are dock (Rumex sp.) and knotweed (Polygonum sp.) and it is multiple brooded and can be found from June through September. Purplish Copper, as it is commonly called, is somewhat larger than epixanthe (wingspan  $1\frac{1}{4}$  to  $1\frac{1}{2}$  inches) and it is quite a bit darker, especially on the under side where it is a dark rich orange instead of pale yellow.

The Dorcas Copper is intermediate in size between epixanthe and helloides (wingspan 1 to 1¼ inches). It is very similar in appearance to the other two except that the hind wing beneath is

a very dark, almost gray color. There is a single brood per year and in Manitoba it flies in early and mid-July. The food plant in New Brunswick is Shrubby Cinquefoil (Potentilla fruticosa L.), but it must be some other plant in Manitoba where the butterfly is most commonly found in marsh or grassy bog environments.

#### LITERATURE CITED

Bird, C. D. 1956. A collection of Rhopalocera from the Whiteshell Forest Reserve, Mani-toba. Lepidopterists' News, 10:107-108. Brodie, H. J. 1929. A preliminary list of the Lepidoptera of Manitoba. Trans. Royal Canadian Inst., 17:81-101.

Brooks, G. S. 1942. A checklist of the butter-flies of Manitoba. Canadian Ent., 74:31-36. Heath, E. F. 1899. Manitoba butterflies. Cana-

dian Ent., 31:95. Wallis, J. B. 1921. A colour key to the Manitoban butterflies. Nat. Hist. Soc. Manitoba

# Junior Naturalists

Edited by Joyce Deutscher, 7200 6th Ave., Regina

# **GOOD WORK JUNIORS**

Juniors have been busy writing newsy and interesting reports of their activities. Some of these are being held over for publication in the next newsletter.

Some of you may be still wondering what the newsletter is. One indignant young lady on being informed that her letter was published in the newsletter wrote back and said, "What newsletter?"

If you pick up your Blue Jay at the newsstand you may not be aware that for the same price you pay for four issues of the Blue Jay you can also get the Saskatchewan Natural History Society's newsletter and a membership in that society but you have to send your membership in to the society. The details are given on the back cover of each Blue Jay.

Letters from Juniors should be sent to Mrs. Joyce Deutscher, 7200 - 6th Ave., Regina for inclusion in the Junior Naturalist's Section.

#### **NATURE HOBBIES**

by Helene R. White

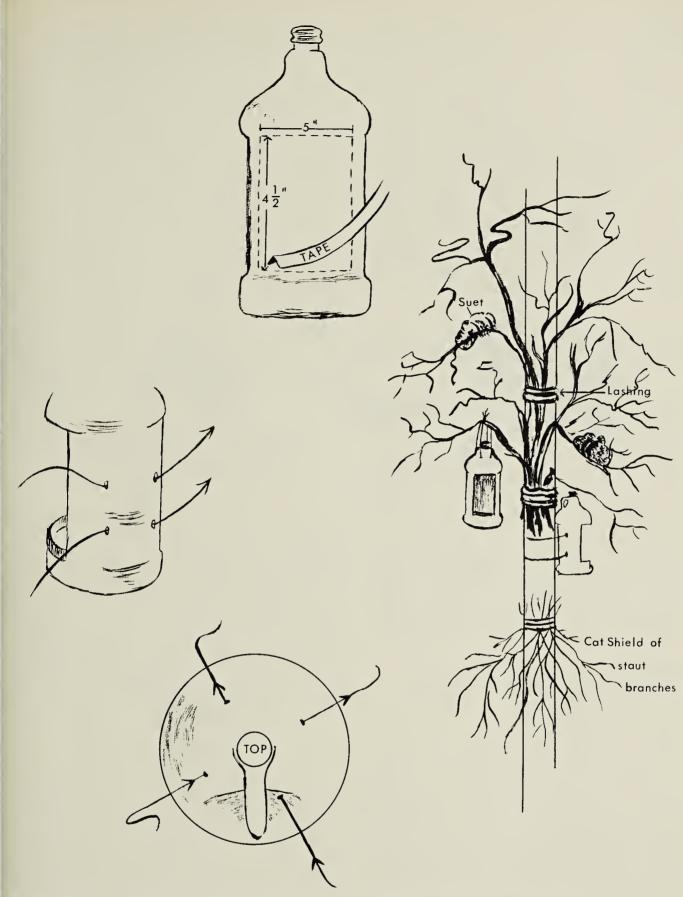
Note: This letter is a continuation of the one published in the newsletter wherein Mrs.

White tells about collecting goldenrod galls for hobby use. She promises more about this in a future letter.

Black-capped Chickadees followed me closely on this stroll along the banks of the wandering Waskesiu, for these little friends dine regularly at our homemade feeders in our garden. A simple feeder to construct merely requires a half gallon plastic bleach bottle, scissors, pencil, adhesive tape and some strong string or insulated wire. Thoroughly wash the container, keep the top and replace it, now take your pencil and mark the opening as shown. Holding the bottle under the hot water tap (heat makes cutting easier) cut this window out. Dry bottle thoroughly and place the adhesive tape over the sharp lower edge. The illustrations show you where to punch the holes for mounting. Thread the insulated wire or string through these holes.

Fill your feeder with commercial wild birdseed and a bit of bird gravel or sand for grit. Chickadees are very fond of chopped walnuts, uncooked and unsalted sunflower seeds peanuts.

Now decide where you want it, face



the opening south and preferably in a somewhat sheltered spot, away from wind and snow. Ours is hanging in a thicket of lilac bush but yours could be tied to a tree or post. Try to make the feeder safe from cats by adding a cat shield if you use a tree or post. If you lack trees and shrubbery for the birds to find shelter in, then haul home some large DEAD branches and tie them to the clothes line pole or other upright, add a cat

shield and you are all set.

Hang or lash your feeder out, tie some large pieces of suet to branches, no dangling string ends please, and you are ready for your visitors. If the feeder seems to swing in the wind too much tangle it in some branches.

A feeder for wild birds is a constant joy but do remember that once you start to feed the birds they depend upon you so you must keep the feeder well supplied ALWAYS.

## TEN BALD EAGLES AT FISH FEAST

by Maxine Johnson, age 12, Dore Lake

My father owns a mink ranch and every day he goes out fishing. A lot of the fish are left out on the lake and on the shores because they are not fit to feed to the mink. On April 22, at 7:30 p.m., my brother and I saw 10 Bald Eagles having a feast on the fish. I think there are Bald Eagles nesting within five miles of our home. There are also nests in the Sled Lake area.

#### MORE ABOUT BURROWING OWLS

by Richard Loewen, age 12, Dalmeny

One day while walking in the pasture, I came upon numerous badger holes. Out of one of these flew a brown bird about seven inches long and it appeared to be an owl. The hole, which I presumed was the nest hole, had plenty of debris such as manure, straw, and feathers. The hole went far underground. Upon reading the article in the last *Blue Jay*, "Burrowing Owls in North Dakota", I decided it must be a Burrowing Owl.

#### THE OWL NEST UPSETS

by Gayle Dayman, age 11, Windthorst

One day my father saw a Horned Owl's nest with two babies in it high in a tree. A few days later we went to see it. We couldn't find it because the tree had fallen over and caught in another tree. The nest was turned upside-down. Under it on the ground was a baby owl covered with white down and black pinfeathers showing through. Beside it was a baby owl's foot and wing. Probably one baby was killed and eaten. One of the parents was flying around while my father took a close-up picture. We would have liked to put the owl back up in the nest but it was too high up.

We wanted to keep it for a pet but Dad had one when he was a boy and said we would have to catch about 20 mice a day for it.

## FIRE DAMAGE TO NESTS

by Bryan Rothenburger, age 12, Radisson

Last spring it was very dry in this part of Saskatchewan. One day some men burned some dead grass. After the fire died down I went out to see what the nest damage was. By a log I found a Horned Lark's nest with the babies partly out of the shell. Of course the baby larks were roasted to death. Later on I found a nest of the Western Meadowlark containing eggs which were practically hard boiled. When I was going back I found a whole flock of blackbirds which had not escaped the fire. I guess there were many more birds and nests which were destroyed.

# BANK SWALLOW NESTS SLIDE INTO DIEFENBAKER LAKE

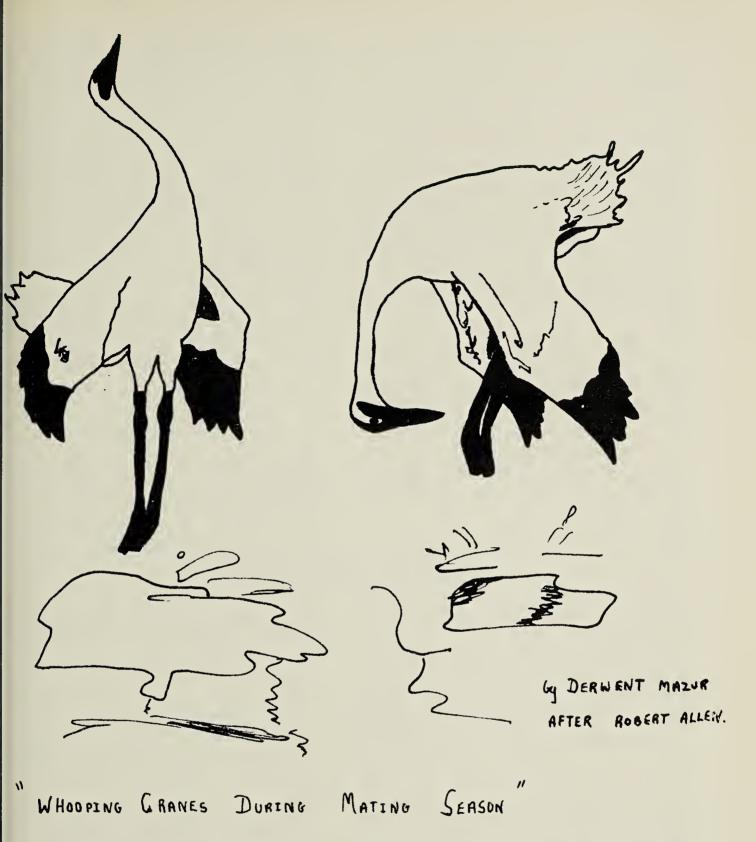
by Nicky Boon, Lucky Lake

On the east side of Diefenbaker Lake on the ferry route there are many Bank Swallow nests. One day while we were waiting for the ferry we counted 26 nests. Then a few days later the bank slid and destroyed about 22 nests. Some of the swallows have rebuilt nests once more. We hope they will have their young and they can fly before the bank slides again.

### "GOPHERS" AT PLAY

by Linda Nemeth, age 12, Yellow Creek

One day I saw a gopher come from its hole. It followed me until it met with another gopher. It started running after the other gopher. They ran after each other until they both got to a stone. One gopher went around one side of the stone and the other gopher went the other way. They scrapped until one gopher ran away. The other gopher ran after it. They chased after each other until my dog chased after them. It was so funny to see gophers running after each other. They ran until they got to their holes. Note: The "gopher" referred to here is probably the Richardson's Ground Squirrel.



#### WALKING ACROSS THE HILLS

by Rosemary Nemeth, age 12, Yellow Creek
One evening last spring we went to
seed the garden in the hills. After
we finished my Dad and I walked
across the hills.

On our way we heard and saw many things. We saw many different kinds of flowers. It was very exciting to hear Ruffed Grouse doing their mating dances. We saw deer tracks, fox tracks and coyote tracks. I found a girdled twig. We came to a gravel pit in which there were at least one hundred Bank Swallow nests. We found many old nests along the way.
It took us about two hours to walk home.

#### THE RUFFED GROUSE

by Audrey Zip, age 12, Yellow Creek

One day I was walking along a slough when I saw something brown sticking out of a snowbank. When I pulled it out it turned out to be a dead Ruffed Grouse. I wondered what the Grouse was doing in a snowbank. At school I found out that Ruffed Grouse dig themselves into snowbanks to protect themselves against winter storms.

#### SLATE-COLOURED JUNCO

by Joan Popiel, age 12, Yellow Creek

In the first week of March, I spotted a flock of juncos. There were 22 in the flock. They stayed till the snow fell.

Among the flock there was one Starling. I set out feeding trays for the juncos. When the Starling came to eat out of the tray, the juncos chased it away. A few days later I noticed two dead juncos. The Starling was trying to drag them away. There are only four Slate-coloured Juncos left.

I looked in different books to help me to identify the different kinds of birds. I got most of my help from the bird books in our classroom.

## **CLIFF SWALLOWS**

by Robert Kotyk, age 13, Yellow Creek

Last summer there were about 25 Cliff Swallow nests around our house. The nests were made of mud. The swallows carry the mud by their bill. The bird keeps putting the mud to make something like a ball with a hole in the top. It took the bird about one week to build the nest.

I broke one of the nests and found six eggs; the eggs were white with brown spots. Many nests fell down because of wet weather and foolish people. Some of the little birds that couldn't fly got killed. Cars ran over some and some got eaten by cats and dogs.

The Cliff Swallows need our help to stay alive. If you see cats or dogs in your yard you should chase them away. When you see a little Cliff Swallow on the road put it back into the nest. Don't break their nests!

#### PET CROWS

by Gaylene Mazur, age 10, Yellow Creek

Two summers ago Derwent brought home two baby crows. At first he fed the crows bread soaked in milk. The crows liked it.

We named the crows Jimmy and Blackie. As soon as they were able to fly, they were up to mischief. One time the crows chased a robin in the air. The robin would quickly turn to a side. The crows were bigger and clumsier. They couldn't take corners as easily.

We let the crows sleep out at night in the trees near our house. Every morning they were the first to awaken. They would caw until someone got tired of hearing them and fed them bread or cheese.

One morning we awakened to find one crow missing. We figured it was a hawk. A few days later Blackie disappeared. We suspected then that the hawk had killed both crows. Since then we have not had crows as pets.

## "DOG" STORIES

Several Juniors have written about members of the Family Canidae or dog family. Apart from the domestic dog, the family is represented in Saskatchewan by five members: the Red Fox, Swift Fox, Arctic Fox, Coyote and Gray Wolf.

Glen Wilchynshi from Yellow Creek followed some tracks to a brush pile and found a Red Fox.

"My dog started to chase it," adds Glen, "but the fox was too fast for it. The dog barked and the fox stopped and looked and kept on going. The fox came back. Our dog kept on chasing the fox but the fox was too fast."

Byron Lune didn't see any tracks but he heard howling and went towards the sound to investigate. "I saw two coyotes walking in a single file," says Byron. "The next day I saw only one. The dogs started to run after the coyote. The coyote stopped. I thought the coyote and the dog were going to fight. Then I called the dog back."

A well known Saskatchewan naturalist, R. D. Symons in his book "Many Trails" tells how one coyote found safety when being chased by hounds. "Hard pressed, he suddenly turned, ran and twisted his way through the hounds, and making straight for the truck leaped into the dog box!" The

hounds lost track of the coyote because it was overhead in the truck where they did not see it and they hunt mostly by sight.

Anyone else for dog stories?

# WHY NOT PLANT SOME BULBS THIS FALL?

At least one Junior has had success with a bulb planting project. Colette Isinger tells us, "On September 16, 1967 I planted some bulbs. I planted two daffodils, a hyacinth, and a tulip. I brought all of them into direct sunight on January 28, 1968.

"My daffodil started blooming on February 17. My hyacinth started blooming on February 16. It was burplish blue. The scent was nice."

These are all cultivated bulbs which colette is growing. Growing instructions usually come with these bulbs

when you buy them. Be sure to buy your bulbs from a well known nursery specializing in bulbs which are hardy in your area.

Do you know any native plants which grow from bulbs? The lily family (Liliaceae) has several members which grow from bulbs or bulblets. Perhaps the best known is the Western Red Lily, the flower emblem of Saskatchewan.

Some members of the lily family are poisonous. The Death Camas which grows from an onion-like bulb is one of them. Others have bulbs which are edible. I remember as a child how I used to eat wild onions at recess time and how wonderful it was being sent back out into the fresh spring air after the bell rang because classmates couldn't bear to sit near me. That's all for this time. Be seeing you in the Newsletter.

# The Blue Jay Bookshelf

OUTDOORSMAN'S FITNESS AND MEDICAL GUIDE. By Laurence lalton. 1966. Harper and Rowe, New York. 260 pp. Black-and-white illusrations.

For natural historians who may be prepared to watch the birds of Lake Athabasca, climb trees to band owls, r explore the wilderness and forests, his book is timely as it contains information on fitness and survival for he outdoor man. Methods of getting hysically fit for the rigours of field tudy are discussed, as well as assoiated problems of diet both before during trips. The system down-proofing" whereby a man can tay alive for hours in the water will e useful for the canoeist and those ho will be boating. Other chapters n survival in deserts, cold, and high lltitudes give the reader a wider nowledge of how to live comfortably while in the bush. The subject of first id for minor and serious injury is decribed and illusrated with excellent rawings, together with sage advice.

The style of the author is straightforward and concise, and makes easy reading. The illustrations make this book a worthwhile addition to personal bookshelves. It should be read thoroughly by anyone who is going to spend much time in the wilderness.—

Thomas White, Regina.

CANADIAN WILDLIFE SERVICE PROGRESS NOTES. Mimeo.  $8\frac{1}{2} \times 11$  sheets, punched for filing in three-ring binder. Canadian Wildlife Service, Ottawa.

The Canadian Wildlife Service's *Progress Notes* contain interim data and conclusions from studies being currently carried on by the Service in different parts of Canada. They are intended for circulation to wildlife biologists and other interested agencies who would like to know the present status of such studies without having to wait for final publication of results in journals and monographs. It is of course intended that the notes will appear in summary volumes from