

BLOMIDON NATURALISTS SOCIETY NEWSLETTER

Volume 2 No. 3

September, 1975

Coming Events

Mushrooms

October 11 9:00 a.m. Kentville Experimental Research Station Parking Lot - field trip into the Kentville Ravine under the leadership of Dr. Kenneth Harrison

Arctic

October 20 8:00 p.m. Wolfville High School Auditorium Dr. Graham Daborn and Cyril Coldwell will relate this past summer's adventures of the Acadia University Biology Department research team into the arctic. Slides will illustrate the talk.

Land Use

(November 17 8:00 p.m. Wolfville High School Auditorium Mr. Fred Payne will give a talk on Systems Approach to Land Use.)

Annual Christmas Bird Count

December. Coordinated in Nova Scotia by the Nova Scotia Bird Society. If you are interested in helping out with the Wolfville Count please contact Rachael Erskine at 542-2388 (meal times are best) before December 10 for further details, or Oscar Morehouse at 542-5322.

All meetings and field trips are open to the public, and we encourage members to bring along friends and neighbours who are interested in natural history.

ACKNOWLEDGEMENTS

We want to thank Richard Elliot, Sherman Williams, Fred Payne, Sherman Bleakney, and Roy Bishop for their able leadership on recent field trips; also to Dr. Kenneth Harrison for the interesting lecture and display of mushrooms which began our 1975-76 lecture series (very well attended-approximately 70! and enjoyed by all); and to all those persons who wrote articles for this newsletter or otherwise assisted in its production.

DEADLINE for NEXT BNS NEWSLETTER

!December 21, 1975!

Please send your contributions to Roy L. Bishop, Avonport, N.S., or Mrs. John W. Timpa, Box 1382, Wolfville, N.S. Think Now! Write Now!
Don't Let Christmas Be Your Excuse!

Birdsnesting

Rachael Erskine

The mention of birdsnesting is apt to suggest the senseless collecting of birds eggs by thoughtless people, who often frighten the parent birds, while some of the eggs collected are broken by inexperienced attempts to blow them.

However, a more rewarding form of birdsnesting exists in the finding of nests, and then observing the whole process of egg-laying, incubation, hatching, and the successful climax when the young birds fly from the nest.

We have among us a most successful birdsnester of this type in Bernard Forsythe of Wolfville Ridge. This has been his first year of keeping cards for the Nest Record scheme, which the Canadian Wildlife Service has organized over the past 15 years, but he has watched birds and nests over a number of years.

This year he found 55 nests, all but 4 in his home area, and comprising 27 species, from game birds to tiny warblers. Of the nests not found near home, one, that of a Mallard Duck was in New Minas, and the other 3 in the Black River area. Of the nests found, 30 brought off their families successfully and the other 25 failed for one reason or another.

The eggs of Brown-headed Cowbirds were found in several nests, and in two cases two dissimilar Cowbird eggs were found in the same nest, suggesting they had been laid by different birds.

Sometimes a nest is discovered quite accidentally, as in the case of a pheasant, which sat so tight while preparations for felling a tree within a few yards of its nest were made, that it was only when it finally flew off that the nest was seen. This intrepid bird afterwards returned to the nest and brought off her chicks without mishap.

Last year the Forsythes found a Killdeer nest in the middle of a rather muddy field which they were about to plough and seed. They decided to wait till the eggs were hatched, but this species has a very long incubation period, and the passing of time became a matter of concern. However the eggs finally hatched and two days later the family moved into more sheltered terrain. This year a nest was found in the same area, and when manure was spread, the nest was carefully avoided. However a clod of manure accidentally fell onto the nest. The tractor was stopped, and the driver returned to remove it, but by the time he reached the nest Mrs. Killdeer was doing her own clean-up job!

Another amusing episode arose when a Yellowthroat nested in a raspberry patch near the Forsythes' house. One day after the eggs had hatched, it was noticed that the nest was tilted perilously and likely to fall out of the canes entirely. While the parent birds were away in search of food, the nest was wedged more firmly into position, and the brood was reared safely and flew off in due course.

An unusual incident concerned the nest of a White-throated Sparrow, found on June 1st with 4 eggs in it. Between that date and June 16th it was visited at least 4 times and on each occasion the male bird was incubating. A few days later the nest was seen with no adult birds near and the eggs quite cold. As the incubation period for this species is only 14 days, the whole behaviour pattern seems very odd.

There is a sad story of a Cedar Waxwing's nest found on July 1st with five eggs in it. When visited again on the 11th only 2 eggs remained, and on the 16th only the broken shells of the two remaining eggs were left near the nest.

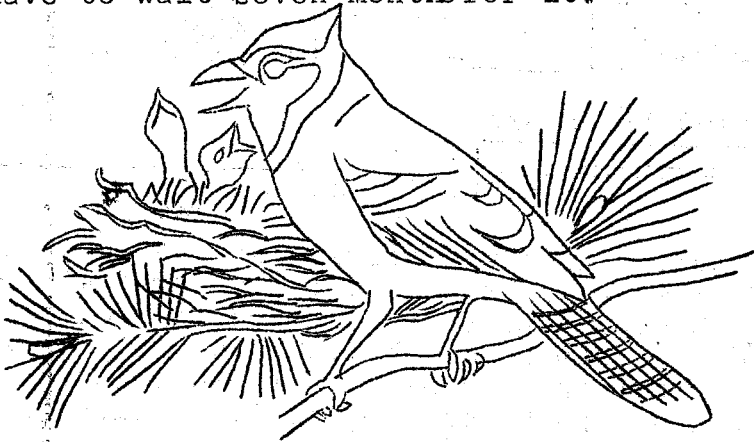
Blue Jays had visited Bernard's feeding station all winter and in spring two were noticed carrying nest material. Soon they had made a nest in a spruce tree right by the side of Ridge Road, and presently the chicks hatched. The parent birds continued to come to the feeder, but by now robins had arrived and contested the Jays' rights. When the Robin broods hatched the Robins completely drove off the Jays! Eleven Robin nests were found with about a fifty-fifty success rate. Bernard's little girl, anxious to help the birds housekeeping, had put out the shredded coloured paper from her Easter basket. Later in the season some of this was found in an abandoned Robin's nest.

A Chestnut-sided Warbler was also willing to be helped with nest material. A piece of cotton batt had been put outdoors, and birds carried off pieces, and these were seen woven into the outside of the nest, which was within 50 yards of the house.

Three Song Sparrows nests were found early in June, all with nestlings in them, and just before about three days of rather cold heavy rain. When visited after it was fine again, all the young birds in all three nests were found dead, presumably from exposure, as all the nests were undisturbed.

A Veery's nest was found in a rather obvious place on a bough of a fallen spruce tree. Bernard wished to make a more positive identification, so visited the nest area next day when the female was incubating. All seemed to be well, but when he went to the nest a few days later it was empty and abandoned. However Veerys continued to sing all summer, so it is hoped that a successful, if unfound, nest was made nearby, in a safer spot.

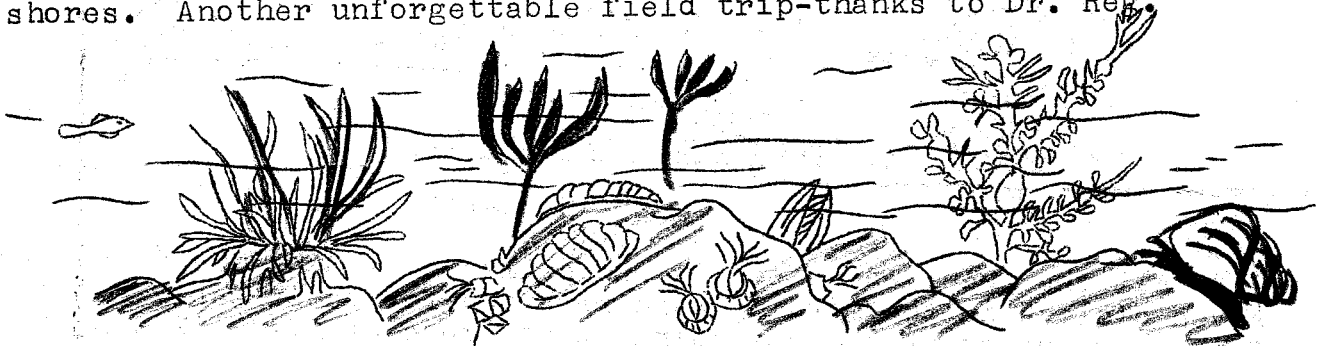
And there is always the species whose nest you didn't find. In Bernard's case this was a Mourning Warbler which sang and sang in the same area day after day, but he never found the nest. Maybe next year they will come back, and he will have better luck. There's always something to look forward to in the birdsnesting search even if you have to wait seven months for it.



The Fossil Pickers

Oscar Morehouse

Through the mists of the morning of June 7, Dr. Reginald Moore led a party of 18 into the Windsor deposition basin, and, through the mists of time, down more than three hundred million years, to walk in the sediments of a shallow Paleozoic sea. To stoop and pluck from out the silt these little creatures time had turned to stone: brachiopods—"the fairy shrimps," corals, clams, and the crinoids, often called, because of their beautiful form, "the lilies of the sea." To pause and ponder was to become a little more aware of the meaning of "genesis." Then one visualizes the slow migration of some of those marine animals to the shelter of the fronds on the greening ancient shores. Another unforgettable field trip—thanks to Dr. Reg.



Black Rock Rocks

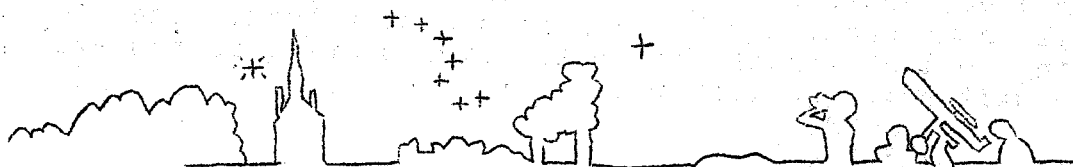
Roy L. Bishop

Early on Sunday morning, August 10, eight souls were off to Black Rock to look for forms of life near the low tide line. Both the phase and distance of the Moon had cooperated to produce unusually low tides that day, and the Black Rock rock provides one of the few habitats along the exposed Fundy shore where many fragile life forms can thrive. This trip promised to be especially interesting since we had as our able guide Dr. Sherman Bleakney.

The richest locations for all sorts of weird fellow creatures

proved to be beneath rocks. A list is probably the simplest and most effective way to inform others of what they missed by staying in their warm beds that morning: common star fish, blood star fish, hermit crabs (many!), green crabs, limpets, moon snails, moon snail egg crescents, dog whelks, dog whelk egg "trees", barnacles, periwinkles, worms (flat, sandy, and with fuzzy heads), shrimp, unidentified small fish, sea slugs (three varieties), seaweed, kelp, coralline algae, sulfur sponge, jellyfish, lumpfish, angler fish, pollock, sea anemone, chitons, amphipods, water and rocks.

One impression that I carried away was a deeper appreciation of the incredible richness and variety of life in even relatively hostile environments. It is a rare treat to be in the company of someone who knows where and how to look and, of course, what it is that one is looking at.

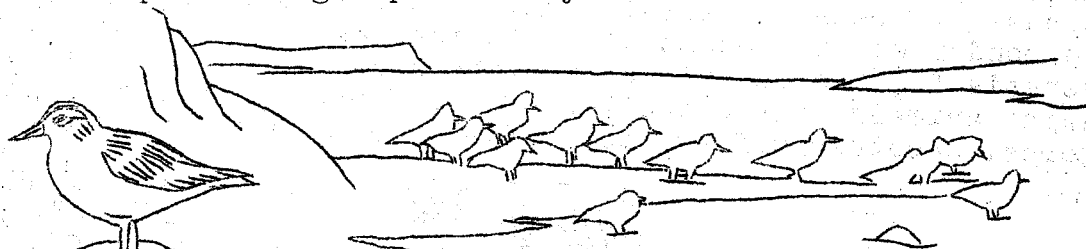


Grand Pre Stars

Roy L. Bishop

Shortly after the Wolfville area was carried around away from the Sun on August 11, about 23 members of the Society gathered at Grand Pre Park for a field trip through a portion of the Universe. As an added bonus, the richest meteor shower of the year was in progress, but, although not very plentiful that evening, we were able to catch glimpses of a few of these rocks as they collided with the atmosphere.

As an orange crescent Moon dropped in the western sky, yours truly gave a brief tour from the immediate surroundings outward through the solar system, the nearest stars, the Milky Way galaxy, and onward through intergalactic space. The various distances involved were expressed in terms of the travel time of light. Two telescopes and several pairs of binoculars were on hand to view various objects such as comet 1975h, star clusters, the Milky Way, and the Andromeda galaxy. Several prominent stars and constellation patterns were pointed out. The hazy air dimmed the stars somewhat but kept the night pleasantly warm.



August 16 Grand Pre Shorebird Trip

Richard D. Elliot

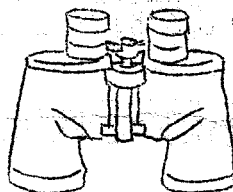
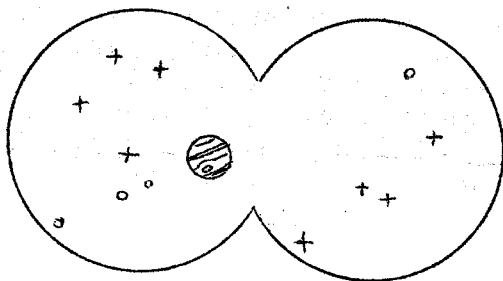
All the twenty-nine people who collected at the Grand Pre park at seven o'clock in the morning were rewarded for their early rising by a fine show put on by the shorebirds that pause at Evangeline Beach to feed and rest on their southbound journey. We first visited the beach itself and saw several hundred semipalmated sandpiper and semipalmated plover which were being pushed up the beach by the incoming tide. Then we headed south into the fields of Grand Pre, where large flocks of several shorebird species were roosting, sleeping while the high tide covered the mudflats they feed on.

In the plowed fields, we found 400 black-bellied plover, close to fifty dowitchers and seven large Hudsonian godwit with their characteristic upturned bills. We also had good views of the brightly patterned ruddy turnstones, although some of us were not as lucky in trying to pick out the two koots in the middle of the flock.

After a brief look at semipalmated plover and sandpiper in a plowed field close to the main GrandPre road, we returned to Evangeline Beach as the tide began to retreat. Here we found several thousand semipalmated sandpiper, huddled in tight flocks on the shore, or flashing alternately brown and white as they flew erratically over the water. We walked slowly east down the beach and saw many shorebirds very well in the bright sun, including black-bellied plover, short-billed dowitcher, hudsonian godwit, 3 sanderlings, a greater yellowlegs, white-rumped sandpiper, and three koots which were well seen by all. Although we were looking for shorebirds, we saw a wide range of other birds as well, including black ducks, a family of pheasants, a marsh hawk and a white-winged scoter.

We were glad to welcome seven members of the Nova Scotia Bird Society who joined us on this field trip, which from the point of view of the fine birds seen, and the keen people who came along, was a very successful outing.

OCTOBER						
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12	13	14	15	16	17	18
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26	27	28	29	30	31	



ASTRONOMICAL CALENDAR FALL 1975

Roy L. Bishop

Equinox The equatorial plane of Earth passes north of the Sun on September 23 at 12:55 pm, marking the beginning of autumn in the Northern Hemisphere. This is also known as the autumnal equinox since around this date the nights (nox) are of equal (equi) length (12 hours) for all locations on Earth. Note that the first full day of fall is not until September 24 this year.

A Race We Lost The second planet, Venus, which decorated the western evening sky during the first half of the year has caught up to and passed the third planet, Earth. As Kepler pointed out in 1619, the closer (R) a planet is to the Sun, the shorter is its year (T), T^2 being proportional to R^3 . Since Venus is ahead of us now, we have to wait until the Wolfville area is facing in the direction of Earth's orbital motion in order to see it. In more prosaic terms, if you wish to see brilliant Venus, you will have to crawl out of bed before dawn for it is now the morning "star". It dominates the eastern sky for two or three hours before sunrise.

A Race We Will Win Mars, being the fourth planet from the Sun, cannot keep up to our rocky sphere, the third planet. In September and early October Mars comes into view in the eastern sky around midnight; however, it will appear earlier in the evening and become brighter as we catch up to it on our inside track. In mid-December we will silently glide past Mars and leave it behind. As we pass by a mere 85 million kilometers away, Mars will come into view at supper hour and hang like a bright red Christmas tree ornament in the Yuletide nights. As you gaze at Mars this winter, also remember that somewhere out there in the space that yawns between are two sophisticated creations of man on a mission of great significance to mankind. These are the Viking spaceprobes which are designed to land on Mars next year and perform three separate experiments in our first attempt to detect signs of life on another planet.

A Giant We Can Beat You may have already noticed the bright, slightly yellowish, steady, star-like object that appears in the eastern sky shortly after sunset. This is Jupiter, named after the king of the gods and the only planet of significant size in the solar system. However, despite being over 300 times more massive than our little planet, Jupiter is the fifth planet from the Sun and hence, as Kepler pointed out, it must revolve more slowly than even Mars about the central star. During October we will zip ahead of this giant who will gaze balefully down on us all through the night.

This One Runs Circles Around Us Our Moon flits around Earth about once a month casting its spell on lovers and tides. When opposite the Sun we view its illuminated half face-on and we say in our quaint way that "the Moon is full". However, on Tuesday, November 18 on its regular swing behind Earth, the Moon passes directly through Earth's shadow (Usually it passes north or south of it). When we swing into view about 4:45 pm that evening, the Moon will be already partly in the shadow. It will be completely eclipsed from 6:03 pm to 6:44 p.m. If it is clear that supper hour, put down your fork and grab your binoculars for it will be several years before this sublime sight will grace our skies again.

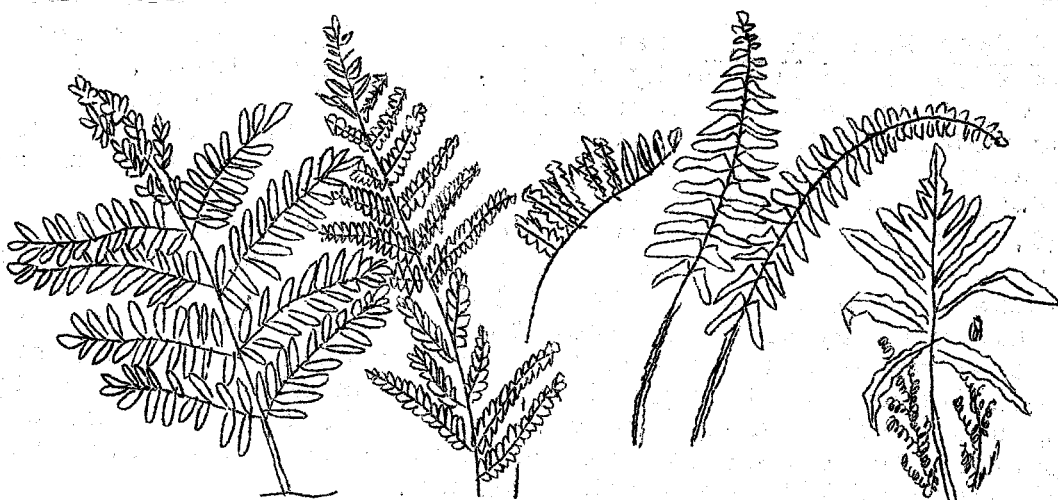
Cancelled

Due to last minute, unavoidable circumstances, the scheduled field trip on July 12 "Aquatic Worlds" had to be cancelled.

Nature Lore Field Trip - July 26

Larry Bogan

Four of us joined Sherman Williams, to walk through the wet, lush woods on top of Cape Blomidon. We followed part of a new trail which is being developed in the Provincial Park. Along this trail we tasted the hot wild leek, the bark of the sweet birch, and the pleasant spearmint leaves. We identified many ferns, fungi, and wildflowers. The rain the night before had brought out many mushrooms. I remember the many old yellow birch trees that had a dark, rough bark not seen on young trees. At several places along the trail we got scenic views over the Minas Basin. An "always-wet" pond had dried up completely due to the lack of rain during the early summer, and wet-area plants had taken over the whole area. Unfortunately there was very little bird activity that day, but the variety of plants compensated adequately.



ROYAL INTERUPTED CHRISTMAS SENSITIVE

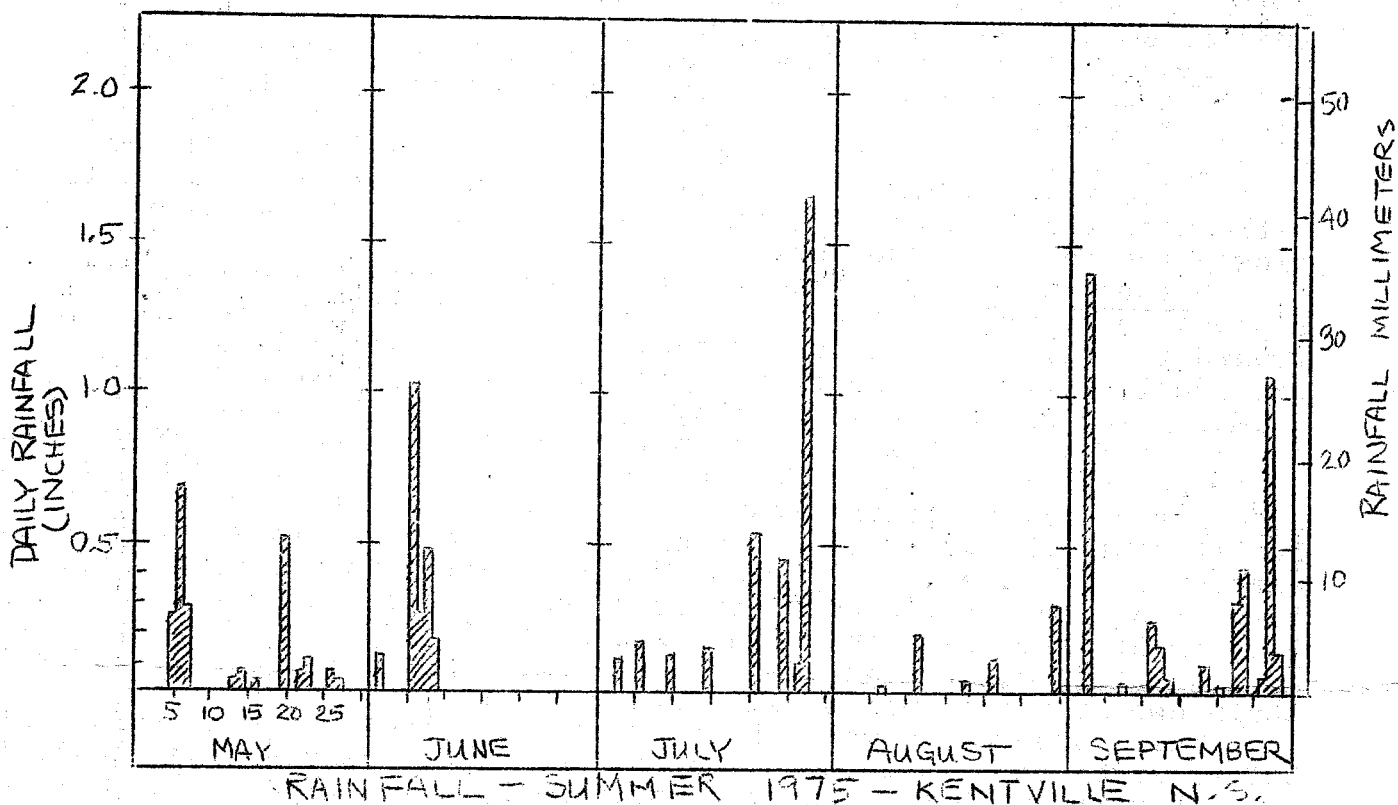
Weather - Summer 1975

Larry Bogan

Almost every season and year has its peculiarities and this summer was no exception. Usually a season is wetter, dryer, hotter colder, sunnier, cloudier, longer or shorter than average. My recollection is that this summer was dryer and hotter than usual. Well, I decided to reinforce my feelings with hard data.

The Kentville CDA Reserach Station keeps records of its daily measurements of maximum temperature, minimum temperature, rainfall, hours of bright sunshine, evaporation, snowfall, and degree days. They also receive records from other weather observers. I called the Research Station to get the story on May through September weather. Mr. McKenzie gave me what I needed and also informed me that monthly summaries are widely distributed, and that Vaugh Library at Acadia University received copies. With those records on hand and a copy of the Canada Department of Agriculture publication 1092 "Summary of Weather Records" Research Station Kentville, N.S. 1914-1958 (Supplemented to 1966) I discovered the following facts.

The summer was drier than the fifty year average (FYA)(1914-1964) but was only very slightly warmer. I was suprised to find that the month of June, which I remember as being very dry, had a total rainfall of 2.04 inches only 0.84 inches less than average. The daily rainfall plot given below shows that we are both right; in the period from June 10 to July 20 only 0.64" fell while the FYA indicates that it should be more like 3.7 inches. There was no rain in the 22 days between June 10 and July 2. In addition, August was dry with only 0.72 inches total.



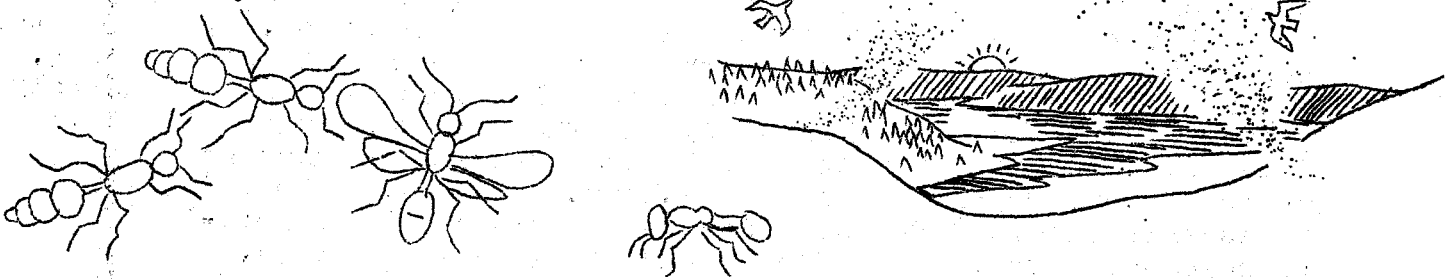
There were four days during the five months with rainfalls of more than an inch, usually associated with a tropical storm moving up the Atlantic Coast. These four days account for 5.13 inches (41%) of rain out of the total of 12.42 inches that fell in this period. Difficulties occurred more from the uneven distribution of rainfall than from the lack of rain. The total rainfall was 19% lower than the FYA.

There were 27 rainfall periods this summer. If the total rainfall were distributed evenly we would get a nice 1/2 inch fall about every five or six days.

What about the rest of the weather data for the summer? Well, the total bright sunshine was down by 5% from average mostly because May and September were less sunny. Surprisingly the driest month of

of August had below average sunshine; obviously we were visited by some useless clouds.

I could go into more detail but the overall impressions are adequate. We complain when we get unusual weather, but if it were always average we might have something to say also. I'll make one complaint, that unusually cold May of 1974 which dropped snow on my planted garden on the 28th caused me to plant in early June this year and miss the one rain period of that month. My garden did not come up so I had to replant in July which gave a good crop but late. Fortunately we have not had a frost yet and its October; maybe it will be an unusually warm fall.



Flight of the Flying Ants

Edgar B. McKay

Time: Usually sometime between August 18 and 24, in the late afternoon or early evening hours. The sun is a glaring, golden ball low in the western sky, the heat is heavy on the air, and has been for three or four of the preceding days. There is no wind, only an almost imperceptible movement of air from the northwest in the valley and over the hills. The time of maximum observation seems to be from seven o'clock until sundown.

Place: Bear River, Nova Scotia, especially looking from the hills on the Annapolis side of the valley toward the Digby County side. In order to enjoy the full view of the phenomena the observer must look in the general direction of the west - through the more or less conical whorls of each mass of flying ants with the sunlight reflecting from wings and glossy, black bodies drifting upward and slowly toward the southwest.

Observations: The observer may first become aware that something unusual in nature is happening by glancing into the northwest sky - toward the mouth of the Bear River. There he will see, if conditions are ideal, fifty to a hundred nighthawks diving, whirling, gliding, climbing and diving again as they come closer to the village. At a lower level and sometimes even in larger numbers swallows swoop with their own peculiar flight feeding patterns. The observer then looks across the valleys to the west and sees there the rising, whirling sunlit ant clouds - thousands of them, each one with its thousands of airbourne creatures. They rise from the valley bottom both within the town along the river's edge and from the high fields above. At times they create the illusion of the fields smoking. They are in the air by the millions, and nighthawks and swallows gorge themselves before their own migration which will follow shortly.

This observer knows nothing of the life cycle of the flying ant, but presumes there are those who do. He does, however, enjoy watching it each year and has one or two photographs taken with a 200 mm lens that give some feeling of the display. And he has observed on fishing trips in late August or even in early September that for a few days the surface of the lakes would be covered with the bodies of the flying ants. Trout would be splashing all over the calm surface of the lake. The fisherman might use flies closely resembling the flying ants. Only rarely would a trout be deceived by the imitation. Most of them were gorging themselves, like their feathered friends - swallows and nighthawks, for the long winter months to come.

\$ DUES!\$

During our last fiscal year (September 1974- September 1975) we had a very encouraging number of people (95!) join the B.N.S. Dues at our last business meeting in September were once again set at \$2.00/person, and already 28 individuals have joined or re-joined our ranks. We hope the rest of you will send this small amount which covers the notices of meetings and field trips, and the Newsletter to Larry Bogan as soon as possible. Notices and Newsletters will not be sent after December to those who do not pay!

USE THIS HANDY FORM NOW!

Mr. Larry Bogan
Secretary-Treasurer
Blomidon Naturalists Society
Box 753
Wolfville, Nova Scotia

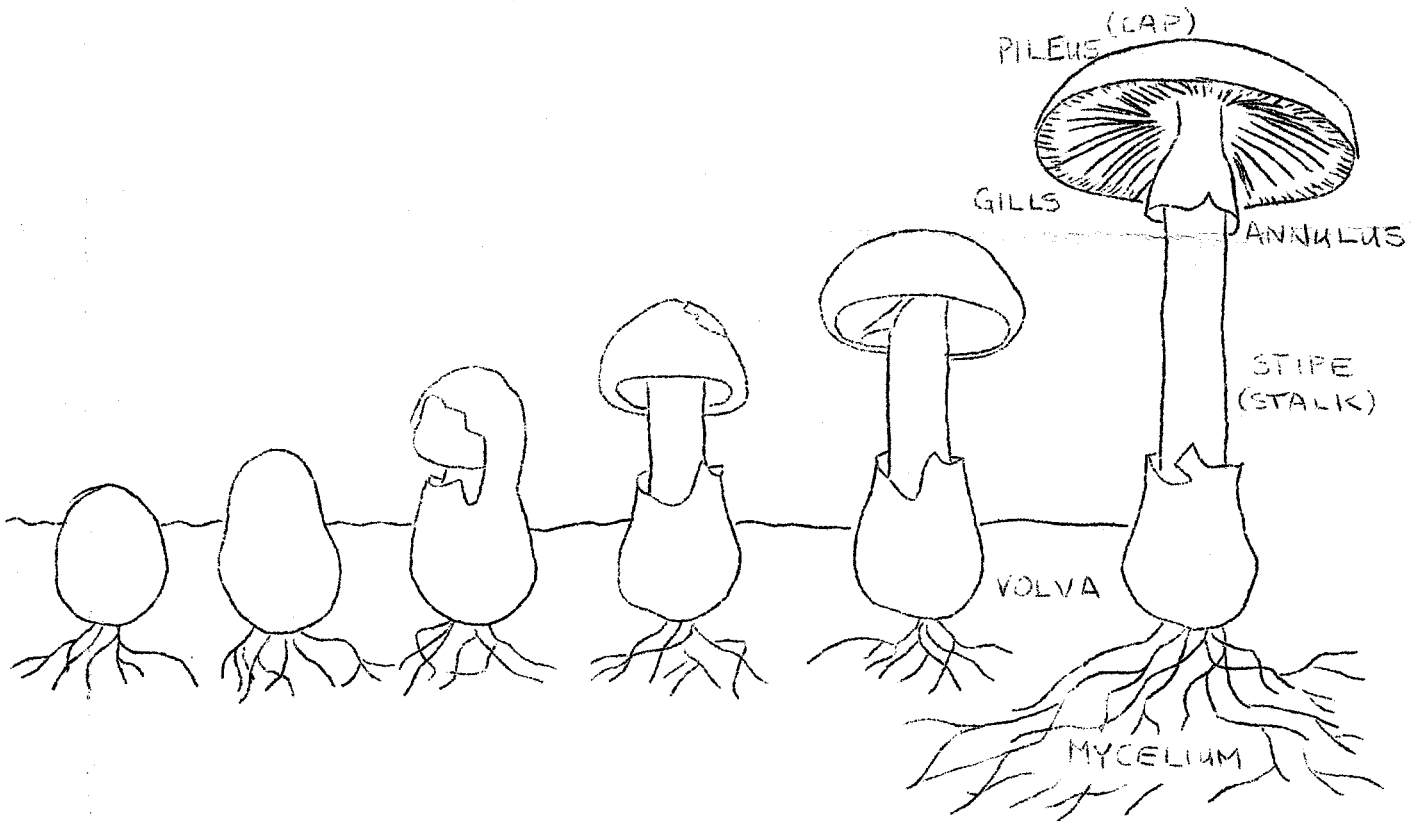
Dear Mr. Bogan:

Please find enclosed \$2.00 as dues for the 1975-76 year for the Blomidon Naturalists Society.

Signature(Please Print Clearly!) _____

Mailing Address: _____

Phone Number: _____



The Story of Killey

The American Sparrow Hawk (now known in scientific circles as American Kestrel) a bird slightly larger than a Robin, is the smallest of the four falcons which occur in Nova Scotia. Said to be the fastest fliers in the avian world they are noted and loved by many for their grace and prowess.

Late in the afternoon of July 10 I was presented with a young Sparrow Hawk. It had been found squatting on the floor of a barn in the Berwick area about noon of the day before.

When an entrance is available high up in the structure of a barn little youngster had apparently fallen from one. The pattern of its plumage indicated it was a female and although it was almost fully feathered it was sporting a very brief bob-tail and its head showed considerable natal down protruding.

Her benefactor mentioned that he had been unable to induce her to eat and marvelled that she was still alive after a fast of approximately 30 hours. He seemed quite relieved when I said I would do what I could for the little waif.

The food of Sparrow Hawks is varied, ranging from mice, small birds, small snakes and larger insects such as grasshoppers and crickets. That the bird was not near death from starvation was obvious from the ferocity with which she struck at me with her talons when given the opportunity. I placed her in my so-called "bird hospital" - a large airy wired enclosure in the cellar of my house and with little delay presented her with the still warm remains of an English Sparrow the feathers of which I had partially plucked in order to make the offering more palatable. But ravenous as she must have been, the food was spurned and was still untouched when I left her for the night. This was not wholly surprising, however, for the bird was still in a state of what might be called 'fear paralysis'. When I visited her early the following morning it was most gratifying to find that all that was left of the sparrow was its beak, legs and some of the flight feathers.

In my field experiences which cover many years, I have noted that the call of a Sparrow Hawk appears to be limited to a high-pitched series of shrill killey - killey - killey sounds, quickly repeated three or four times. This little creature angrily gave this call when being transferred to the enclosure. Because of this cry she was quickly dubbed "Killey".

During the days which followed I spent considerable time in or about the enclosure and was pleased to note a gradual change in her behaviour. For now, instead of bristling up her feathers when I approached, she not only remained calm but consented to perch on my hand at times when food was proffered.

Within ten days or so Killey's tail had grown to full length and by then she was making short flights from perch to perch within the cage. Soon it would be time to consider her release. When freed she must be strong enough to pursue and to kill if she were to survive. I watched her development and general behaviour closely during the last few days and by July 25 decided to let her go. It was a fine day with a strong westerly wind. Placing her in a small carrying-cage I proceeded to the Wolfville Ridge, a stretch of high ground overlooking the picturesque Gaspereau Valley. The cage was placed on the ground with the entrance door wide open. I retreated a few yards and waited for the action I knew was soon to follow. A moment later Killey emerged and deftly hopped to the top of the cage and faced into the wind. She shook herself vigorously and nodded her head a few times. This head-nodding is typically characteristic of all falcons and nobody seems to know why they do it. For a long moment she perched there. It was as though she realized the great moment had arrived and hesitated for fear that she would be unable to cope. Then suddenly, as though acting on impulse she raised her sharply-pointed wings and lifted, only to be blown sideways momentarily. I fully expected to see her land in the tall grass near-by. But my suspense was short-lived. She struggled a moment until gaining control was seen quickly to rise a 100 feet or more directly overhead. There she hovered, the tips of her wings quivering in true falcon style. Then, as though caught off-guard and out of control she was carried away in a wide arc for 200 yards or more and I thought she was gone. But again she mastered the situation and slowly began to beat her way back finally reaching a point directly above where I was standing.

And as I watched with mixed feelings of anxiety and admiration it seemed to me as though she were looking down enquiringly and in fancy - asking me "how am I doing?" Her control was marvellous and I wondered at the strength she had so quickly acquired in those breast muscles, flabby from disuse as they must have been, to enable her to buffet the gale so masterfully as she was doing. Higher and higher she ascended and was last seen when caught in another wide sweep and carried beyond the range of my vision.

R. W. Tufts