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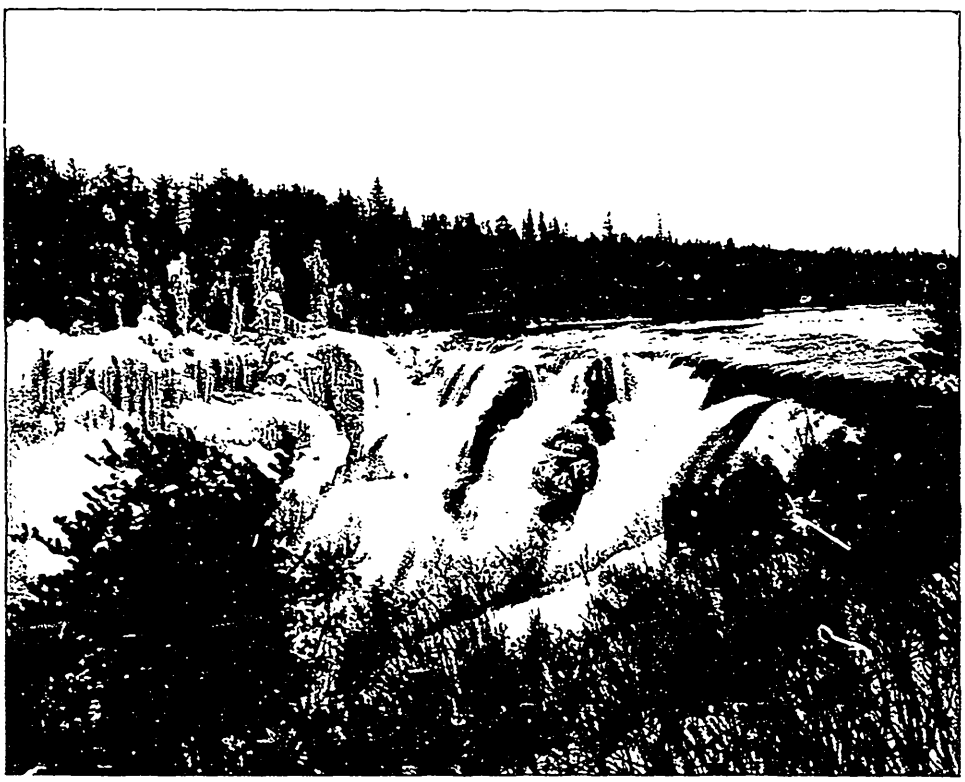
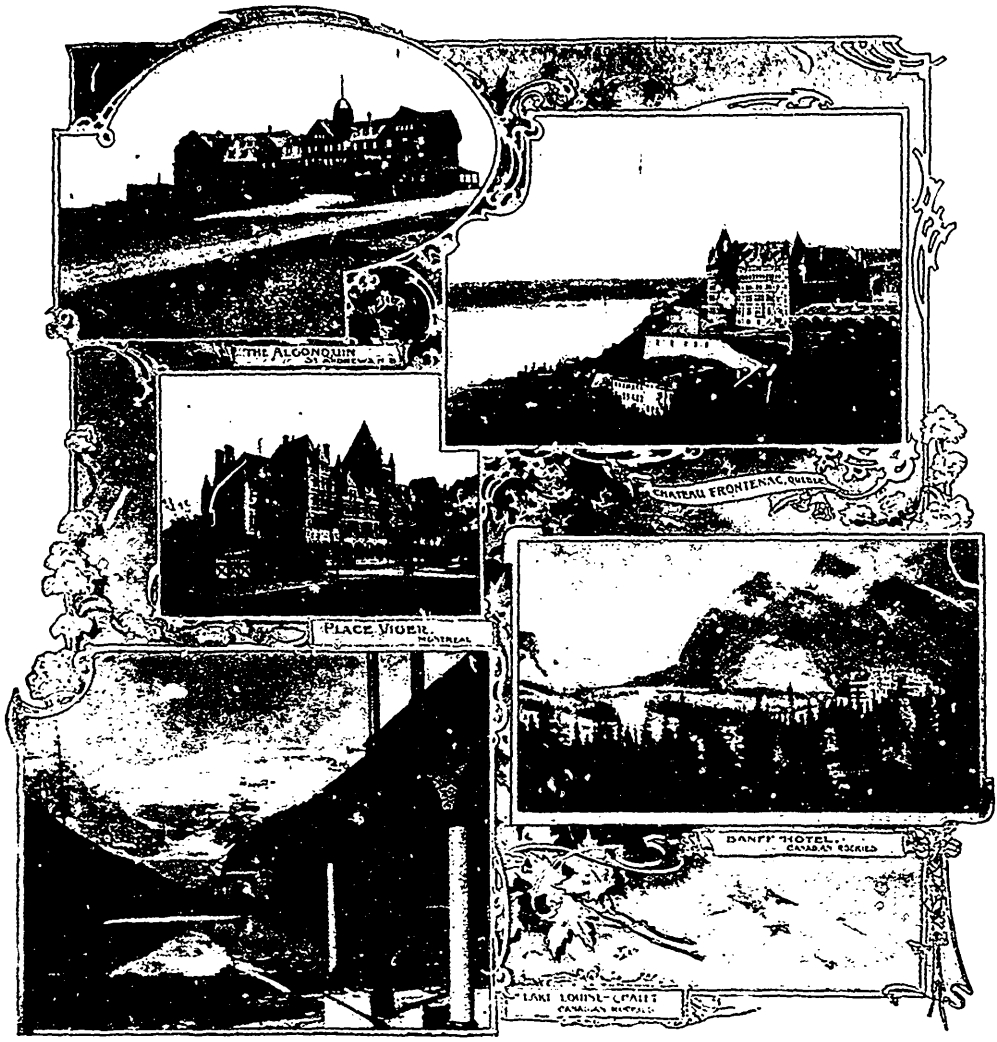
ROD AND GUN IN CANADA



Kakabeka Falls

A MAGAZINE OF CANADIAN SPORT AND EXPLORATION

Canadian Pacific Railway



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ON THE MISSISSAUGA.

Mr. Geo. C. Cotton's Party at the H.B.C. Post, Upper Green Lake

ROD AND GUN
IN CANADA

VOL. V. MONTREAL AND TORONTO, FEBRUARY, 1904 No. 9

Mississauga

BY GEO. G. COTTON

In August last we made a trip to the far-famed Mississauga River in the Province of Ontario, starting from Biscotasing on the "Main Line" of the Canadian Pacific Railway on the morning of the 19th.

The party consisted of Mr. L. O. Armstrong, of Hiawatha Indian play fame; J. S. C. Bennett, photographer; my son Donald and myself. Our guides were Wm. Harris, Jr., an Englishman of Day Mills, rather small, but quick and energetic and quite a character; George Linklater, a "breed" of Desbarats, and an ex-factor of the "Company of Gentlemen Adventurers", of medium height, broad and solid, thews of steel, the best canoe man and packer in that region and an expert paddler, born at Moose Factory on James Bay, the southern part of James Bay. At the age of thirteen he began his apprenticeship to the Hudson's Bay Company as a boat builder. He had been factor at the Green Lake Post for many years, which post was situated in the heart of the Mississauga country, thus he was fully posted as to the river. Last, but not least a French-Canadian halfbreed Indian, Aleck Longevin, six feet four and one-half inches tall, a giant in proportions and taciturn as they are made.

The three canoes purchased from the Hudson's Bay Company by Mr. Armstrong were loaded as follows: Bennett and his photographic outfit, the camp stove and a bag of pork were entrusted to Harris in one, Don, boxes of provisions and one of the tents were consigned to Linklater in the second. Mr. Armstrong, the writer (no light-weight,) the balance of the provisions, two tents and our two personal packs to Old Aleck in the third. Each canoe had an axe, at the start, but later on—though as Rudyard Kipling says, "But that is another story" not to be told here.

Donald had his shotgun and revolver, and I my inseperable Winchester .30-.30.

After the canoes had been thoroughly inspected and discussed, we gathered our traps to make a start, "our Store Clothes" being shipped to Blind River station on the Soo branch, to await our journey's end.

Mr. Shannon, who is taking out pine on Ramsay Lake, offered the service of his gasoline launch "Helene" to take us over the Biscotasing Lakes, and we accepted. We piled in the duffle, placing the canoes on the "deck" and were off. The ride up the Lake was delightful; the day was beautiful, not a cloud in the blue sky; the breeze was cool and filled with odors of the forest; the lake had scarcely a ripple, excepting those made by our ship's prow. It was not to be wondered at, that after a "short" night in a sleeper and an unceremonious landing at a wayside station at four a. m., that the most of the party suc-

cumbed to the drowsy god, and did not awaken until the cessation of the throbbing of the propeller foretold that the landing was near. We were much surprised at the excited tone of the erstwhile captain to the new Indian engineer (his trial trip) to "get under way and give him steerage." We found that in the short channel between the Biscotasing Lakes, there was an abrupt turn and swift current and unless the current was entered at a certain point, the boat would be thrown to one side or the other against the rocks, and it would have to drop down and then try again. This had proven true in our case. On the second trial we had better fortune and succeeded in making the passage. The upper lake is also beautiful, but the forests have been devastated by fire, and the blackened trunks are in view wherever you turn. We reached the head of the lake and landed. A short portage of about one-eighth of a mile brought us to one of Mr. Shannon's camps, and we were invited to partake of dinner. "shanty men's style." We accepted. The camp was I should judge about thirty by sixty feet, built on timbers at the water's edge. At one end is the kitchen and cooking stove; the other end is the dining room (an imaginary line dividing), furnished with a table of rough boards about six feet by sixteen feet, and around the edges of the camp are boxes and barrels containing potatoes, canned beef, flour, pork, beans, hard tack, dried apples, sugar, molasses, tea, etc. When dinner was announced we stepped into the shanty and were given a tin plate, pint cup, knife, fork and spoon, and invited to "help yourself" from the dishes of food set out on the table. Each helped himself, and found a place to stand or sit. About thirty men were served that day to pork and beans, baked in big pans, potatoes boiled in a can that would hold a bushel at the least calculation, bread cut an inch thick, heaped high up in a milk pan, butter in a wooden firkin, apple sauce by the pan full, warm biscuits, dried apple pie, fresh blueberry pie, and a big can of tea, certainly ten gallons. It was good and wholesome and we did it ample justice.

On the side of the log that acted as ridge pole for the roof, over the centre of the table, a swallow during the long summer days had builded her nest of mud and sticks, laid her eggs and hatched her brood of four little ones. Evidently she knew there were strangers, because for some time she fluttered about and finally anxiety overcame her fears and she flew in, fed her babes and away again she went for more. After dinner Mr. Bennett tried to photograph the nest and birds, scarcely five feet above the table. To this the mother bird, thinking we meditated harm, strenuously objected. I am afraid the picture was not a success, as no good light could be had except by disturbing the roof boards and nest, which was not to be thought of. I doubt, if the shanty men would have "stood for it" anyway. What grand faith and confidence that swallow had in the goodness and kindness of those big-hearted, hard working, rough, shanty men.

As soon after dinner as the pipe had been smoked, we loaded up the canoes as planned, and embarked on Ramsay Lake for the head waters of the Spanish River, of which the lakes are but widened parts. Linklater says the Indians call this lake Wah-bu-me-quck-co-sa-kai-gan, meaning the "Lake with the Water Lillies in the Inlet." In this lake we caught five good size pike. We paddled all the afternoon and camped on a point on the main land, put up two tents, had supper, and shortly after went to bed, all pretty tired.

We had for our camp cooking outfit a Baxter stove of sheet iron, with an oven and a service for six people. The guides looked upon it at first rather askance on account of its weight (fifty pounds) and strangeness. At the first trial they used more wood than was necessary, making too quick and too hot a fire. When they were more accustomed to it, there were no criticisms—nothing but praises. Twenty minutes would get a meal, except on state occasions, when a new relay started in, or when experiments with new concoctions were tried.

On Thursday, August 20th, we were up at 4.30 a. m. and started up the Inlet. At about 10.30 we reached swift water, and at the head found a fall of about ten feet. Aleck portaged his canoe around both rapids and falls. Harris tried

paddling and poling up the rapids and came to grief; had to get out and drag his canoe up. Linklater tried to follow him with no better success. Both got wet and had to portage after all. At the head of the fall Shannon's people were building a dam, which was about half completed, so Mr. Armstrong named this carry "Half-dam portage." A timber slide was also in process of construction. Half a mile above the fall, Shannon had a bridge and another camp. In return for taking a picture of the camp the shanty men gave us a small bag of flour. Two miles further up the stream there was another rapid, and a portage of one-quarter of a mile, with another dam at the head (Whole-dam portage). Here also were three shantymen caulking a large batteau. This night we camped on an island in Canoe Lake. We caught a couple of pike trolling, and as we were paddling along the shore heard some large animal in the wood but could not get a glimpse of it. We surprised an otter while fishing, but he made off into a tangle of logs. Immediately after supper we took to our beds, but did not sleep very well. The bed might have been softer.

Friday morning the wind was blowing a gale, sky was cloudy and it looked like rain. On the lake the waves were capped with foam and it was noon before the wind began to die down. We passed the morning in playing bridge whist. After dinner we reconnoitered and concluded that by paddling down behind the islands, we could get under their shelter and make the lee shore of the main land. This we did, but the waves were still high and all the canoes had more or less water in when we reached the main land. By keeping along the shore, close in, taking advantage of every headland and island, we arrived at the head of the lake and portaged over quite a sharp "hogs-back" to Sulphur lake, and camped for the night on the south shore. Mr. Armstrong and I went fishing while supper was being made ready and the tents pitched. We caught some fine pickerel, averaging about four and one-half pounds. Being from this clear, cold water, they are very good eating.

The country around Sulphur Lake is hilly and rocky and not very attractive, on account of having been burned over. The water is dark as though saturated with iron.

On Saturday morning we broke camp, crossed Sulphur Lake, made a short portage, then across to another lake, to the head of the Spanish River. Then a long, hilly, rocky portage over the "Height of Land" and we launched our canoes in the head waters of the far-famed Mississauga —"The river of the heavy forests." We were on the old Hudson's Bay Route, to the post on Green Lake. Going with the current the travelling was easier. We dined at the abandoned Hudson's Bay post "Missassauga" on the upper Green Lake. Geo. Linklater has been factor there for about fifteen years. The Post is on a strip of sandy beach between the river and the lake. Back of the post, the land begins to rise and on the bluff overlooking the Post is an Indian burying ground. The Post has been abandoned about twelve years, and the buildings are rapidly going to decay. Green Lake is nearly circular and stretched out to the south surrounded by pine forests; has beautiful sandy shores and bottom, and was pronounced fine bathing by Mr. Armstrong and Donald. In one of the storehouses we found some old sheet iron stoves, made large and roomy for burning two-foot wood, and some old pine chests, one of which we attached, as a memento.

It is a lovely spot, and if a person could afford the time for a vacation to go and come, I know of no other place better suited for a summer camp.

We got away about two o'clock, crossed the Lake into the River, and camped on a portage at a small rapid.

Although the following day was Sunday we travelled to make up the time we were wind-bound on Canoe Lake. On crossing a small lake about ten o'clock we stopped at an Indian camp. The Indians were away, the poles of their tepees were standing stripped of their birch bark covering, which covering was "thatched". That is, the Indians build a pole platform about four or five feet high and the things they do not want to take with them (in this instance, their guns, axes, clothes and some provisions) are tied up in birch bark and placed on this platform, covered over with the birch bark covering of their tepees and the bark not needed for this covering is

rolled up with the other goods. In a green thicket were two birch canoes with paddles and poles. We left the camp and crossed the lake. Here we made a short-cut consisting of two portages and crossing a small lake, which saved us about thirty miles of river running. During the day there were many small rapids. Since our canoe was large, it drew considerable water and being pretty well loaded, the largest single piece of baggage (I), was usually invited to take to the woods or rather the portage; some times Mr. Armstrong as well. The river averages about thirty yards wide, and so far was wooded to the water's edge with pine, hemlock, spruce, etc. The hills are a mile or more back.

We camped on the river bank at the foot of a rapid, and as the weather was quite damp and chilly, we arranged to have a camp fire outside the tent. About three o'clock in the morning it was decidedly cold, the mist from the river being like a wet blanket, so we called Harris to build the fire anew, and then we slept quite comfortably until morning.

Monday was our sixth day out. We agreed that each day's cooking should be done in squads. No. 1, Linklater and Don ; No. 2, Aleck and Armstrong; No. 3, Harris and Bennett ; I was to put in my talents where they seemed most necessary. To the most proficient a prize was to be awarded. Today squad No. 1 had the carpet.

We were started by 7.30 a. m. Twenty minutes later,a portage; and at 9.15 a. m. I was perched on some rocks at the end of the second portage at the foot of a rapid, watching the rest coming down in the canoes. I was out of the running, so out of the fun—too much avoirdupois. At 10.15 I was again watching them coming through the third rapid. As the pack straps begin to cut in, and fit rather snug, your temper grows shorter, and you begin to think the canoe could just as well carry another one as not. At 11.30 o'clock another rapid ; they are beautiful and were lots of fun — for the other fellow. Aleck comforted me by saying that there would be no more portages in the afternoon. Shortly after dinner we ran into the bottom lands. The river bank on each side was covered with beaver meadows, through which the river ran its length. The grass was so high that you could scarcely see over it standing up in the canoe, and there were deer and moose tracks in plenty. In some places the rile was still in the water, where they had passed. At 2.30 p.m. we passed an Indian burying ground on the bluff, at a return bend. The graves were surrounded by a wooden fence painted a bright blue, and decorated with a pair of deer antlers. Empty vessels of birch bark and bottles were strewn about. Evidently they had held food to cheer and sustain the dead on their journey to the "Happy hunting ground." Those graves were of recent date, while further up the hillside were traces of an older burying place.

It was proposed that we could stock our larder with a little red meat. "Man was not made to live by bread alone," and "salthorse" for our "stiddy" was getting a trifle familiar, but alas ! it was the close season and like the good sportsmen we would like to be, we abstained from shooting in spite of great temptation. At 8 p.m. Harris was out in his rain coat, beginning his preparations for breakfast. He had very craftily contended all long that cooking was not in his line, and it was chiefly on this account, that the cooking arrangement was made. Harris had taken upon himself to pitch the tents, make the shake-down for our beds, and do the packing up, and a great success he made of it, but the others made a kick about doing all the cooking. So it was arranged, and they found that Harris could cook and wash dishes with the best of them.

On Tuesday we slept later than usual, and found it showery and a heavy mist enveloping everything. We started on our way about eight o'clock, and at eleven o'clock we ran into lower Green Lake, where there were the remains of another Hudson's Bay Post. The roof had tumbled in, the walls alone were left standing and the whole grounds were grown-up with berry bushes. Geo. Linklater had been factor here for about a year. We cooked our dinner on the rocks at the landing and got away at one o'clock and crossed the lake. The shores are low and grassy and look like exceptionally good moose grounds, and George says "they can't be beat." At

two p.m. we made portage around a rapids and falls. Mr. Armstrong informed me that when this trip was concluded, he was going on some business up to Timagami Lake, where we had been together some six years before, and intimated that a camp outfit like the one we had with us, and which belonged to me, would save him much valuable time, on the way, because it would be necessary to cut so little wood, also that it could be used to warm the tent at night, and further, that its economies in the wood line would help to preserve the Canadian forests. (As he is deeply and vitally interested in the Canadian Pacific Railroad as a grand highway to this great "game country" he should pose as a bright and shining example in these economies.) All of this I cheerfully subscribed to, and suggested, that as Donald thought he was in need of a birch bark canoe to complete his education at Cornell, and if Mr. Armstrong would see that the canoe the young man had been travelling in was safely shipped to Ithaca, he might take the camp kit on his journey ; and "so mote it be."

While these negotiations had been going on we had been running into a more hilly country, and soon we passed into a lake, the like I have seldom seen, full of high rocky islands and points jutting out into it, called Min-ne-sina-quah Sakaigan, the "lake where the head lands look like islands." If the guides were not familiar with it, I can imagine strangers would spend some considerable time finding the outlet, which is hidden behind a high bluff. The current sets in pretty stiff. It is all one could do to paddle a canoe up it. We camped on a flat rock covered with moss, only about a quarter of a mile from the lake, and opposite a bluff, fully six hundred feet high.

While making camp I jointed the rod, and having a leader with some midge flies on went to casting, and in the swift water had a strike. The fish started for the other side of the river lively and I had to let him have the line. After about twenty minutes work, we got him in, and lo and behold, a pickerel weighing about five pounds. I first thought I had hold of a big "small mouth bass", by the way he went for the swift water. The hook being caught way back in the corner of his mouth, made him so hard to land.

Wednesday was the day of our lives. We slept late, then photographed the country from the top of the bluff, and got away about nine o'clock. The water was quick and we ran several rapids, the "heavy-weight" walking around three. Then we struck what Linklater called the "Devil's Portage" and it was the "Devil's own." At this place in the river is a chute, and a rapid that could not be run, so there was nothing for it but the pack straps. The portage was about three-quarters of a mile up a stony, very steep hill, then wound down a rocky ravine to the river. It was a poser. I thought the blamed straps would saw my shoulders off. Donald insisted on carrying his canoe and nearly put himself out of business. Well, we were all glad when over it. The river here is about one hundred yards wide and has a big volume of water. We had dinner at the foot of a portage around a rapid and at the junction of the Winnebegon with the Mississauga. The Winnibegon has about the same volume of water as the Mississauga. We ran up the Winnebegon a short distance so we could say we had been on it and picked and thoroughly enjoyed some high bush cranberries that grew over the banks.

Linklater told us there was one more portage before we cramped and old Meek said if the last portage was the "Devil's" the next one was his wife's. It was all down hill around Aubrey Falls, and awfully stony.

We started on with not a little enthusiasm. In the middle of the afternoon we came to a narrowing of the river where it looked as if it melted away. On each side of a small rocky island you could see the mist rising and the tops of the trees away down below. We landed at the side and found it impossible to get much of a view, and on the assurance there was a good place further down the portage, we started. If anything the "Devil's Wife" was harder on our feet than the Devil. About one-half mile down, we halted, put down our packs, and took a walk over the rock, and came out on a ledge. Such a sight I have never seen ! Aubrey Falls, one hundred and sixty-five feet high. I wish I could describe them, so that the reader

could get a realizing sense of their beauty, with the setting sun flooding them with its radiance, the mist one mass of prismatic colors, and the waters foaming milky white.

As you stand on the rocky brink of the chasm, looking up the river, you see the waters tumbling on either side of the island, into a broad shelf of rock and across the shelf down into an abyss. The second, or lower fall, is divided by an immense shaft of rock, which rises out of the seething waters below. The waters are then gathered from right to left and sweep across the face of the fall and plunge into a rocky gorge or canyon approximately one hundred feet wide and as many feet deep, the sides of which, gradually drop and sink away a hali-mile below to the level of the waters of the river. After gazing our fill and doing some photographing, we returned to the trail, resumed our packs and shortly found ourselves on the flat rocks at the river's edge, where we made our camp for the night. We were tired, and slept well, with the music of Aubrey Falls for a lullaby.

We were up at five o'clock on Thursday (our ninth day out) and breakfasted at seven. Opened a barber shop while waiting for breakfast. Harris shaved me, Mr. Armstrong started in to do the same for himself using a tin plate for a mirror. By nine o'clock we had passed two portages—around rapids for me—and now came to a thirty-five mile run, and Harris remarked: "When you get down, you will wish you were back." Don asked him "Why?" and he said, "So you can do it over again." And it was a ride for your life. We were in the hard-wood country now, and the trees were beginning to assume the brilliant hues of autumn; the banks were a series of rocky bluffs, several hundred feet high, and a panorama of beautiful views. The river is like a mill-race, from one hundred to one hundred and twenty-five yards wide, and one need not put in a paddle except to dodge the rocks or keep out of too violent waves or eddies. The smaller canoes took in more or less water, but the large canoe with crafty, careful old Aleck barely took two pailfulls the whole distance, and only touched two rocks. About five p.m. we passed the place where a trout stream came in from the west, but we were in a particularly swift current so could not stop.

At noon we had dinner at a point where a surveyor's line crossed the river. Here they had had their camp. We were out of matches excepting some Donald had in his pack, and he and Aleck were not handy, so we took the lens out of Bennett's 8 inch. x 10 inch. camera for a burning glass to light a fire to cook dinner, but could not induce a flame. We looked about and found an Indian "cache" near the old surveyor's camp, and on opening one of the chests we found several small boxes of matches, some of which we appropriated, and left in lieu enough money to cover. This Aleck assured us was the proper and only thing to do in the woods.

Friday (ten days out) camp was left at 7.45, and still we went on down hill, in the swift waters. At one place it looked as if the river sank away before us like a toboggan slide, and dashed itself against the foot of a huge bluff, then rolled away to the left. Here we had to paddle lively to get out of the rough waters without being upset.

Mr. Armstrong believes this to be the most beautiful river he was ever on, and he has been on many of them, not only in Canada but in the States.

At 9.30 we met two Indians, Bamagesick by name, poling their canoe up the river. They were taking supplies to a Government surveyors camp on Township 195 and 201.

At 11.30 we arrived at Squaw Chute and we portaged around. At this place there is a cabin (no one at home) with a potato and cabbage patch. As we had seen no green vegetables for ten days, we did not get away until 1.30 p.m. We ran rapids and paddled until 3.15, when we reached the Falls at the head of the Tunnel. These falls are about seventy feet high and would have been considered grand, if we hadn't seen the Aubrey Falls. At the foot is a large pool; then it sweeps around to the left and into the Tunnel as it is called. It appears as though the river had worn a cut through the solid rocks about one hundred and fifty feet wide and as many feet deep, and about three miles long, and is

full of ledges and jagged rock. The guides say that logs coming through are pounded almost into pulp wood, and it certainly looks as though they might be. There is a copper mine and stamp mill at this place, but not being worked; also three or four cabins, one or two occupied, and these were the first habitations excepting the one at Squaw Chute since we left Biscotasing. We sent over the hills and got a farmer to come with his hay rack filled with hay to take our duffle and canoes over the three-mile portage. When about half way over, Aleck invited me to go with him and take a look at the tunnel. We left the portage and climbed down the hill to the edge. It was a wild sight, the water dashing against the rocks and flying many feet high in the air, and white as milk. I can assure you it was a tough climb back up to the portage. We travelled along, reached the River and camped for the night. We appropriated the farmer's hay and were assured of good beds for the night. We had a turn at the great American game before sleep overtook us.

On Saturday morning it was raining, but we started at 7.15 and paddled to Slate Falls, twelve miles through the rain, portaged around the falls on the left side, crossed the river, and while we were holding a counsel of war to decide on our future plans, we had the guides put up a tent, to keep off the rain and build a fire to warm us and dry our clothes. None of us were very strong to keep on down the river, and Harris invited us to go home with him and spend Sunday. His home is at Day Mills, on the south shore of "Wah-que-ko-bing" lake, and to get there we must climb over a hill and cross the lake. There had been at one time a portage, but it had grown up with brush. Mr. Armstrong, Harris and Linklater volunteered to cut out the portage, while Aleck cooked dinner, so we decided to accept Harris' invitation. We put up the second tent for Aleck to cook in, while the volunteers cut out the portage. After dinner we took what duffle we thought we would need and left the balance in the tents, and started everybody for himself. Don and I followed the Indian, but he was too quick for us, and going up a "dry water course" we missed the blaze on the tree that indicated the portage, and got lost, so we stopped and began to howl. Harris answered away up the hillside to the right, and we were found. Just at this time the Indian came back over the trail for his canoe, and I stopped him and made him take my load and nearly all of Don's and then we had all we wanted to do to get over, the rain coming down harder than ever. Mr. Armstrong and the guides made the trip three times and pronounced it an easy portage for the distance. Under such conditions we will have to adopt some new footwear for the next time. The boot packs when wet through are soft and slippery and treacherous. I never tumbled around so much in all the times I have been in the woods as I did on that tramp over the hills on that portage of about three-quarters of a mile, and never but once did I attempt to travel through the woods in such a rain storm, and that to keep an appointment, and travelling light. I should have remembered my vows on that occasion, but all things end, and so did that. Harris and Bennett with the photographic supplies had embarked, and were well out into the Lake. Linklater, Don and I went next in the big canoe, and Aleck went back for the third canoe, and Mr. Armstrong waited for him. When we were on the Lake the rain ceased, the wind began to come up and the waves with it. We arrived safely before they got too lively. We shouldered our packs and hustled down to the Harris residence, wet, tired and dirty, at 4.30 p. m. We cleaned up, had a good hot supper, and felt more like "white folks", played cards, and went to bed at ten o'clock.

The indefatigable Mr. Armstrong changed his clothes, hired a man with team to take him twelve miles to Dayton, caught a train for Blind River, where our things were to be, and got his mail. He stayed over night, shipped our things to Desbarats, hired a team and man, and drove the thirty miles to Day Mills and arrived Sunday noon.

We loafed around all Sunday morning. Day Mills has a population of nine families, and its principal industry is a saw mill, and a Methodist church. The mill saws lumber by daylight, and furnishes the power to run a generator that lights the houses and church by electricity. We all

thought Harris was "joshing" us when he was telling about all the comforts of home, he had in the "wilds of Canada," but they were gospel truths each one of them.

Mr. Armstrong's plans were to go back to Slate Falls and on down the river to the railroad station at Blind River, but we declined. So Aleck and Linklater went over to Slate Falls, got the tents and duffle, while we made arrangements to be taken to Dayton in the morning.

During the afternoon we made a call at the cottage of the Kingfisher Club, 1892, at the landing on the lake. Messrs. Gooder and Hartman of Cincinnatti, Ohio, were our hosts, and dispensed its hospitalities in royal manner. We returned to the Harris residence, and photographed the family and the guides in the garb of civilization. In the evening a neighbor brought in a fiddle, Linklater executed the leading part, and Harris accompanied him on the organ.

Early on Monday a team came and was loaded up. On account of my lameness I was honored with a conveyance; the rest walked. Going out in our party was a young man from the Stevens Institute of Technology at Hoboken, New York, Geo. M. Richards, who had been spending his vacation at Harris' and earlier had gone down the Mississaugua with Harris and a party as second guide. His account of his experiences were quite amusing. We parted with Harris at Day Mills, with the young man and Indian Aleck, at the Station, the Indian returning to Biscotasing, where he lives.

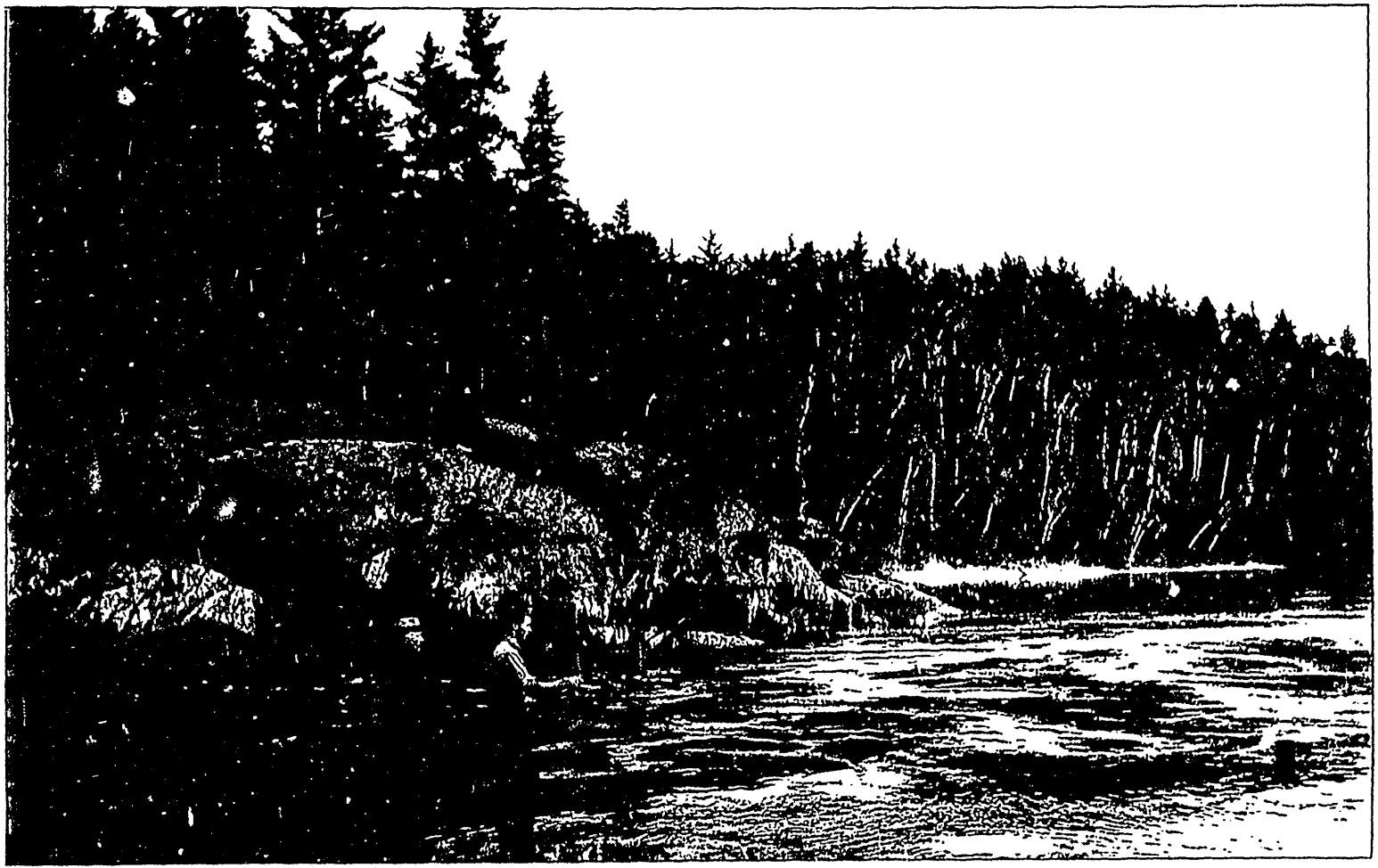
The rest of us journeyed on to Desbarats. The people on the train must have thought we were a wild west show in our hunting clothes, with guns, rods and hunting knives in our belts, ragged and dirty after a couple of weeks in the woods. I can assure you that when we reached Desbarats,we soon made for the hotel, secured our trunks and got into civilized clothes.

In conclusion, we should have adhered to our original plan and taken another week to the trip. It was too beautiful to have been hurried over, and I am sure there were many lakes but a little off the direct route where there would have been elegant fishing and hunting; but the hardships are all forgotten and only the pleasant times and beautiful scenery will remain in our memories. It is a glorious country and it will be many years before the hand of the lumberman will find it profitable to go to the trouble and expense to do the work necessary to pass the logs by the falls and tunnel to the mills and railroad.

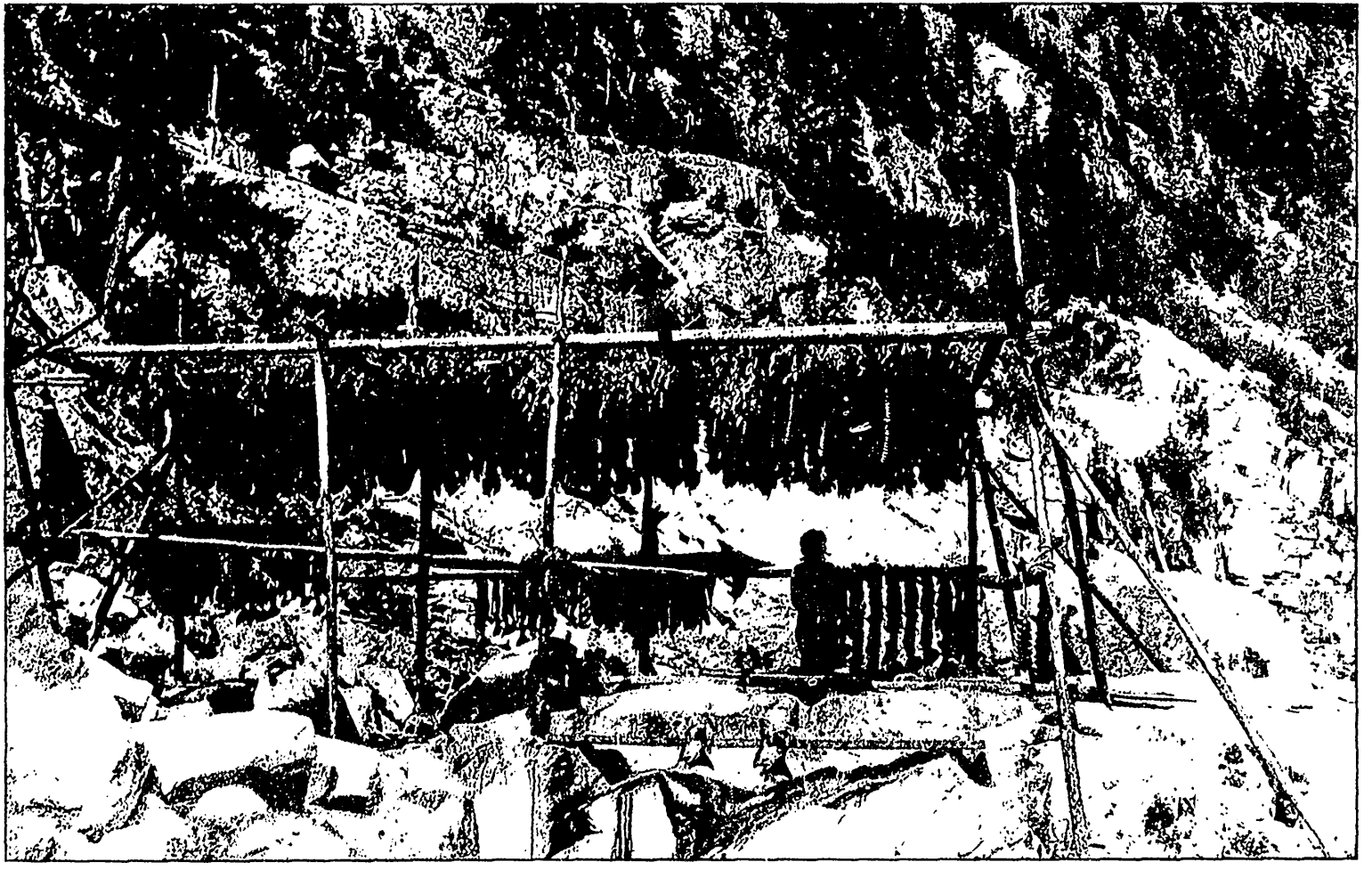
Only once did we see deer or moose. I think it was on Tuesday, our seventh day out, we saw a buck and two does in the river drinking. They leisurely walked out and disappeared in the forest, seeming familiar with the fact that the game law protected them.

I must say that the prize for cooking was awarded to the Indian. He could, and did, make white and corn bread and biscuit. If the others could they would not, so Mr. Armstrong gave Aleck a sample (half-pint) bottle of whiskey. It was worth the pric of admission to see the look on the face of the old Indian when he took the miniature bottle. He rubbed his stomach and said: "No reach down here" and I am of the opinion that he felt as if he had been defrauded of his rights, but Mr. Armstrong had given him all the had and he squared himself afterward, to Aleck's delight.

It was rather amusing to me to hear Aleck's remarks in Canadian-French and Indian about me to Mr. Armstrong, when I would get tired of being doubled up and attempt to stretch out in the canoe, sometimes putting my feet on the gunwales. He would grunt and grumble, calling me Windido Shaganash (the long legged Englishman) and saying that I would capsize the canoe. One day going through the rapids, Alex yelled "Au large,—Ramnez au gouche. au gouche." Mr. Armstrong above the noise of the waters heard the "au gouche" and started to throw the head of the canoe to the left and directly onto a huge rock, when I repeated the direction. Aleck "sensed" in a moment that I must have known and understood all his little side remarks to Mr. Armstrong. From that time on he was not so grumpy. I understood from Mr. Armstrong afterward that he had been warned to be careful of crossing Aleck, as he would take offense on the least pretext and leave one in the woods and start for home, so Mr. Armstrong humored him and deferred to him in the



A LESSON IN CASTING.
Three Island Portage, Mississauga River



SALMON FISHING.

These fine fish have all been dipped out of the Fraser by the Siwash Indian shown in the picture

running of the canoes, which I think caused me to walk around many portages, which could have been run, without very great danger; but, then, "Who knows?"

We spent a couple of very pleasant days at Desbarats, seeing the Indian Play of Hiawatha and enjoyed it very much. Then home.

The United States of America is popularly supposed to be the freest country under the sun, but we Canadians can assure our friends across the border that the sportsmen of the British Empire would not tolerate for a day such legislation as certain persons in the United States have attempted to bring about. We refer to the childish attempt to prevent sportsmen from using such up-to-date weapons as may be offered them by manufacturers. Some, no doubt well meaning but misguided, individuals would actually forbid the use of repeating rifles in addition to their bete noir, the automatic shot gun. Their contention is, that by forbidding the use of these improved weapons they will protect game, but if they were practical sportsmen, they would know that the only effectual way to protect game is to forbid its sale; make it illegal to kill more than a certain number of birds, in a day, and in a season; to destroy vermin, and last, but not least, to enforce such laws. The percussion gun would be quite effectual in cleaning out the game, provided no check were put upon its use, and every loafer could pass his days gunning. We are glad to see that Judge Ross of the United States Circuit Court of the northern district of California, has taken this stand.

It appears that a certain W. A. Marshall was convicted in the Justices Court, of Marin County, California, of a violation of an ordinance enacted by the board of supervisors of that county, which said: "Every person who, in the county of Marin, shall use any kind of a repeating shot-gun, or any kind of a magazine shot-gun, for the purpose of killing or destroying any kind of wild duck, geese, quail, partridge, doves, or any birds, shall be guilty of a misdemeanor." In his decision, previous to giving an order discharging the prisoner from custody, Judge Ross said: "In the present instance what was the end sought? Manifestly the prevention of the taking or killing by one person of more than twenty-five quail, partridge or grouse, in any one day; for section three of the ordinance provides: 'Every person, who in the county of Marin, shall take, kill or destroy more than twenty-five quail, partridge, or grouse in one day, and every person who in the county of Marin shall have in his possession in any one day more than twenty-five quail, partridge, or grouse, shall be guilty, of a misdemeanor.' That end is just as effectively accomplished without the obnoxious section as with it. It is wholly immaterial to that object whether the sportsmen or hunter use a repeating or magazine gun, or a double or single-barreled gun. When the limit is reached he has to stop shooting or incur the penalty prescribed. And the opportunity of detection is just as great in one case as in the other. No valid reason is therefore perceived, and none has been suggested by counsel, why the owner of a repeating or magazine shot-gun should be prohibited from using it, and the owner of the equally, if not more effective, double-barreled, automatic-ejector shot-gun be free to use it in killing the twenty-five quail, partridge, or grouse, permitted to be killed by any one person in one day. The equal protection of the laws, to which every person is, by the provision of the Constitution of the United States above quoted, declared entitled, would indeed be a vain thing, if such discriminatory legislation was sustained by the courts. If section seven of the ordinance in question is valid, no reason is perceived why the process of elimination may not be extended by next prohibiting the use of the double-barreled, automatic-ejector shot-gun, next all but muzzle-loading guns, and so on until the pop-gun only is permitted to be used upon wild duck, geese, quail, partridge, grouse, doves, or other birds in Marin county."

On The Great Divide.

BY JAMES BREWSTER.

We left our camp, which was situated on the right hand bank of Goat River, early in the morning and followed up the stream in a northeasterly direction about one mile, to the foot of Goat Mountain, which we proceeded to climb in pursuit of goat.

After climbing about three hours, the party, which consisted of Mr. S. B. Hussey, of Pittsbourgh, Mr. Moore, of New York, and myself, reached a point where we could see the valley below us to good advantage. After searching the surrounding country some time with our glasses, Mr. Moore spotted a large Billy, who was having a sleep in a small clump of juniper bushes, about one thousand feet below us.

It was impossible for us to get down off the ridge we were following without returning to the bottom of the mountain, and then following up the "draw" that led to the small basin, which the goat occupied. So we continued on up the ridge until we came directly above Mr. Billy. This brought us within a range of about seven hundred yards and a drop of between fifteen and two thousand feet, which would make very uncertain shooting; but after a short consultation we decided to chance a few shots; as goats will almost invariably climb when alarmed.

Moore fired first, the shot striking the rocks slightly below the animal as planned. The goat got up, shook himself, and looked around. Another shot and he started to climb directly toward us. The third shot quickened his pace and springing lightly from one ragged point to another, he was rapidly shortening the distance between us, but before the third shot had died out in the adjoining peaks, a second billy, much larger than the first, came in sight, and joined his comrade in his last climb up the mountain side.

We lay still on the brink of that rocky precipice and, watched with interest through our glasses the movements of our now thoroughly deceived game.

As we waited the approach of our victims, we decided to let Mr. Moore have first shot, as he had been least fortunate during our trip. It being almost three months since we had seen any signs of civilization.

When the goat reached the foot of the cliff, about three hundred feet below us, Mr. Moore fired, breaking the hind leg of the foremost goat. Of course this entitled him to another shot, which he sent very quickly, but was not very effective, only taking a tuft of white wool off the goat's shoulder, and before he could get another shot at him he had disappeared around a corner of rock and was lost from view.

Mr. Hussey, who was an experienced hunter, in both Africa and India, as well as this country, brought his goat down first shot. As his double-barrel English Express barked forth its signal of death, the big goat doubled up as if stricken with a bad attack of colic, and began to roll back down over the steep cliffs he had taken so much trouble to ascend.

Mr. Moore ran along the ridge a few yards to a place where he could see his already wounded goat, and fired, breaking his back. Both goats started to roll down the mountain at almost the same time. They soon gained so much speed that they looked more like balls of white wool than anything else you could imagine.

Our next care was to get down to them, and in order to do this, we would have to return to the bottom of the mountain (as I said before) and follow up a small stream about a mile to the basin, where the goats had stopped rolling.

We started down the ridge at a good pace, as we knew it would then be pretty late before we could return to camp. Having almost reached the foot of the mountain, my attention was drawn to an old avalanche runaway, where I thought I saw something moving in the low brush. In a few seconds a large silver-tip grizzly stepped out into full view.

My companions fired four shots; a few

bounds and the grizzly had reached the heavy timber, and was lost to our view. We immediately went over to where he had been, but we could find no trace of blood, or any indication whatever that would lead us to believe that the bear had been wounded. Having decided that it was useless to follow. Mr. Grizzly, we directed our steps up through a narrow box canyon, about a mile and a half long, and in an hour's hard work, scrambling over slippery rock, and wading in ice cold water, we reached the place where our goats had stopped rolling. We found them very quickly, as we had marked the place where they were before we had left the ridge above. After careful examination we were surprised to see how little they were damaged in their desperate plunge down the mountainside. Their heads and horns were almost perfect; a few patches of wool had been torn off their hides; the meat had been slightly bruised, but anyone who had seen them roll, would have expected them to look more like a sausage, than the almost perfect specimens they were. We started to prepare the heads for the taxidermist.

After we had finished, we rolled the skulls up in the scalps, and went back the way we had come.

When we were about half way through the canyon night overtook us; dark clouds gathered in the sky, and before long inky darkness presided.

Now our real troubles began. We spent the hardest three-quarters of an hour that I ever experienced in the descent of a mountain, groping our way along the dark corridor, stumbling over large boulders, slipping on slimy rocks, and dropping waist deep into pools of cold water. This exercise is the most fatiguing one can experience, especially after tramping around the mountains all day without anything to eat.

Everyone heaved a sigh of relief when we emerged from the canyon, and entered the tall spruce forest of the valley. Still our difficulties were not at an end. We had about three miles of heavy woods to traverse without a "blaze" or any sign to help us.

After prospecting around for some time we discovered a clump of white birch. My companions set about stripping the trees of their outer bark, while I cut a green stick about four feet in length, and one-and-a-half inches in diameter. I split down one end about six or eight inches, so that I could force the two halves apart about an inch. Into this I stuffed a bunch of birch bark. Lighting the bark, we had as fine a torch as any one could wish. These last, as a rule, about two or three minutes. When we had gathered all the bark that we could conveniently carry for the purpose of replenishing our light, we again started for camp, enabled to make much better time by the aid of the light from the torch. When we had proceeded for about an hour in the direction of camp, it was decided that we would fire a couple of shots as signals, that we might locate the exact direction of the camp. The first shot had barely done echoing in the woods when we received an answer which appeared to be slightly to our right, and a half or three-quarters of a mile away. We fired another shot and received an answer from the same place. When we had gone about half way we met our three packers, Sabby, Bob and George, who were on their way out to meet us, bearing a similar torch to the one we had constructed. We fairly dragged ourselves the remainder of the distance into camp. We were wet, hungry and tired, with sore feet, and skinned shins. Our cook, "Big Sid," soon had a good meal before us, which it is unnecessary to say we did justice to. This, our last hunt before we returned to Banff, was the hardest we had during our long trip.

I will write again and relate more of the experiences we met with on this three months' trip after mountain sheep, goat, grizzly, and caribou, among the peaks and high summits of the Canadian Rocky mountains.

Settlement on Timber Lands.*

A deputation of leading holders of timber limits in the Province of Quebec waited upon the Government of that province recently and presented a memorial urging action to prevent the granting of location tickets for lands held under license which are unfitted for settlement and which are taken up by the locatees not for legitimate settlement but for the purpose of obtaining the timber without making any return to the Province. The memorial states that throughout the length and breadth of the Province persons are, singly or in numbers, robbing the limit holders of their property and the province of its dues by obtaining location tickets for lands notoriously and manifestly unfit for cultivation and settlement—lands upon which are to be found in most instances the best merchantable timber on the limit—timber for the preservation of which have been paid by the limit holder, in many cases for years, ground rent and fire tax, besides the original purchase price, and which the limit holder has been nursing and protecting for future use; that in most instances not even a pretense of fulfilling the settlement duties is made, and the timber is sold to speculators, or the patent is obtained after the least possible work upon which a patent can issue and the land and timber sold either to local mill owners or to land speculators, who, after cutting the timber, abandon the lot. It was pointed out that as licenses are renewed in May and any lots entered for would then be excluded, the custom of making entries in March and April is followed and the memorialists therefore asked that all location tickets issued since the first of March be disallowed.

In reply to this delegation the Premier, while agreeing to the importance of the subject and the desirability of fighting fraudulent settlement, pointed out the difficulty there was in distinguishing between the bogus and the bona fide settler. Later he agreed to withhold the granting of any lots within the confines of timber limits during the month of April and also that the Government will hold back any and all permission to settlers for the four months previous to April on condition that the Limit Holders' Association will come forward and show cause why the Government should not allow these permits to take effect by offering proof that the parties who have been awarded the permits are not bona fide settlers.

The memorialists stated that they welcomed settlement on suitable lands and in localities adapted for the purpose and, although apparently the Premier was unwilling to accept this as conclusive that the settlement objected to was entirely unjustifiable, he had already referred to this illegitimate settlement in the Annual Report presented to the Legislature by him in his capacity as Commissioner of Lands and Forests, and stated that one of the main objects of the Commission on Forestry and Colonization is to give information on this subject.

The question raised is as old as the time when colonization and the lumbering industry came into contact, but it is still far from a satisfactory basis of settlement. It is well that there should be a clear understanding by the public of the position of affairs. That the plan of granting lands free to settlers, no matter how safe guarded, leaves openings for unscrupulous men to obtain control of timber without paying the just dues thereon is certain. The Quebec regulations do not permit a locatee to dispose of timber from his land until he has obtained a patent therefor, but only to cut for his own use, but when once the right to locate upon a piece of land has been obtained, it is difficult, unless an army of officials is employed, to ensure that the regulations are observed faithfully. It is a matter of history in Canada, and probably more so in the United States, that fraudulent use has been made of the free grant provisions to obtain control of timber lands, so that those who attempt to deny that such methods have been and

*Contributed by the Officers of the Canadian Forestry Association.

still will be employed are talking without a proper knowledge of the subject. As between the lumbermen who have purchased limits and contribute honestly to the revenue of the Province and those who attempt to get hold of timber lands and at the same time to escape paying their fair share of taxation, there can be no hesitation in choosing when the facts of the case are established.

There appears, however, to be a question in the minds of the Government as to whether the representations made by the lumbermen are entirely correct as to the settlement complained of being fraudulent. If, however, the lands so settled upon are, as stated by the memorialists, unfitted for agriculture, the fact of the colonization being bona fide does not make it either justifiable or desirable. If it is clear that the land will not support a population by agriculture, that, after having cut the timber, the colonists must live in penury or abandon the land, there is no good reason why futile attempts should be made to establish agriculture in such districts. That there are such tracts, and such the best lumber tracts, is admitted, but public opinion, not understanding the case and naturally taking the weaker side, frequently expresses itself in support of the settler without any understanding of the true situation. Germany has a population of one to each 2 2-3 acres but finds it profitable to hold 35,000,000 acres of twenty-six per cent. of its land surface in forest. These forests cover the poorer, sandy lands of the North German plains, the rough, hilly and steeper mountain lands of the numerous smaller mountain systems, and a small portion of the northern slopes of the Alps. Canada has a population of one to about 360 acres, and Quebec one to about 144 acres, so that surely the pressure of population has not reached such a pass that the effort must be made to gain a living on such lands as, even in a densely populated country like Germany, are found to be most profitably kept in forest. "But" the objector says, "why should the lumberman be permitted to hold public lands and make a fortune out of them?" Bearing in mind that the lands under discussion are those unfitted for agriculture and fitted only for timber production, that question may well be met by another, "How then are such lands to be managed? Is it better that they should be settled upon, the timber removed and then have them abandoned or transferred by an absolute title to some other lumberman, or will the Province take hold and manage them itself?" To the last suggestion the Province of Quebec would undoubtedly at the present time give a decided negative, so that, whatever the development of the future may be, the Province is now shut up to the plan of allowing the lumbermen the management of such lands, and provided the continuation of the forest, the conservation and possible augmentation of the Provincial revenues, and the final control vested in the Government are made a condition, so that progress and improvement in administration may be assured, and future contingencies provided for, there does not appear to be any better method practical at the moment. Radical changes may come and, if so, they will be in the direction of larger Government control, but the practical question must be dealt with immediately.

The question still remains as to timber lands that are also good agricultural lands. On such lands the lumbermen say they wish to encourage rather than discourage settlement. This may be quite true, but the hesitation of the Government to accept absolutely the statements of the memorialists may be taken as an indication that objection has been made at times even to the settlement of good agricultural lands. Licensees do not like to lose the lumber they have bought or preserved, or to be compelled to cut it before they are ready to do so, and the danger from fire which has always followed the trail of settlement in Canada strengthens the objection. Where, however, there are areas of any great extent fitted for agriculture, they must be devoted to that purpose when the demand for them arises, and any attempt to prevent it would be not only useless but injurious by prohibiting the most profitable use of such lands and prejudicing the whole case for the proper management of timber lands.

The Province is, however, responsible for the management both of the timber and the agricultural lands. It owes it as a

duty to the colonists to know where the good agricultural lands are so that it may direct settlement to where its labors may be crowned with success. It owes it as a duty to the public that the timber lands, that great source of revenue, should not be utterly alienated and should not be destroyed, so as to become waste and unprofitable. It is a problem of no little practical difficulty, and if the Commission on Forestry and Colonization can assist the Government in dealing with it their labors will not be in vain. The situation demands a strong, representative and impartial commission; a thorough investigation not only theoretically but practically, of the issues involved, and a clear and unprejudiced report. But whether commissions come or go, whether they report or not, Government responsibility still remains, and the question must be dealt with finally by the Government. Its solution requires courage and statesmanship and a vision which, while not overlooking the present needs, gives its full value to the future and counts the continued well being and prosperity of the Province as a whole its highest aim

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A few days ago a couple of moose heads were sent to England under somewhat unusual circumstances. The men of the 2nd Battalion, Royal Canadian Regiment fought side by side with the Gordon Highlanders at Paardeburg, and elsewhere, and a strong feeling of comradeship sprung up between them, and so when Major S. Maynard Rogers, of the 43rd Duke of Cornwall's Own Rifles, bagged a good head last fall, he at once bethought him of his old friends and resolved to send the trophy to the Gordons for their mess-room. In connection with this matter, Major Rogers has written:

Ottawa, Jan. ' 1904.

My dear ——.

The history of the two moose heads is as follows: I killed the cow moose in a blinding snow storm, as my guide said it was an old bull that had shed its horns. This was in the Maganicippi country. She measured eighteen hands in height, and weighed over twelve hundred pounds.

The bull, which I consider one of the finest in Canada, though I have seen larger, has eighteen tines on each antler, and a spread of over fifty-one inches. He measured nineteen hands one inch, and weighed over fourteen hundred pounds. I killed him in the same country.

During the past fourteen years I have killed fourteen moose, thirteen bulls and the cow above mentioned. My hunting ground has always been the Maganicippi, Kipawa, Timiskaming and the Quinze. This year I had in my party three gentlemen and two ladies. We went to the Lonely River country, via Mattawa, Timiskaming and the Quinze, and in thirty-six hours the party saw eleven moose and we got all the law allowed. This country is swarming with duck, partridge, and moose, and within twelve miles to the eastward of Lonely River and Lake Opasalika and Kekek Hills there are a very large number of caribou, of which we saw numbers of hacks, but as the portages are numerous, we did not like to take our ladies in. I might say that the scenery on this trip is quite the most interesting in our north country, combining the beautiful and the magnificent, and is easily worth the trip alone for an enthusiast with the camera. There is only one portage between Klock's depot on the Quinze, and the Height of Land, and that a very short and easy one. The Swinging Mountains near the Height of Land, with a very interesting Indian legend are magnificent, and the mountains near Abitibbi are in plain view from the lake and from the top of the Swinging Mountains a vast stretch of country—more than half lakes.

The best and cheapest place to outfit for the Quinze country is North Timiskaming, where good guides can be secured.

The Finding of Lost Lake.

BY FRED C. ARMSTRONG.

(Continued from the January Issue)

"Here we were. Two men quite alone in a country strange to them, without any provisions, or gun; in fact, our whole outfit consisted of an axe, a few matches, and a compass, for we had left our blankets, thinking that they would have made our loads too heavy.

Stephen thought we ought to follow the tote road, as it would be certain to bring us out somewhere, but I made up my mind we would make a trail straight across country, spotting it as we went; upon which he said, "Then the Lord only knows where we will come out." I laughed and told him that we should come out all right, and, finally, after a lot of argument on each side, I took out a pencil and tore off a piece of birch bark, and made a rough map of the Burnt Hill and Beaver Lake country. By this I intended to travel. I knew, of course, that we had travelled in a southerly direction, and that if we travelled north now we should strike the Beaver Lake region without fail. Having made up our minds to this course, we threw ourselves on our bed of boughs with our feet to the bright fire of pine knots, thinking we should have a good night's rest, but we had scarcely slept a couple of hours when the rain came down in torrents, the lightning played, the thunder rolled, and very soon our lean-to of boughs began to leak badly, and our fire to give off more smoke than heat.

To make matters worse a large spruce fell with an awful crash only a few feet from us, and after this, trees fell on every side,much to our alarm, for we thought we should surely be killed.

We passed an awful night; rain fell in torrents and the wind now arisen to the fierceness of a gale, howled dismally through the trees. I, for one, wished myself safely out of it, and regretted ever having undertaken the trip.

When things get to their worst they mend, and shortly before dawn the rain ceased, and we started out on a hunt for dry wood, which we found only after prowling through the wet bushes for an hour. At length an old, dry pine that had been blown down years before gave us what we were looking for. When we got back to camp we soon whittled some dry shavings, but when I tried to strike a match, I found all mine wet. Stephen gave me a great going over for not having a match safe, but when he came to hunt for his, he could not find it, so here we were without matches and without fire.

Stephen once more wilted, and throwing up his arms, cried we were going to freeze to death. Moreover, he registered a vow that if ever he got back to camp he would never more go cruising with Fred Armstrong.

Well, we had to keep moving. Every little while we would take a walk around the camp, generally stubbing our toes against a root and falling, and Stephen to enliven matters sang snatches at intervals, the favorite being "Where is my wandering boy tonight?"; but after a time he grew so hoarse that he could not talk, let alone sing. After a light meal of corned beef, without fixings, we started on our homeward journey, one spotting, the other giving the direction by the compass.

We travelled over hills, across brooks, through beautiful hardwood groves, and although Stephen doubted it, I assured him that we should get to camp by dinner time. We travelled fast, but at eleven o'clock there was yet no sign of Beaver Lake, though from the way the land sloped I knew there must be a lake or stream ahead of us. At noon we came to an old tote road, and then I felt sure we were near the lake. After crossing the road we came to a stream, which we followed for

a half-mile, and here we got a glimpse of beautiful Beaver Lake through the spruces. Fifteen minutes later we were in camp, just in time to prevent a rescue party starting. They gave us a good dinner and we did justice to it, as we had not had a square meal since we left amp.

After dinner we had a sleep, and early next morning we guided Mr. Moore to the lake. He was only there one day, but he got his moose, and it was a big one in the bargain. He it was who named the lake "Lost Lake" in our honor.

Tree Planting on Sable Island.*

In the report of the Director of the Dominion Experimental Farm for 1901, an account was given of some experiments undertaken in May of that year in the planting of trees and shrubs on Sable Island, off the coast of Nova Scotia, and noticed at that time in Rod and Gun. There were included in this test 68,755 evergreens of twenty-five varieties, and 12,590 deciduous sorts of seventy-nine varieties, a total of 81,345. A list of these is given in the Annual Report of the Experimental Farms for 1901.

In that report some extracts were published from letters received from the superintendent of the island, showing that the planting, which was begun on May 18, was finished on June 17. In subsequent letters received in July and November, he speaks of the difficulties the trees had to contend with owing to an unfavorable season, and of their condition at its close.

In the report for 1902 just received further information is given as to the condition of the plantations, from which we quote the following:—

"I will give you the latest news of the trees. Our winter has been very mild; not much snow and not much frost. When a cold snap occurred it was followed by enough mild weather to take all the frost out of the ground. March was very mild; April was cold and windy, and that has continued up to a week ago. Many pines that seemed to stand the winter went red in March and April, and many that turned color have recovered and are putting out new buds. Survivors of Austrian, Mountain and Maritime pines are the most promising, and those that are not doing well are the small specimens; nearly all the larger ones planted are killed. A few spruces of all kinds survive, but they are not promising. Of the arbor vitae only a few are living. Juniper of both kinds nearly all dead; perhaps four or five survivors."

"The Maritime pines raised from seed were killed wherever they were scattered on the bare ground, but where they came up among the grass they are growing finely in this shelter, and there are thousands now green and putting out new buds. When sowing these I put them in thick, and after they came up I thought that in spots they were too thick, but this was their salvation, as the winds subsequently killed those on the outside, while those in the middle of these bunches were protected and have remained green."

"The deciduous trees were killed down from the top, some to the ground, others killed outright, but they are no exceptions, all are killed at least half way down. Included in these are Pyrus prunifolia, P baccata, Caragana arborescens and Silver Poplar. All these deciduous sorts put out leaves a month ago, but lately we have had very high winds and all the leaves are more or less blighted, and some of the gooseberry and currant bushes are stripped. As Ihave mentioned before shelter is necessary here to success."

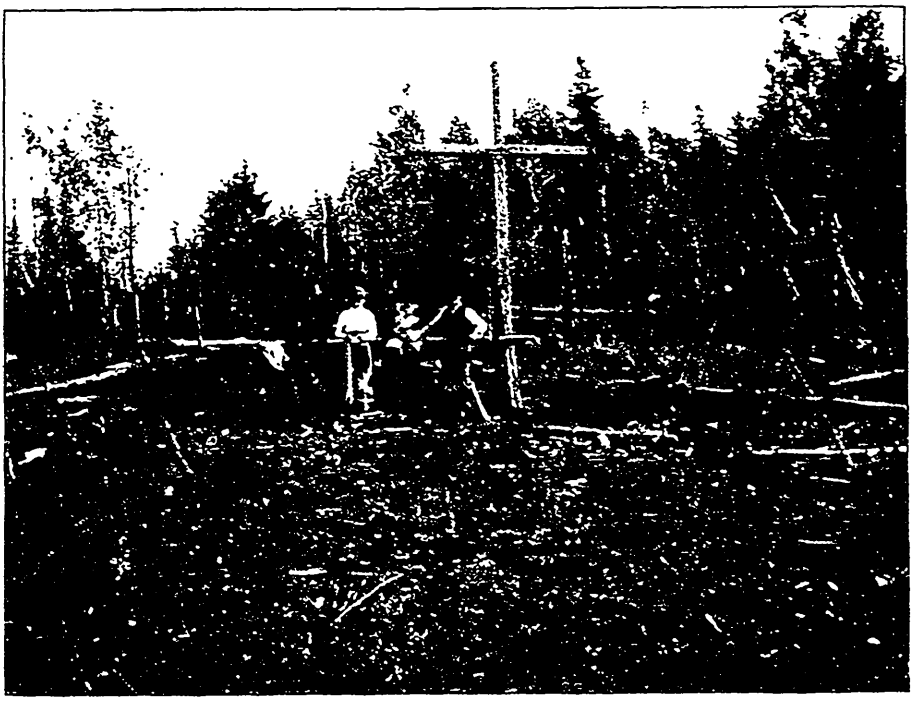
"I kept about ten pounds of the seed of the Maritime pine sent last year, and this I have planted this spring along with the seeds of other shrubs and trees you have sent me since, in rows in different places

*Contributed by the Officers of the Canadian Forestry Association.

MOUNT STEPHEN.
A glimpse of one of the finest peaks of the Rockies

LOVERS' LANE.
(The Lane shows up with great distinctness—but the lovers, with the usual sensitiveness of their kind are keeping out of sight)
Taken near Emerald Lake, B.C.

THE FIRST HOUSE.
This clearing on the Mattawin River, Quebec, is the extreme verge of civilization



THE INDIAN'S GRAVE.
An old Indian burying ground near Lake Ostabonnog, Quebec—Kipawa District

more or less sheltered. I also gave small lots to the three station-keepers in other parts of the island. From the experience gained last year I think I shall be able to protect these seedlings next winter as well as other specimens. Shelter from the winds is the main point here. Many Manitoba maple seedlings have leaved out and although they are killed from half to three-fourths down, they are putting up a vigorous growth."

"Speaking again of the need of shelter, you will remember that there were three patches planted inside the home field in which the house stands. Two of these were long narrow strips, which were ploughed before planting and subsequently cultivated. Of the trees planted on these plots, there is one survivor. In the front a plantation was made of about 1,000 trees, in almost pure sand in which the sand-binding grass was growing. When the grass grew up I had some of it cut out with a grass hook, and intended having it all cut, but more than half of it was left. Where the grass was left the trees are nearly all alive and thrifty; where the grass was cut ninety per cent are dead. In this grass there are some nice specimens of white pine, pinus strobus, which did not stand exposure at all. About 300 trees are now growing in this plantation."

The next letter is dated September 18th, in which the superintendent says: "I wrote you in the spring about the trees, and I think on the whole it was encouraging. I am afraid that the facts I am to give you now will be less so. I mentioned that nearly all the deciduous trees had come through the winter, and although killed down somewhat, had leafed out again and were making a promising start. The winds in the latter part of May were cruel to the trees, sometimes running up to forty miles an hour. In June we had a succession of windy days. On the sixth and seventh of that month the wind averaged for the forty-eight hours over thirty-five miles an hour, and the maximum velocity was 52 miles, with the thermometer ranging from thirty-five degrees to thirty-eight degrees F. This storm stripped all the leaves of the deciduous trees and killed a large proportion of them, the rest have been struggling along feebly, but at this time very few look promising. Pines have held on pretty well."

"During July about 1,200 of the seedlings of the Maritime pine were transplanted into one of the larger plantations. I dug small clumps, with one or two pines growing in each, with a hoe, and planted these irregularly about a foot apart, so that if they grow they will protect each other. This work was carefully done and about seventy-five per cent. are living. The seedlings in the bed look well, as do the pines planted last year that survived the winter. These are all protected by grass and may have grown hardier by the time they get above it. The remaining pines in the plantation in front of my house held their own during the summer. I left the grass around these also."

"With reference to the use of fertilizers on the young trees, no difference could be noticed in the ground treated and untreated; the difference where any existed was where there was some natural protection from the wind. I am continuing the experiments with the pines growing on the plantation in front of my house, where I shall be able to observe it, if there be any difference. No fertilizer has been applied to this lot, and although the soil is pure sand, or nearly so, the pines that survived there were quite equal in growth to any of those treated with fertilizers last year."

"In many cases where the tops of the seedlings of Pinus Maritima had turned red and were apparently dead, new shoots started just above the ground. It was a surprise to me to see conifers do this, and their roots are from six to nine inches long, straight down."

In a later communication, under date of November 5th, 1902, the superintendent says:—"Our autumn has been an improvement on the summer and last fall. Apple trees and shrubs protected with barrels are still growing as green as can be. The pines in Gourdeau park look fine and the fall rains have improved them very much. Our

summer drouth affects the trees very seriously. Of the deciduous sorts planted in the park, about fifty white birches have surprised me this fall, and they and the Scotch broom are about all that can be found there. These birches are still green and where the leaves did not get above the tall grass, are yet on the trees. We have had frost, but not enough to do injury in that direction."

Snowshoes versus Ski.

By ST. CROIX.

It has been said that neither the violin nor Indian snowshoe can be improved upon, but this statement may be challenged, because the birch bark canoe is generally included among the things that have attained to perfection, whereas we know that the birchbark is by no means perfect, and, as a matter of fact, has been very much improved upon. All this is introductory to saying that the snowshoe is for very many purposes distinctly inferior to the Norwegian ski.

I had an opportunity to use the ski during a long winter that I passed in Norway when I was a lad, but in those days its use was confined to the peasants and Lapps, of the Scandanavian peninsula. It was not used by the town folk, norhadit spread to Central Europe. Since that the ski has become better known and, unless I am mistaken, we are about to have an epidemic of skiing, which may possibly cause the rinks and the tobaggan slides to be deserted, for this old Norwegian sport has a tremendous fascination, and will no doubt establish itself firmly in the affections of Canadians and of our cousins across the line.

The ski is nothing but a long, narrow board, turned up at the end and modified to suit different districts. For a flat country, nothing will beat a long, narrow ski, two and three-quarter inches in width and eight or nine feet in length—some I have seen measured twelve feet, but for all around work, a man of medium weight, will find a ski three inches in width and seven feet in length about the best. I am using a pair eight feet in length, but they are not as good for ordinary work as a shorter ski.

The ski has several advantages over the snowshoe. In the first place one may use any ordinary foot gear. A pair of old boots or shoes covered by rubbers will do, though the best foot gear I have been able to discover is the Dolge. There are several fastenings; in principle they are much alike, with the exception of the alpine ski, which is used by about 8,000 skier in Switzerland and Germany; this has a metal foot-plate and a hinge, but all other I have seen consist essentially of a broad toe-strap and a heel-strap, either stiffened by an insertion of wood, or wire, or supported over the instep by a light strap.

Walking on the level is simplicity itself. The whole trick is the keeping of the ski near one another and sliding them alternately forward. No attempt should be made at pushing with the rear foot, as the slippery snow affords no fulcrum. The body is thrown forward, and the ski slipped a full stride ahead without being raised off the snow. This is one of the ski's great advantages over the Indian snowshoe; the weight of the ski never falls upon the muscles of the thigh and, consequently, after a long day's tramp you hardly feel tired. On the level the ski is a little faster than the snowshoe. Up hill there is little, if anything, to choose between them. down the slope the skier will sail away from the snowshoer as though the latter were standing still. Some of the best men among the Lapps have covered one-hundred and thirty odd miles in the twenty-four

hours, and if ever the ski is introduced among the prairie Indians, I think they will perform even more wonderful feats of speed and endurance. A pole is carried in skiing, but should be used as little as possible. This pole is from six to seven feet long, either of ash or bamboo, and has a disk a few inches above its steel-shod point, which prevents it sinking too deeply into the snow.

Our woods Indians and bushmen are persuaded that a very broad shoe is necessary for progression in the woods, but I think they will change their mind after they have tried the ski. I have given mine a thorough test in thick bush, and although they are too long for the work I find no difficulty in making better time than I could have made with the Indian snowshoe. Their extreme narrowness is a great advantage; their baring surface is such a long one, that one does not break through in the soft snow under the bushes, as one does with the Indian snowshoe. I think that for forest work a ski about five feet long, and of five or five and one-half inches in width, will be found to work wonderfully well in thick bush, but the ski will only be useful when a man is travelling light, because it is quite impossible to haul a toboggan, the ski affording no grip of the snow. This, of course will limit its usefulness, yet it is such a simple contrivance and has so many advantages for certain purposes that I consider its use must become general throughout Canada.

Then there is another side to skiing. On skis men have jumped, or rather allowed themselves to be carried, more than one hundred feet through the air. The so-called jump is made by sliding downhill at a tremendous pace, and taking off from a platform well down the slope. The inclination of the run, from the start to the jump, for the best results, should not be so steep as the inclination below the platform. In this sport the stick is not carried, as it has given rise to some terrible accidents, jumpers having been impaled upon their own staves. The body must be thrown well forward during the jump, and one foot should be somewhat in advance of the other upon alighting. These jumping competitions attract thousands in Norway, and are bound to become just as popular here in Canada. Some of our best athletes are very fairly proficient, and it is quite possible some European records may be broken before many seasons have elapsed.

To sum up: Ski are very low in price, easily taken care of, almost as easily replaced, and afford the most delightful exercise that it is possible to imagine. There is quite as much excitement in skiing down hill as in tobogganing: there is as much skill required in skiing as in skating, —and in skiing there is more variety than can be claimed by either of the sister sports.

The O. A. and E. U.*

At the last meeting of the Ontario Agricultural and Experimental Union, held at the Ontario Agricultural College, Guelph, on the eighth and ninth of December, considerable interest was shown in a discussion on the subject of forestry from the standpoint of the farmer. The Ontario Agricultural and Experimental Union is composed of ex-students of the Agricultural College and was formed for the purpose of carrying on co-operative experiments in all parts of Canada, and in all the branches of agriculture. Two years ago a committee was appointed to look into the for-

*Contributed by the Officers of the Canadian Forestry Association

estry question as affecting the Ontario farmer. No funds were supplied to the committee for carrying on any extensive investigation; so, in order to gain some idea of the general feeling among the farmers, and also to find out if possible the amount of woodlands still remaining in the agricultural districts, printed circulars were sent out to representative farmers throughout Ontario asking various questions, in all eighteen in number, such as: About what proportion of land in your locality is left under forest? Of what varieties of trees are the woodlots now composed? What is the value of your woodlot to you per year? What is the feeling in regard to forestry in your locality? etc.

From the answers to these questions it was found that in many localities only five per cent. of the land still remained in forest, and ranging from this small per centage up to fifty per cent. in the more recently occupied districts; the average for the agricultural lands of the Province being about eighteen per cent. In regard to the feeling with reference to the forestry question, the answers showed that at present very little thought was given to the subject, but indicated a general feeling that something ought to be done by somebody.

At the meeting in 1902 a resolution was passed urging the provincial government to do something to encourage the reforesting of certain portions where it might be thought advisable, either by practical assistance to the farmer, or else by actually undertaking the work on public lands. Nothing, however, has yet been done by the Government along these lines.

At the last meeting, after a good deal of discussion, a committee was appointed to draft another resolution to the Government. The resolution approved by the Association, urges upon the Government:—First, the necessity of obtaining accurate information as to the comparative areas in the different districts of such non-agricultural land, at present lying idle, owing to the fact of the forests having been cut off and the land being too poor to support ordinary agricultural operations; second, the advisability of reforesting these areas as soon as possible; third, the necessity of establishing a school of forestry, where young men may be trained in such a way as to fit them to carry out such forestry work as the future of the Province demands; fourth, the advisability of readjusting the method of assessing real estate so that forest land may not be over taxed as at present, which tends to decrease the forest area.

The subject of the taxation of the farmers' wood lands was rather fully discussed, the general opinion being that the present method of assessment according to the value of the land, plus the value of the timber crop, was not only unfair but encouraged the cutting of the timber, which in most cases is worth considerably more than the land upon which it is growing. After the timber is cut, the land, being too poor for agriculture, reverts to the municipality, as the owner refuses to pay high taxes on unremunerative property.

The general subject of forestry, dealing with the preservation of the large public timber tracts, was not touched upon. It seems that at present little thought is given to this part of the question by the average person. It is encouraging, however, to find a representative association of farmers taking up the subject as affecting their own interests, and it will not be long before a general feeling will be established that forestry must go hand-in-hand with agriculture in order that the latter may be successful.

Ontario Timber Regulations.*

The recent sale of timber limits by the Government of Ontario brings forward somewhat prominently the importance of the forest interests of that Province, and it may well furnish the occasion for a review of the history of its administration of timber lands.

The Province of Ontario was finally established as a separate entity with legislative powers at the time of the Confederation of the Dominion of Canada in 1867, and the history of forest administration since that time has had a separate development. Previously, however, it was intermingled to a greater or less extent at different periods with the general administration of the Dominion, and to obtain a reasonably complete view it will be necessary to take a look backward, hasty though it may be, over the successive steps by which the present position has been reached. Ideas in regard to the management of forest lands have undergone many changes, but fortunately the public interest in the matter is a factor that has never been entirely overlooked, and therefore the Province of Ontario and some of the other Provinces of the Dominion, are at the present time in a position in which they may obtain large revenues from the timber crop on lands, which will still remain public property and under government control.

Under the French regime large tracts of lands were granted to seigniors, which were to be again allotted by them to tenants, the intent being to reproduce as fully as possible the feudal system of the old land. In these grants a reserve was made of the oak timber for the use of the navy, and in later grants reservations were also made of lands and timber required for fortifications. When the British assumed possession of the country in 1763, the requirements of the army and navy were still uppermost in the minds of the administration. The instructions to the first governor commanded him to reserve a portion of each township to provide timber for military and naval purposes and also that a general reserve be made of the forests between Lake Champlain and the River St. Lawrence. Later, in 1775, instructions were given that no grant was to be made of lands on which there was any considerable growth of white pine fit for masts for the Royal navy. The only persons authorized to cut timber were contractors for the Royal Navy, or persons holding licenses from them. With or without authority, however, timber was cut for domestic use, and for export, and in 1818, the quantity of Canadian timber which reached the British market was 248,669 loads.

In 1791 Canada was divided into Upper Canada, corresponding to the present Province of Ontario, and Lower Canada, corresponding to the present Province of Quebec. The instructions received by the Governor-in-Chief of Upper Canada in the year 1818, were as follows:—

"Whereas, the reserving of such bodies of land within our Province of Upper Canada, where there are considerable growths of timber fit for the use of our Royal navy is a matter of the utmost importance to Our Service; it is Our Will and pleasure that no grant whatever be made of lands in any district or tract of Our said Province of Upper Canada until our surveyor-general, or his deputy, lawfully appointed, shall have surveyed the same and marked out as reservations to Us, Our heirs and successors, such parts thereof as shall be found to contain any considerable growth of masting or other timber fit for the use of our Royal Navy, and more especially on the rivers; and you are hereby instructed to direct Our Surveyor-General of Lands, in Our said Province, from time to time,

*Contributed by the Officers of the Canadian Forestry Association.

with all due diligence to complete the surveys and mark out the reservations as aforesaid, in the most convenient parts of Our said Province ; and you are further directed to direct our Surveyor-General not to certify any plots of ground ordered and surveyed for any person or persons in order that grants may be made out for the same, until it shall appear to him by certificate under the hand of Our Surveyor-General of Woods, or his deputy, that the land so to be granted is not part of nor included in, any district marked out as a reservation for Us, Our heirs, and successors, as aforesaid, for the purpose hereinbefore mentioned."

In 1826 regulations were adopted permitting any Canadian citizen to enter upon unsurveyed Crown Lands and cut oak and pine timber, at a duty per thousand feet (white) pine, white pine being considered of £6 5s on oak timber, of £4 3s 4d on red pine, and of £2 1s 8d on yellow at that time of less value than the red pine. Double the amount of duty was to be charged on all timber that would not square eight inches. The first receipts by the Government from timber licenses were in 1827, the amount collected being $360.

Although Upper Canada did not alienate the wild lands to the same extent as in Lower Canada, still the Governors disregarded their orders or used as a general power what was to be employed only for special cases, and between 1763 and 1825, when the population had increased to only 150,000, the lands granted or engaged to be granted, amounted to 13,000,000 acres, while in the next thirteen years when 250,000 were added to the population, the lands granted only reached the figure of 600,000 acres. The following statement was given in evidence in 1838, and published in an appendix to Lord Durham's report:—"It appears that the quantity of timber upon the waste lands of the Province is practically unlimited and that, independently of the consumption of the article in England, there exists at present a demand for pine timber in the Northern and Western States of the Union, which may be expected to experience a very rapid increase and which can only be supplied from the British North American colonies. It appears that the revenue which, under a wise and careful system of management, might have been derived from this property, has been needlessly sacrificed by the practices adopted in the disposal of public lands. The value of the timber upon an acre of land at the price of government licenses is frequently more than ten times greater than the amount required to be paid in order to obtain possession of the land upon which the timber is growing. Payment of the first instalment of the purchase money is alone necessary for this purpose and before the second instalment is due, or any measures are adopted to enforce payment, the timber may be cut down or the land abandoned."

In 1840, by the Act of Union, the Provinces were united and the administration of the forests again placed under one authority, and in 1846 new regulations were issued, the principal provisions of which were that no new limits were to be granted exceeding five miles in front, by five miles in depth, or halfway to the next river, and that the quantity of timber inserted in the license, and which the licensees would bind themselves to take out was 1000 feet per square mile. Licenses were not transferable without the sanction of the Crown Lands Department, and when there was more than one application, the limit was to be disposed of by public auction.

In 1849 a select committee was appointed by the Legislature to enquire into and report upon the state of the lumber trade, the cause of its depression, the protection of the forests from unnecessary destruction, and upon all other matters connected with the lumbering interests of the Province. The Commission reported that it was clear that the depressed state of trade was due to over-production in 1846, and also to some extent to the order established by the government regulations to manufacture a certain large quantity of timber upon each limit, to the threatened subdivision of the limits and to the want of any equitable or decisive action on the part of the Department with respect to disputed boundaries, etc. As a result of

the report, the first Crown Timber Act was passed, which provided for yearly licenses and the prevention of unauthorized cutting, and by the regulations issued thereunder, the size of limits was fixed at 50 square miles in unsurveyed townships and at half that size in surveyed lands. All licenses were to expire on the 30th April in each year, and licensees who had duly occupied their limits and who had complied with the requirements of the Department were considered as having a claim to the renewal of their license in preference to all others. The dues on white pine logs twelve feet long were fixed at 5d per log, and on red pine at 7d, red pine still being considered the more valuable. In 1851 a provision was made that all sawlogs cut in future upon public lands, if exported from the Province, shall be paid for at double rates, and a ground rent of 2s 6d per square mile was established.

A new Commission was appointed in 1863 to enquire into the subject of forest administration, and in 1866 further changes in the regulations were made by which the practice of sale of timber limits by public auction at an upset price was fixed. White and red pine were placed on the same basis of dues. In that year the amount collected for timber dues and ground rent was $338,302.

The accomplishment of the confederation of the Dominion of Canada in 1867 again and finally separated the Province of Ontario and gave it the control of the Crown lands. In 1868 ground rent was fixed at $2 per square mile and dues at 15 cents per standard of two hundred feet for pine logs. The main features of the regulations were finally settled and the changes since that date may be briefly noted. In 1887 the dues on sawlogs were fixed at $1 00 per thousand feet and the ground rent at $3 per square mile. In 1892 new licenses were restricted to white and red pine and the dues on saw logs were increased to $1.25. At the present time the dues have been raised to $2 00 per thousand and the ground rent to $5.00 per square mile, and a provision has been included that the right of renewal shall not be considered as extending beyond a period of fifteen years.

In 1885 the Fire Ranging System was adopted and in 1898 the Forest Reserves Act was passed in accordance with the recommendation of the Forestry Commission appointed in 1897. Both have already been fully explained in Rod and Gun.

In 1871 the first auction sale of timber limits by the Province of Ontario was held, the berths being in Muskoka and Parry Sound districts, and 487 square miles were disposed of for $117,672, an average of $242 per square mile. In 1872, 5301 miles North of Lake Huron were disposed of at $592,601, an average of $110.

In 1887 limits on the Muskoka and Petawawa Rivers aggregating 459 square miles were sold for $1,313,755, an average of $2,859 per mile. In 1892, 633 miles were put up for sale and brought in $2,315,000, an average of $3,657 per mile, the largest bonus being $6,300 per mile.

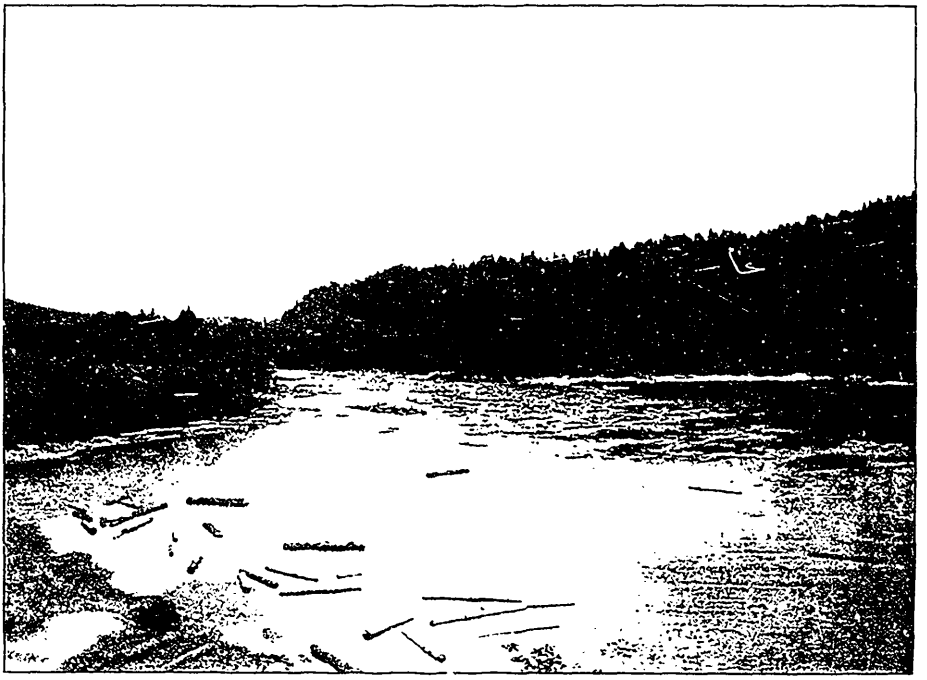
The sale held on the ninth December, 1903, comprised an area of 826 square miles in the Lake of the Woods, Rainy River, Algoma and Nipissing Districts, and notwithstanding the increase in dues and restrictions of the term of holding, the price realized for bonus was $3,667,337.50, an average of $4,450 per square mile. The highest price paid was $31,500 per mile for a berth of three and one-half miles in Nipissing District. This is about $50 per acre and the average price for all the timber disposed of is $7.00 per acre. It will thus be seen that these timber lands bring to the Province an immediate return of $7.00 per acre for the pine alone, besides future payments of dues at the rate of $2.00 per thousand, and ground rent of $5.00 per square mile, that they will revert absolutely to the Province in fifteen years with all the timber other than pine, and that they may then, if fit for settlement, be granted to settlers as homesteads, or utilized in such manner as may be most advantageous. We venture to say that there is no other kind or class of property under Government control from which greater returns will be received, and there is surely the strongest justification for the efforts that are being put forth to interest the public in the administration of the great

forest resources of the Province and the Dominion, and devise the best means for perpetuating and expanding the possibilities of such a source of national wealth.

To the Editor of Rod and Gun:

The highly successful result of the sale of timber held in Toronto in December by the Ontario government, and which totalled $3,677,337, affords a strong indication of the growing importance of this branch of our natural resources. High prices were paid at this sale, notwithstanding that the timber dues had been raised from $1.25 to $2.00 per thousand feet, and the ground rentals from three to five dollars per mile. It has been predicted that the purchases, in some cases, were too costly to ensure a profitable result in working the limits, but those who have shown their confidence in the commercial activity that is in store for the Dominion, will, no doubt, be suitably rewarded for their faith in its development. The depletion of forests of other countries, upon which, heretofore the world's supply has been dependant, and the enhanced demand for wood of all kinds, and especially for that king of all woods, the noble pine, have increased for us the value of our own timber areas. This brings to the attention the subject of Forestry, a knowledge of the science of which is being gradually unfolded by those who are making it a study, and to which public interest is being more extensively awakened. The value of the products of the forest, in the Dominion, in the year 1891, was eight million dollars; the exportations amounting to twenty-four millions, and our wooded area, including all kinds, amounts to eight hundred million acres. The possession of this vast resource, however, great as it is, should not engender the idea, that, therefore, we have no need to pay heed to the preservation and reproduction of our forest wealth. On the contrary, preservation and reforestration, must be the means adopted to protect from annihilation and sustain this valuable asset of our national wealth. Canada, in 1891, consumed in forest products 250 cubic feet per capita of population; Great Britain only fifteen cubic feet per capita. In England, as long ago as the reign of Queen Elizabeth, public opinion was so impressed with the value of the forests, and the fear of their permanent destruction, that the manufacturers were restrained by Parliamentary influence from using timber as a fuel. This enactment proved disastrous to the manufacturing interests, as there being then no other known fuel, a temporary cessation of manufacturing followed. Fire is the deadliest enemy of our forests, but this danger is, happily, kept in check by systems of forest ranging, that have been established by the Provinces, and to which is attributable an immense saving of our forest wealth from destruction.

E. C. Steele,
Sault Ste Marie, Ont.



THE WABESEE RAPIDS.
On the Lievre River in the heart of one of the finest deer ranges of Quebec

AN INTERNATIONAL PARTY.
Taken on Massanoga Lake, Ontario. Some of the passengers are Iroquois Indians.

OVIS FANNINII

The great white sheep of the Yukon country.

Our Medicine Bag.

A correspondent asks where "Ski Running," by Mr. E. C. Richardson, is to be obtained in Canada. We understand that Messrs. A. T. Chapman, 2673 St. Catherine Street, Montreal, and Mr E. M. Renouf, 2238 St. Catherine Street, Montreal, intend carrying this book in stock.

The following extract from the address of President Roosevelt to the Congress of the United States is of great interest:—

"The study of the opportunities of reclamation of the vast extent of arid land shows that whether this reclamation is done by individuals, corporations, or the state, the sources of water supply must be effectively protected and the reservoirs guarded by the preservation of the forests at the headwaters of the streams. The engineers making the preliminary examinations continually emphasize this need and urge that the remaining public lands at the headwaters of the important streams of the West be reserved to insure permanency of water supply for irrigation. Much progress in forestry has been made during the past year. The necessity for perpetuating our forest resources, whether in public or private hands, is recognized now as never before. The demand for forest reserves has become insistent in the West, because the West must use the water, wood, and summer range which only such reserves can supply. Progressive lumbermen are striving, through forestry, to give their business permanence. Other great business interests are awakening to the need of forest preservation as a business matter. The government's forest work should receive from the Congress hearty support, and especially support adequate for the protection of the forest reserves against fire. The forest-reserve policy of the government has passed beyond the experimental stage and has reached a condition where scientific methods are essential to its successful prosecution. The administrative features of forest reserves are at present unsatisfactory, being divided between three bureaus of two departments.

Much has been said and written for and against using cast or leaden alloy bullets in the modern quick twist rifles. The manufacturers of ammunition generally instruct their patrons that they cannot be used. Of course any one knows that if he is required to purchase a new cartridge every time he shoots, his sport must soon become very expensive. Many who desire to economize and at the same time convert their high power rifles into less dangerous weapons for short range armory work and small game shooting at distances of two hundred yards and under, will be interested in the new bullets here illustrated. They were designed by Mr. Barlow of the Ideal Mfg. Co. They have proved to be wonderfully accurate. With bullet No. 308,241 Lieut. W. C. Gannon of Co. "C." 4th Regiment of Infantry, New Jersey National Guard, made ten consecutive bulls-eyes at two hundred yards, Creedmoor target, at the regimental range at Marion, N. J., on Oct. 3rd, 1903. This shooting was done standing, off-hand, with regular military sights. Again on October 10th, 1903, at the regimental armory indoor range, eighty yards, he, in a standing position, off-hand, made five successive bulls-eyes. Afterwards in the prone position, off-hand, he made nineteen successive bulls-eyes, the other being a four, scoring ninety-nine out of a possible one hundred, which is believed to be the highest indoor score ever made with a military rifle (30-40 Krag-Jorgenson.) There was no cleaning and no leasing.

The information relative to this wonder-

It is therefore recommended that all matters pertaining to forest reserves, except those involving or pertaining to land titles, be consolidated in the Bureau of Forestry of the Department of Agriculture."

The Trade and Navigation returns for the fiscal year ending 30th June, 1903, show the imports into Canada of forest products, manufactured and otherwise, as having a value of $6,166,834, the value of the free goods being $5,015,121. Much the larger proportion of these goods were imported from the United States, some of the principal items being:—Oak, 38,055,060 feet valued at $1,268,053 ; cherry, chestnut,gum, hickory and whitewood, 7,439,264 feet, valued at $305,657 ; walnut, 1,182,710 feet, value $55,600 ; white ash, 1,069,001 feet, value $42,392; veneers $132,747.

The exports of products of the forest amounted to $36,386,015, to which must be added $4,473,952, the value of manufactures of wood. The most important item among the manufactures is wood pulp, $3,150.943, while the pulpwood exported is estimated at $1,558,560. The quantity exported in the log was 51,803,000 feet valued at $434,128, and of planks and boards, 954,241,000 feet, valued at $14,005,128, and of planks and boards 954,241,000 feet valued $14,005,708, going mainly to the United States; the value of spruce and pine deals was $11,967,921, and of square timber $2,551,664, most of which was sent to Great Britain.

The merry little beagle has been the favorite with sportsmen since the days of good Queen Bess who, by the bye, was the owner, so history tells us, of a pack of "singing beagles" that could be carried in a man's gauntlet. Of course, there are different sized beagles and various sized men, and, consequently, all sorts of sizes in gauntlets, so that we need not be too sceptical. Of late years this breed has come into well-deserved prominence in the United States, so that we welcome a little treatise on this sporting breed that has just been issued from the Wheaton College press. Mr. Reno B. Cole is the editor, but the various chapters are contributed by Messrs. Pulley, Tatham, Steffen, Zimmer, Brooke, McAleer, Jones, Higginson and Lord, in addition to Mr. Cole, and these are names to conjure with in the beagle world.

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ful shooting, Lieut. Gannon gives as follows: "For the two hundred yards range, sights were elevated for 600 yards, for the eighty yards, the elevation was four-hundred and fifteen yards. Shells used were U. M. C. primers U.M.C. 8½. For the two hundred yards the charge of powder was nine grains of Laflin & Rand's "Sharp-Shooter," and for the eighty yards eight grains of the same powder. The bullet was cast from Hudson's alloy; sized in Ideal Lubricator, and Sizer left .312 inch in diameter. It was seated in shell with Ideal No. 3 tool, forward band projecting beyond the muzzle of the shell; shell not crimped, but indented with Ideal Shell Indentor." This combination of bullet, powder, shells, primers, fire-arm and "man behind the gun" seems to demonstrate without a doubt that shells may be reloaded advantageously, with lead bullets and smokeless powders for use in modern quick twist rifles.

We are informed by the Ideal Co. that bullets Nos. 308,241, and 311,243, will hereafter be cut in the moulds attached to No. 6 tool for all of the 30-30's and 3033 Savage rifles respectively, and that these bullets may be seated with the same chamber that seats the regular metal patched bullets for those arms. In that case, the chamber will crimp the same as it does with the metal-patched bullet, but there must be extra chambers with no crimp for seating the bullets same as Lieut. Gannon. For the 303 British and 30-40 Krag, there must be an extra chamber, as these bullets are shorter over all than the regular metal-covered bullets.

If our readers are interested, further information may be obtained by writing the Ideal Mfg. Co., New Haven, Conn., U.S.A.

The chapters deal with the history of the beagle in America; the beagle from an English standpoint breeding; rearing; kennel management; formation of a pack; training; field trials; bench shows; drag-hunts; the pocket beagle; the English and American standards; list of bench show champions and list of field trial champions.

According to Mr. Jones, fifty per cent. more beagles are now shown on the bench than was the case five years ago. Of course, owing to this much greater competition, condition has become a more necessary study. In past years when a judge had fewer dogs to compare, one with the other, conformation was shown, almost the only factor taken into consideration; now-a-days a dog badly shown would have a poor chance, hence this knowledge must be obtained by the successful exhibitor, and we do not know where he will obtain it outside the practical school of experience, better than between the covers of this little book.

A new edition, completely revised, and highly extended, of Dr. G. Brown Goode's American Fishes has just been issued by Dana, Estes & Company, Boston. The work of revision and extension has been done by Dr. Theodore Gill, Professor of Zoology of Columbia University.

Fifteen years have passed since the publication of Dr. Goode's work on American Fishes. Its merits soon became appreciated, and it has been for some time out of print. Messrs. Dana, Estes & Company, being impelled thereto by a continued demand for the work, resolved to reissue it, but before doing so had it brought up to date, wisely, by Dr. Gill. The species in the original work have been considered mostly in an approximately systematic order. To supplement this, lists of the species of economic value, or esteemed as angle fishes, have been given under five geographical divisions. (1) The fresh waters east of the Rocky Mountains; (2) fresh waters west of the Rocky Mountains; (3) the Atlantic Coast; (4) the Florida and Gulf Coast; (5) the Pacific Coast. It is well known that Dr. Goode has supreme confidence in Dr. Gill, and there can be no doubt that he would have chosen this latter gentleman to revise his work had it been possible for him to do so. They collaborated in many cases and the methods of the one were the methods of the other.

The fifth annual meeting of the Canadian Forestry Association will be held at Toronto on the 10th and 11th March, 1904. The programme is now being arranged and will be completed shortly, when full announcement will be made by circular to the members of the Association. The papers already promised include "The Systems of Administration of Timber Lands in Canada" by Aubrey White, Assistant Commissioner of Crown Lands for Ontario; "The Laurentides National Park" by W. C. J. Hall, Department of Lands and Forests, Quebec; "Forestry in Relation to Irrigation" by J. S. Dennis, Irri-

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The most complete catalogue of power launches is that issued by the Matthews Boat Company of Bascom, Ohio. This catalogue, which will be sent upon request, contains not only a very full description of the Torpedo Launches manufactured by this Company, but in addition, much useful information regarding the barometer, buoys, and beacons, the compass, judging distance, navigation rules, estimation of power, and other things a sailorman should know. The launches vary in size from a 17-foot with beam of a 4-foot 8-inch. and an extreme draft of fifteen inches, to a yacht 62 feet in length, and with a fifty horse power motor, having ample sleeping accommodation for twelve persons.

This is the range of XXX launches illustrated and described in this catalogue, but the Company is prepared to build still larger a craft if so requested.

The launches made by this company are known all over the country, and are the standard by which others are judged.

gation Commissioner for the Canadian Pacific Railway Company; "Forest Reproduction in Germany", A. Harold Unwin, of the Dominion Forestry Branch. Other aspects of forestry in relation to lumbering, agriculture and education, will be dealt with by practical men, who are prominent in these different branches. It is expected that this will be the most successful annual meeting yet held.

At the annual meeting of the American Forestry Association held in Washington recently, Mr. Gifford Pinchot, Chief Forester for the United States; Mr. E. Stewart, Dominion Superintendent of Forestry, and Dr. Tarleton H. Bean, Director of the Forestry Exhibit of the Exposition, were appointed a committee to make arrangements for an International Forestry convention to be held at St. Louis during the World's Fair. No date was set for the convention, but it will probably be early in the fall of 1904.

We very seldom make mistakes, and still more rarely do we acknowledge them when we do make them, but it is clearly up to the Editorial Department of this magazine to explain why in the sub-title of the cut of "Quebec Winter Sports" we were so careful to explain that his Excellency, the Governor-General and Lady Minto, were in the picture. The only explanation

that we can offer is such a poor one that it is really in the nature of an apology, but such as it is we tender it with befitting humility. The photograph, from which this cut was made, does not represent the Regal party, but a lot of very worthy Quebec citizens, who were having a good time in a modest way, but as it was one of a series that came to Rod and Gun from the same source, and as some of the others represented his Excellency and Lady Minto in snowshoeing costume, we, unfortunately, took it for granted, that all the photographs were taken at the same time and in the same place.

Mr. Frank Chapman is well known as an ornitholigist and as an author, and a new book from his pen will be welcomed by all bird lovers throughout the Dominion. His latest contribution is "Color Key to North American Birds." It consists of a short, but of course, technical, accurate description of each bird, together with copious illustrations in outline or color by Chester A. Reed. Both author and artist have succeeded admirably in their work, and we believe that the publishers, Messrs Doubleday, Page & Company will find that this book will have a large sale. Moreover, we think it deserves it.

W. G. C. Manson, the Lillooet guide, has recently been interviewed in Vancouver. He has strong views on the British Columbian Game Act. A thorough sportsman himself, he states that unless more stringent measures are taken to preserve mountain sheep they will all be destroyed. He advocates a license for everyone whether a resident of the province or not, who hunts sheep. Under present conditions many heads are illegally shipped out of the province, he says, and this should be put a stop to in the interests of game preservation

N. Y. Commercial, Dec. 9, 1903: An attempt on a large scale to introduce English song birds into British Columbia is being made. The Victoria Natural History Society is taking out from England about five hundred birds, consisting of one hundred pairs of goldfinches, one hundred pairs of larks, and fifty pairs of robins. They go by way of New York to Victoria. In accordance with the arrangements that have been made, half of the consignment will be placed in Vancouver and taken care of there until next Spring when they will be distributed throughout the woodlands of the lower mainland. The remainder will be placed in Beacon Hill Park aviary and kept until Spring, when they will be given their liberty at various points on Vancouver Island.

Rod and Gun has many valued contributors scattered throughout the great Dominion and in the United States. We have, however, comparatively few poets among them, so that it is with more than ordinary gratitude that we read contributions in verses from those that love us and wish us well. Only the other day we had the

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The Savage Arms Company 1904 Calendar is a very beautiful specimen of highly artistic work. The artist is Mr. Carl Rungnies. The artist has depicted a scene familiar enough at one time in the American west, and not one entirely unknown even today. A frontiersman with his well-trained saddle horse standing nearby, is bending over a form of a large bull elk that has just fallen to Savage. The scene is pitched in the Rockies and the artist has evidently worked up material for his subject on the ground. This most pleasing calendar will be forwarded on receipt of an application, accompanied by ten cents in stamps, addressed to the Savage Arms Company, Utica, N. Y., U.S.A.

pleasure of opening an envelope from the fertile Northwest, which contained a gem of poetic expression. The writer had sent but one stanza, but, nevertheless, we may venture without fear of contradiction, to state that genius is apparent in every line; the sacred fire is there, notwithstanding the frost of which the gentleman makes such feeling mention.

"Oh Manitoba is the place !
"The wide, wide world for those
"Who have no heart for laboring,
"Who're afraid of getting froze.
"When the frost is gone,
"We'll start the plow,
"We'll turn the prairie o'er ;
"For six months' work we'll get a year's pay.
"And eat and drink galore."

The fourth annual meeting of the North American Fish and Game Protective Association was held at Portland, Me., on January 20th and 21st. It was a most successful reunion, one hundred and fifty members being present. The officers for the ensuing year are: President, L. J. Tweedie, Chatham, N. B. ; Vice Presidents, H. O. Stanley, Dixfield, Me., W. F. Hinman, Boston, Mass., R. E. Plumb, Detroit, Mich., A. T. Dunn, St. John, N.B.; C. H. Wilson, Glens Falls, N.Y., G. A. McCallum, London, Ont., J. T. Finnie, Montreal, F. G. Butterfield, Vermont, C. S. Harrington, Halifax, G. A. Megeath, Franklin, Pa. ; Secretary - Treasurer, E. T. D. Chambers, Quebec.

The Government of the Province of Ontario is deserving of congratulation on the extensive addition which has been made to the Timagami Timber Reserve. The Reserve, as originally set apart, comprised an area of 2,200 square miles, and there has now been added a further tract of 3,700 square miles, making the total area 5,900 square miles, or 3,876,000 acres. The Reserve will not be bounded by rectangular lines. Following up from the northeast corner of the former reservation about opposite the head of Lake Timiskaming, the eastern boundary follows in a northwesterly direction along the Montreal River and Matatchewan Lake to Trout Lake where it follows on west and north lines the surveyed limits of townships which include what is mainly agricultural land. The northern boundary of the tract is Niven's base line, which is in latitude forty-eight degrees, 27 min., 54 sec. This is the apex of the irregular right angled triangle, which forms the reserve and from there the western boundary follows the Kenogamisse, Metagami, Opickinimka, and other smaller lakes to Proudfoot's base line, a distance of about one hundred miles. It then follows surveyed lines easterly to join the old limits, making a base of over eighty miles. Although there are surveyed townships of good agricultural land in the vicinity of the reservation, no settlement has been made within its bounds and as the lands comprised within it are rocky and almost entirely unfit for cultivation, public opinion should support strongly the decision to hold them for growing timber. The reserve covers one of the largest and most valuable forests of pine and other timber in existence in Ontario, and the recent sale shows something of its value to the state. The withdrawal of the land from settlement will be in the interest of the settlers as successful cultivation of them is impossible, and thus also one of the great dangers of fire will be prevented. The small staff of fire rangers employed on the old reserve will have to be increased but the splendid work done by them at a small cost is reason sufficient that the numbers should be made adequate and the millions of dollars standing to the credit of the Province in this reserve should be preserved as carefully as if it were actually turned into money at the present time. For the forest stands there a guarantee of the credit of the province and an easily read prophecy of future prosperity.

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February, 1904

Communications on all topics pertaining to fishing, shooting, canoeing, the kennel and amateur photography, will be welcomed and published, if suitable. All communications must be accompanied by the name of the writer, not necessarily for publication, however.

The Official Organ of the Canadian Forestry Association.

ROD AND GUN IN CANADA does not assume any responsibility for, or necessarily endorse, any views expressed by contributors to its columns.

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ROD AND GUN is the official organ of the Association, which supplies the articles relating to Forestry published therein.

This Association is engaged in a work of national importance in which every citizen of the Dominion has a direct interest. If you are not a member of the Association your membership is earnestly solicited.

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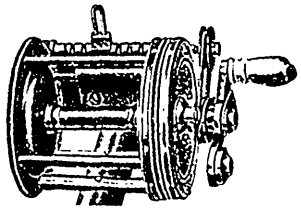

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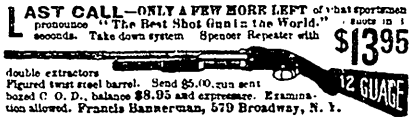

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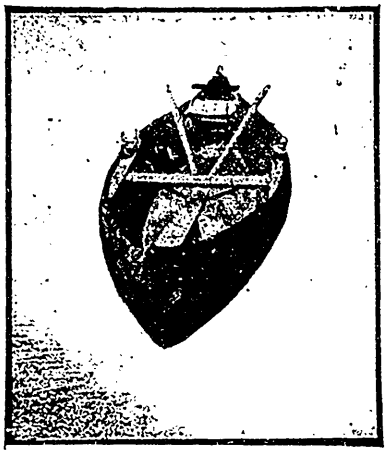

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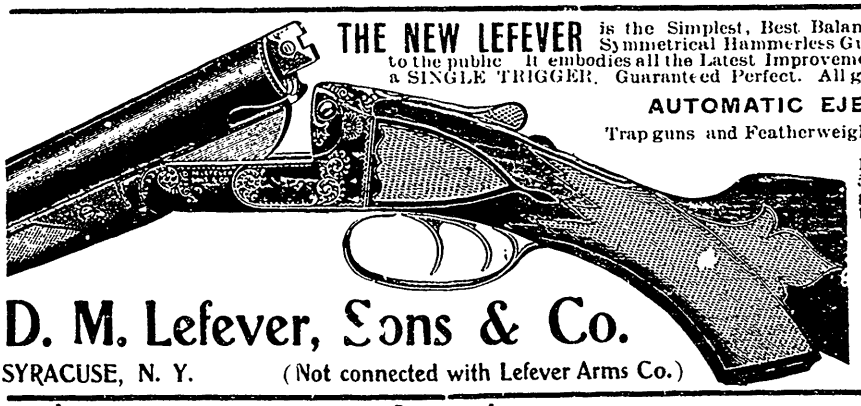

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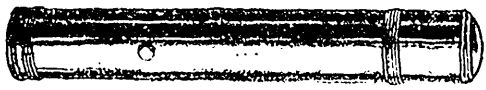

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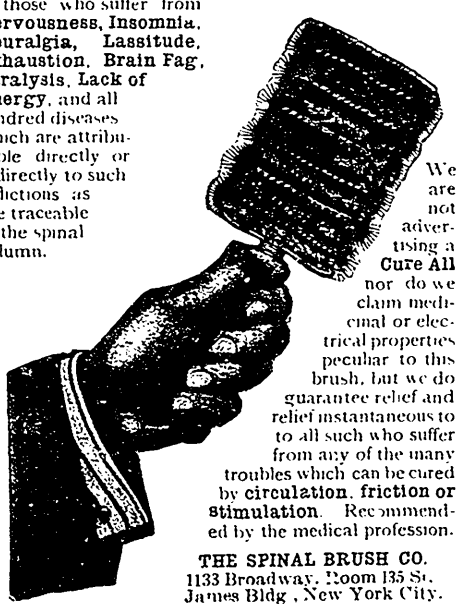

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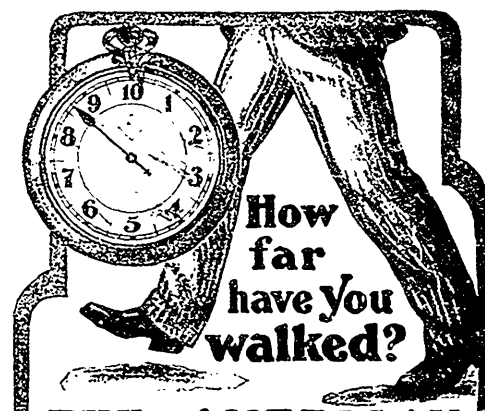

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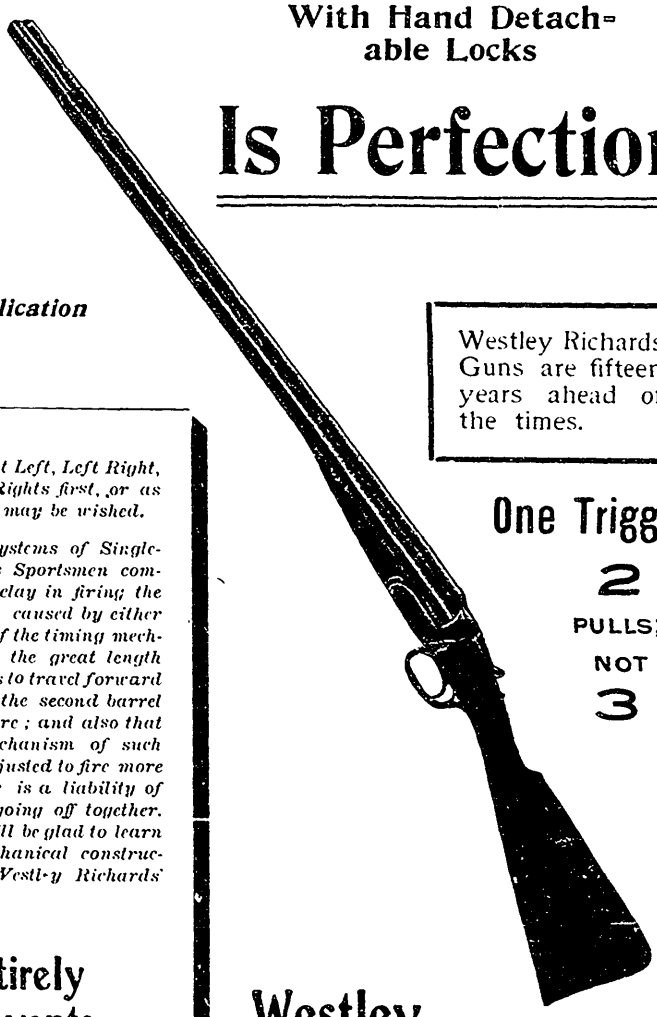

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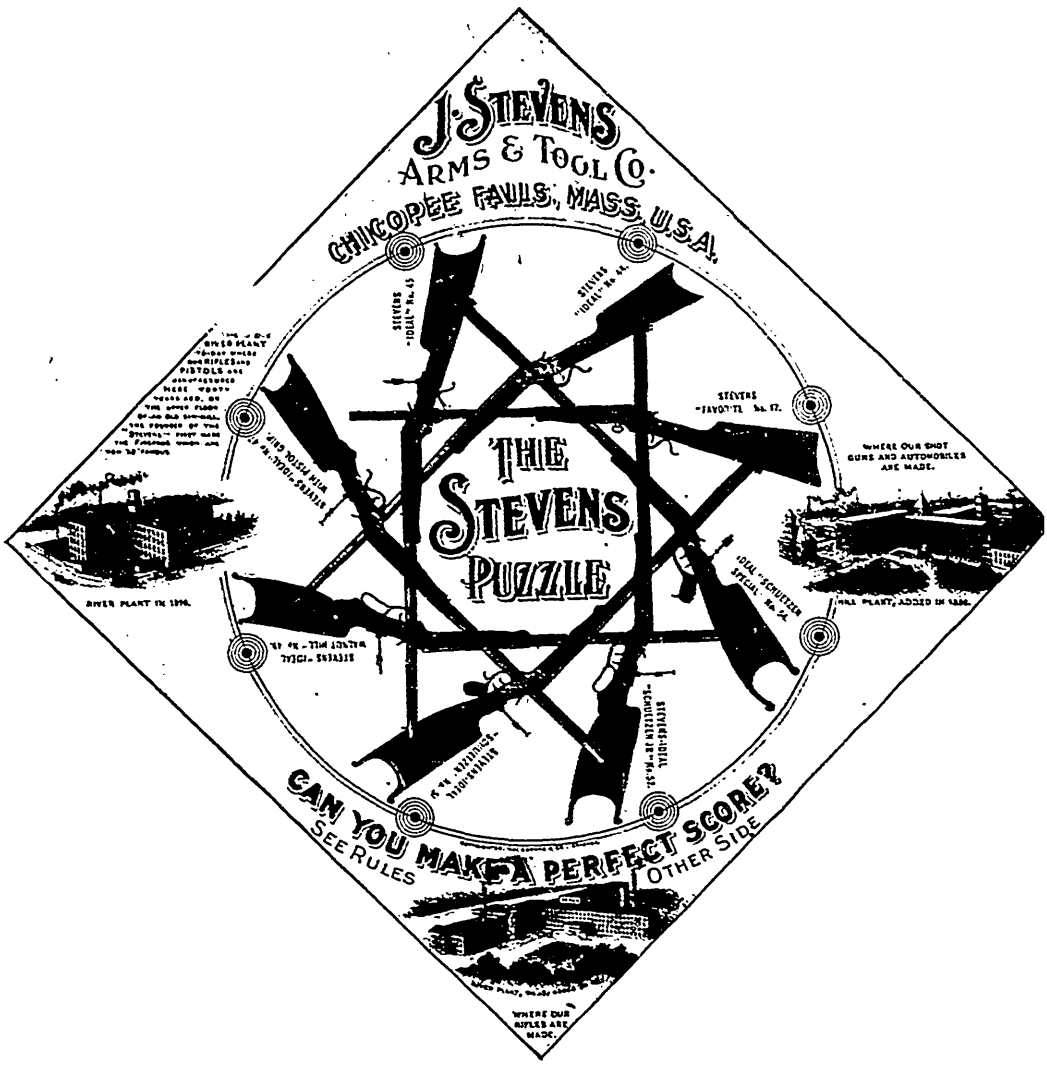

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