Article XIII. — REPORT ON THE BIRDS COLLECTED IN NORTHEASTERN SIBERIA BY THE JESUP NORTH PACIFIC EXPEDITION, WITH FIELD NOTES BY THE COLLECTORS.

By J. A. Allen.

This is the second of a series of papers on the zoological results of the Siberian Division of the Jesup North Pacific Expedition. The first article, relating to the mammals, was published in this Bulletin, in 1903 (Vol. XIX, pp. 101–184, and pp. 195, 196, March 31 and May 9, 1903). The collection of birds, like the collection of mammals, was made chiefly by Mr. N. G. Buxton, but many specimens were presented to the Expedition by Mr. Nicoli Polowitch Sokolnikoff, Governor of the Anadyr District, with headquarters at Marcova. He also gave to Mr. Buxton important field notes on the birds occurring in the vicinity of Marcova, which are incorporated in the present paper.

As Mr. Buxton's itinerary and general description of the country has already been published in full in the report on the mammals (l. c., pp. 104-119), it is unnecessary to republish any part of it here.

The collection of birds contains 800 skins and a number of nests and eggs, all of which were collected by Mr. Buxton except about 50 specimens from Marcova, and about 170 from the head of the Gulf of Anadyr presented by Mr. Sokolnikoff. Mr. Buxton's bird skins (about 580 in number) are all beautifully prepared, and are in every way first-class material; the others are quite roughly made, but are nevertheless an important and most welcome addition to the collection, including, as they do, quite a number of species not obtained by Mr. Buxton. On a trip made by Mr. Buxton from Vladivostok to Lake Kanka, mainly for fishes, a few birds were taken, representing four species (Hydrochelidon leucoptera, Tynx torquilla, Alauda intermedia, and Uragus sibiricus) not met with by him at Gichiga, where he collected from August 19, 1900, till October 4, 1901. Respecting his bird work at Gichiga and the character of the country in which his collection was made, he has kindly furnished the following important information:

"All of the birds in the collection labeled 'Gichiga' were collected within a radius of 35 miles from my station at Kooshka, which is situated on the left bank of the Gichiga River in latitude 62° 42′ E. The greater part of them were collected within a radius of 10 miles.

This larger area, and even the smaller one, was quite diversified in its physical features. It included low barren mountains, foothills, and high, rolling tundra dotted with small lakes; low, moist tundra, marsh land, and mud flats; river bottoms filled with larch, willow, and alder; high, rugged seacoast, rocky islets, and shingle beach. With the exception of a few species, bird life is not abundant in this region, and many species evidently appear there only as stragglers or as transients. As at any place in the high north, birds are abundant only during a few weeks in spring and fall, while migrating, and during the summer they are not even common. Roughly speaking, May I may be put down as the beginning of the spring migration, September I as the beginning of their return from further north, and October I as the close of the fall migration.

"The Russian people at Gichiga are very ignorant and poor observers. They have definite names for only a small per cent. of their native birds. Nearly all the small land birds are called P'teet-ish-ka, the diminutive of P'teet-sah, meaning bird. The larger shore birds are called Koo-leek, and the smaller ones, including the sandpipers, and also the phalaropes, are called Koo-lich-kah, the diminutive of Koo-leek."—N. G. B.

With the bird skins from Marcova, presented by Mr. Sokolnikoff, is a list of the species, with brief field notes by him, and also a supplemental list of birds known to him to occur at Marcova, but of which there were no specimens in his collection. These notes, in cases where the identification of the species seemed beyond question, have been utilized in the following paper. Of this gentleman, Mr. Buxton says:

"Mr. Sokolnikoff is a very intelligent and highly educated man, an officer of the Russian army, who had been in charge of the post at Marcova for four years, and who was greatly interested in the fauna of that region. While the information I received from him was meager, owing to my inability better to understand Russian, still it is, together with the specimens, of much value in making up a list of the birds of that district."

Mr. Buxton's field notes on the species of birds taken or observed by him are given in marks of quotation, followed by the initials N. G. B. Mr. Sokolnikoff's notes are similarly distinguished, and are followed by the initials N. P. S. There are no notes beyond the locality and date of collecting with the specimens from Novo Marinsk. Great credit is due Mr. Sokolnikoff for interesting himself so deeply in the ornithological work of the Expedition and adding so materially

to the collection of birds. The specimens from Novo Marinsk were transmitted through Mr. Waldemar Bogoras, one of the ethnologists of the Expedition, and those from Marcova, as above stated, through Mr. Buxton.

The number of species represented in the collection is 125, of which two—an Alauda and an Anthus—appear to be not heretofore described. Two species, a Swan and a Swift, are included on the basis of Mr. Buxton's notes, making a total of 127 species here recorded. Respecting many of them, Mr. Buxton's field notes are very full and satisfactory, adding much first-hand and original information respecting the ornis of the lower Gichiga River, and forming the first standard, though, of course, more or less incomplete, list of the birds of a single definite locality in Northeast Siberia.

- 1. Colymbus holbællii (Reinhardt). Two specimens: Gichiga, male, June 8; Marcova, immature, August.
- "A very rare bird at Gichiga, this being the only one observed. The residents here have seen it before, but report it as very rare."—N. G. B.
- "Rare at Marcova; probably breeds, as young have been seen in August." N. P. S.
- 2. Colymbus auritus (Linn.). One specimen, in immature or winter dress, Gichiga, August 27.
- 3. Gavia adamsi (Gray). Two specimens, and the head and feet of another. The head and feet are those of a young bird, labeled Marcova, September 1. The other specimens are from Post Novo Marinsk, head of the Gulf of Anadyr.
- "Yellow-billed Loon. Russian local name, Gah-gár-ee. The Russians say that there are three species of Loons found at Gichiga. Besides the two represented in the collection, there is also a very large one with a white bill. It is very rare and occurs only in spring and fall. I saw none." N. G. B.
- 4. Gavia arctica (Linn.). Ten specimens: 2 adult males, 5 females, and a young bird still retaining most of the downy first plumage attached to the tips of the growing feathers of the second plumage. All but two were taken at Gichiga, as follows: June 24, August 1, September 4, 16, and 19, and October 2. The young bird still in the downy plumage was collected September 16, indicating a late breeding date. Two specimens, adult, from Marcova.

"Russian local name, Gah-gár-ee. Common fall migrant and summer resident. I saw none of these during the spring of 1901, but in the fall of 1900 and 1901 they were common. In 1901, they first appeared on the river, July 31, and soon became abundant in the lower portion of it near its mouth. On September 23, I saw there a flock of 50, and on October 1 a flock of 30. During the first of August, while goose shooting on the large lakes down the mainland coast, I saw many of them. They nest about the larger lakes, which are found further inland. They disappear entirely by the last week in September. A very few nest near Kooshka. One young was taken there, August 30, 1900, and another September 19, 1900."—N. G. B.

"Common at Marcova; breeds." - N. P. S.

5. Gavia lumme (Gunn.). — Ten specimens: 2 adult males, 1 young male, and 4 females, Gichiga, May 18 and 19, June 5, August 27 and 30; 2 adults, Marcova, May 30; 1 adult, Novo Marinsk.

"Red-throated Loon. Russian name, Gah-gár-ee. Abundant summer resident. First birds arrived May 16; became abundant by May 24. The first birds are seen on the tundra pools, as they arrive before the river is open. After it is clear they are common on the river for a week or ten days, when they move to the tundra lakes and pools and prepare for nesting. Two sets of three eggs each, were taken June 19; the nests were placed on small islets or bunches of grass in the lakes. By the latter part of July they are again common on the river, where they remain until the latter part of September, when they all disappear. There is scarcely a moment, day or night, from the time they arrive until they depart, that one cannot see one flying up or down the river or over the tundra, uttering its goose-like cackle, or hear its weird, dismal notes from the river or tundra lakes."—N. G. B.

6. Lunda cirrhata (Pallas). — Five specimens, of which 4 (2 males and 2 females) are from Gichiga, June 12, and 1 from Novo Marinsk, head of the Gulf of Anadyr, June 15.

"Tufted Puffin. Russian name, Tō-por-oky. An extremely abundant summer resident, breeding in suitable places in immense colonies. The first arrivals appear during the first week of May, although they do not become abundant before the 15th of May. They do not come further up the coast than Matuga, 12 or 15 miles south of the mouth of the Gichiga River.

"The largest island at Matuga is situated about one mile off the point and rises precipitously on all sides to a height of two to three hundred feet. On its eastern, southern, and western sides, where it is exposed to the wash of the sea, it rises perpendicularly, and its top is not accessible from these sides. But on the north side, which is also very steep, a little soil covers the crumbling rocks so that one can ascend it with difficulty. It is composed of metamorphosed shells, seamed with quartz and basalt, and on top of it, imbedded in the soil, are found snail and mussel shells that cannot be distinguished from those now living in the water below. The top of it is covered with a deep, black soil on which is a luxuriant growth of grass and plants the same as found on the mainland. Close to the edge where this soil has slipped off into the sea, the Tufted Puffins dig holes in the black earth and there deposit and hatch their single egg. Every crevice in the small loose rocks on the north side is also occupied. The island is about one half mile long, and varies in width from a few yards to two hundred. Numerous gulls and shags also nest in the more accessible places, but not one Horned Puffin is found on the entire islet. At the report of a gun the birds fly out over the water in such numbers as almost to darken the sun, and the noise they make is indescribable.

"The Koraks and the Russians from Gichiga visit this place every year and collect the eggs. The Koraks are very fearless eggers and obtain large numbers. The height of the nesting season is the second week in June when most of the eggs are fresh. The Puffins leave about the middle of October, although some remain later. Puffins are eaten by the Koraks and Russians, and are considered equal to ducks." — N. G. B.

- 7. Fratercula corniculata (Naum.). Eight specimens, of which I is from Gichiga, July 23, and 7 from the Alooshka River, near Novo Marinsk, head of the Gulf of Anadyr (Sokolnikoff, June 2).
- "Horned Puffin. Russian local name, To-por-óky, in reference to its bill resembling an ax blade.
- "A few nested in the cliffs below the mouth of the Oveche River, and they were quite common along the coast from this place down to Chaibook Point. At Matuga Island, where the Tufted Puffins nest in such vast numbers, this species is entirely absent. The Cossacks said that further down Taiganose Peninsula they were abundant. They arrive the latter part of May and remain until the end of the first week in October."—N. G. B.
 - "Abundant in the Gulf of Anadyr, where they breed." N. P. S.

8. Cepphus carbo Pallas. — Two specimens, males, Gichiga, June 10 and 17.

"Spectacled Guillemot. Quite common along the coast of the Taiganose Peninsula south of Chaibook Point, where I saw them swimming in the water close in shore or sitting on the rocks near the water. They breed there, although I saw none of their nests. They have a sharp, squeaky note, similar to that of the auklets. I saw them every day from June 10 to 17, 1901, but had no other opportunity of visiting their resorts. It is not unlikely that they winter there, as the water is more or less open all winter." — N. G. B.

9. Uria lomvia arra (Pallas). — One specimen, Novo Marinsk, June 13.

"Pallas's Murre. Russian local name, Ahr'-rah. I saw a few at Chaibook Point and Matuga Island during the second week of June, 1901, and the Cossacks who were with me said that it was extremely abundant further down the coast of Taiganose Peninsula, where it nested, and that they had collected its eggs there." — N. G. B.

"AUKLETS. — One or more species of Auklet will probably be found breeding along the southern portion of Taiganose Peninsula and along the western coast of Okhotsk Sea in the Gichiga region, as I saw many at sea half way between Gichiga and Ola on September 10, 1901. As I had no glass I was unable to identify them." — N. G. B.

- 10. Stercorarius pomarinus (Temm.). Two specimens, Novo Marinsk, head of Gulf of Anadyr, June 10.
- 11. Stercorarius longicaudatus Vieill. Three specimens: Gichiga, June 4; Marcova, May 1; Novo Marinsk, head of Gulf of Anadyr, July 18.

"Long-tailed Jaeger. Russian name, Res-boy-nick, meaning robber. This specimen was killed by a Cossack on the tundra above the settlement of Gichiga, where it is said to breed sparingly. On May 25, 1901, I saw one flying northward over the tundra at Kooshka, and on August 10, while down on the mainland coast, I saw two."—N. G. B.

12. Larus glaucus (Brünnich). — One specimen, an immature female, taken at Gichiga, October 9.

"Glaucous Gull. Russian name, Chái-kah. During the first week of October, 1900, I saw one of these large white gulls along the river

several different times, tormenting the old squaws or sitting on the gravel bars." — N. G. B.

13. Larus schistisagus Stejneger. — Thirty specimens, of which 17 (7 males, 10 females) are adult, and 13 immature, varying in age from a single specimen partly in downy first plumage to birds beginning to acquire the dark mantle. They were all collected at Gichiga as follows: 17 in May, 2 in July, 5 in August, and 6 in October.

"Russian name, Chái-kah. This is the most conspicuous and one of the most abundant birds along the Okhotsk Sea. From the time of its arrival until it departs there is scarcely a time when one cannot either hear or see one or more of these birds. The first arrivals are usually reported about the 20th of April, and from that time on they increase in numbers daily until May 1, when they have nearly all From the time of their arrival until the nesting season begins, they make daily excursions up the rivers in the morning and return to their roosting places along the seacoast in the evening. They go up the Gichiga River at this time as far as Christova, 30 miles above its mouth. Also at this time many may be seen soaring in large circles high over the tundra and marsh above the mouth of the river, when they utter a cry very similar to that of the Red-tailed Hawk during the breeding season. None of the dark phase are seen among the earlier arrivals, but by the 15th of May they begin to appear and increase in numbers until they have all arrived, although at no time during the spring and early summer do they form any considerable per cent. of the thousands that one sees. Before the ice goes out of the head of the bay and river, their food supply is limited to the few dead salmon which the melting snow exposes on the gravel bars along the river beds, and the mussels they pick from the rocks along the seacoast at low tide.

"By the first of June, all of the breeders have repaired to the rugged seacoast and rocky islets lying off it, below the mouth of the river, to breed. Only the roughest and most inaccessible places are chosen for nesting sites, generally at the headlands where sections of the solid rocks have been partly or wholly separated from the mainland. The nests, which are loose, bulky structures, composed of grass and with but a slight depression in the center, are placed on ledges and the tops of rocks. Three eggs constitute a set, and they show the usual large variation in color and size found in the eggs of other species of Larus. The height of the nesting season is reached about June 10, when the Koraks visit their rookeries and obtain large [July, 1905.]

numbers of their eggs by being lowered down the cliffs with sealskin Many more breeders spend the summer on the bars and along the marsh near the mouth of the river, and on the gravel bars along its bed. After the nesting season is over, about the first of August, the breeders and young of the year join the non-breeders and they all spend the rest of the season in flying up and down the river, collecting in large flocks along the water front, and gorging themselves on the worn-out salmon that they find there. At this time they begin to fly up the river at two or three o'clock in the morning, continuing to fly until the middle of the forenoon, and then begin the return flight at 5 P.M. and continue to fly until long after dark, which does not occur at that time until 10 or 11 P.M. They are so abundant that on these flights there is one continuous long, loose flock of them without any considerable break or intermission. The height of the return flight is from 6 to 8 P.M. When the wind is strong they fly high, but when it is calm they fly low and are easily attracted. When one is killed on the wing, or a decoy is thrown into the air, all the gulls in the vicinity will immediately 'land about' and circle once or twice over the dead bird or decoy, changing their usual guttural cackle to hoarse 'squeals' of alarm before proceeding on their way. I have often seen them attempt to take a fish from the mouth of a seal, when it arose to the surface, and which the gull had been watching catch the fish. By the last of August, one dark or young one is seen to every four or five adult or white ones, and later the proportion of the dark ones is much higher, as the adults begin to leave first. first of October, the migration is well advanced, and decreases daily until the by 15th of October few remain, although the last of them do not leave until the last week of the month. They are the last of the migrants to leave in the fall.

"The residents say that many nest on the tundra, and have brought me eggs saying that they were taken on the tundra; and I have seen many of the gulls on the tundra during the nesting season which appeared to be breeding there, but I never found any nests." - N. G. B.

- 14. Larus argentatus Linn. Three specimens, 2 adult and 1 immature, Novo Marinsk, Gulf of Anadyr.
- 15. Larus canus Linn. Twenty-seven specimens, of which 26 are from Gichiga and 1 from Marcova. Seven are adults in breeding dress, 11 are adults in fall plumage, and 9 are birds of the year.

of the Gichiga specimens were taken May 1, 2 in June, 1 in July, 19 in August, and 1 each in September and October. They form a fine series of beautifully prepared skins.

"Russian local name, Gov-o-roós-ky. Not an uncommon spring migrant and summer resident, and common fall migrant. A few arrive at Kooshka during the latter part of May, and are seen in company with the larger gulls, which remain along the river all summer. On June 6, 1901, I saw a pair about a tundra lake in which there were several small grass-covered islets, and on June 24 I collected both of them (Nos. 841 and 842). They were evidently nesting there, although I could find no nest. They do not nest with the large sea-gull along the seacoast. About the middle of August they become common along the river and associate with the large gulls until they leave—the middle of September. When feeding they hover over the water and drop into it, keeping the wings extended while on the water, and then arise with the greatest ease." — N. G. B.

Marcova: "Arrives May 1; not common." — N. P. S.

16. Larus ridibundus Linn. — Seven specimens, apparently all birds of the year, taken at Gichiga, August 18-21.

"First appeared on the river, August 18, 1901, opposite my station, where they were feeding in the rapid water, hovering over and dropping into it like terns. From this time on, for about one week, they were common there and down at the mouth of the river. The Russian residents say that they are common down the seacoast about the last of May and the first of June, but do not remain during the summer. They are all gone from the river by September 1."—N. G. B.

- 17. **Xema sabinii** (Sabine). One specimen, in breeding plumage, Novo Marinsk, head of Gulf of Anadyr.
 - 18. Sterna paradisæa Brünn. One specimen, Marcova.
- 19. Sterna camtschatica Pallas. Nine specimens, 5 adult and 4 immature, taken at Gichiga, August 17-20.

"May 27, 1901, I saw a flock of 200 or more flying down the river high in the air. May 28, 1901, I saw a large flock feeding on the river just below my station (Kooshka), but I saw no more until I visited Christova, 30 or 35 miles up the river, the second week of July, when I observed perhaps 10 flying up and down the river and sitting on the large gravel bars at that place. During the third week in

August they were common on the river opposite my cabin, feeding in the rapid water at that place. The Russians say that they are common, and are well acquainted with them. There are no sandy beaches around the head of the Okhotsk Sea suitable for them to nest on, and it is probable that they nest on the sand and gravel bars along the upper reaches of the Gichiga and Ovecho Rivers." — N. G. B.

20. Hydrochelidon leucoptera (Meisner & Schinz). — One specimen, adult female, Lake Kanka, June 1.

"This handsome tern is very active late in the afternoon and evening, when it flies in large flocks over the low marshy places along the lake front where there are low willows. During the earlier part of the day it is not seen. It is less noisy and much shyer than the Arctic Tern [= Sterna camtschatica, as shown by his notes], which is also here. Nests on sandspits along the lake south of here." — N. G. B.

- 21. Puffinus tenuirostris (Temm.). One specimen, Novo Marinsk, head of Gulf of Anadyr.
- 22. Phalacrocorax pelagicus (Pallas). Eight specimens: six from Gichiga, in breeding dress, with the white neck and back plumes, May 13 and June 12; one adult from Marcova in moult, and an immature specimen from Novo Marinsk, Gulf of Anadyr.

"Russian name, Oō-rél-v. Arrives by the end of the first week in May, and the last of them depart by the second week of October. Very abundant along the rocky coast of Gichiginski Gulf. They are also abundant along the mainland coast at least as far south as Avan. They do not come up the Gulf further than Chaibook Point, six miles south of the mouth of the Gichiga River. At this place, and six miles further south, at Matuga Point, there are several rocky islets with precipitous sides where thousands of them nest. Their nests are placed in the most inaccessible places on top of ledges and projections. The nests are large and bulky and composed of kelp and sea-weed. The eggs are chalky-white, with a bluish tinge. Five to seven constitute a clutch. The eggs are not palatable on account of the strong flavor, although the Koraks gather and eat them. The height of the nesting season is reached by the roth of June. The males assist in the work of incubation. Both No. 835 and No. 836 (males) were shot on nests, and one more male, not in the collection." - N. G. B.

23. Merganser serrator (Linn.). — Five specimens: 4 from Gichiga, June 4, September 19, and October 5; one from Marcova, without date.

"Not an uncommon spring and fall migrant, arriving the middle of May and departing by the end of the first week in October. During the spring and fall a few pairs or small flocks may be seen flying up and down the river or resting upon it. I saw a few single birds and pairs flying up the river during the first week of June, and one single bird, July 10, 1901, at Christova, in the wooded country thirty miles up the Gichiga River. It is said to breed further inland."—N. G. B.

Marcova: "Common; breeds." — N. P. S.

24. Mergus albellus Linn. — Three specimens: 1 female, Gichiga, May 3; 2 males, Marcova, May 18.

"This duck, the first of the season to arrive, I killed on a small pool of water near my station, May 3, 1901. This is the only one I saw at Gichiga, and it was unknown to the Cossacks." — N. G. B.

Marcova: "Common; breeds. Arrives latter part of May." — N. P. S.

25. Eunetta falcata (Georgi). — One specimen, an immature male, Gichiga, October 7.

"Rare at Gichiga. This single specimen was taken from a small flock, on one of the chain of tundra pools on the low tundra along the water front." — N. G. B.

26. Mareca penelope (Linn.). — Six specimens: 2 males and 1 female from Marcova, May 12; and 1 adult and an immature pair from Gichiga, May 4, August 27, and September 9.

"This was the second species of duck to appear at Gichiga in the spring of 1901. Near my station, on the morning of May 4, I killed one and winged another, and secured two in the fall. Reported rare; I saw very few." — N. G. B.

Marcova: "Common; breeds."—N. P. S.

27. Nettion crecca (Linn.). — Fifteen specimens: 6 adult males, 2 young males, and 7 females—of which 12 were taken at Gichiga, May 21-26, August 27, and September 6; 3 at Marcova, May 12 and 30.

"Russian local name, Chee-rôke. The most abundant representative of the ducks at Gichiga. Begins to arrive just after the middle of May (17th) and soon becomes common on the tundra pools, where they remain until the river opens, to which they then resort. By the end of the first week of June most of them have paired and begun

nesting on the tundra. The nest is made of grass and lined with feathers, and placed in the vicinity of a pool on the moist tundra. Many go further north to breed, and these reach Gichiga on their return about September 1. After the breeding season they repair to the river and the chain of pools near its mouth, where they remain until the middle or latter part of September." — N. G. B.

Marcova: "Not common; breeds." — N. P. S.

28. **Nettion formosum** (Georgi). — Three specimens: male and female from Gichiga, May 19 and 21; male from Marcova, without date.

"Rather common in spring and fall, and a few probably remain and breed, although I saw no nests. They begin to arrive in pairs about May 19, when they are found on the tundra pools until the river opens, the latter part of the month, which they frequent until they move on about the middle of June. They are again seen on the river and tundra pools about the first of September, but do not remain long. This bird is confounded with the smaller teal by the residents, which is abundant."— N. G. B.

29. Spatula clypeata (Linn.). — Three specimens, Gichiga, May 24, June 17, and September 17.

"Not common and rarely if ever seen in flocks, but singly and in pairs. Arrives middle of May and departs latter part of September. Observed at Gichiga only in spring and fall. Probably breeds in the vicinity, although I saw none during the summer. When resting on the tundra pools they have a peculiar clack-clack-clack, unlike the sound made by any other duck here." — N. G. B.

30. Dafila acuta (Linn.). — Eighteen specimens: 4 adult males, 3 immature males, 2 females, and 6 half-grown young, all from Gichiga, collected May 17-21, July 19 (brood of six young), August 1 (in moult), 29, and 30, and September 7; a pair from Marcova, May 14: a female from Novo Marinsk, head of Gulf of Anadyr.

"Russian local name, Vwos-tro-whost'. Next to the teal [Nettion crecca], this is the most abundant duck. The first pair arrived May 8, and in a few days they became common on the pools. Later they were common in pairs and small flocks on the river, but all left there for the tundra by the middle of June, where they nested. About the middle of August they collect in flocks and may be seen during the morning flying up the river, high overhead, and returning in the evening to the sea and the chain of pools along it. The young are

seen on the pools the latter part of July. They begin leaving in August, the males going first, and all are gone by the latter part of September. Those from further north arrive about September 1."—N. G. B.

31. Aythya marila (Linn.). — Fourteen specimens: Marcova, 3 specimens, May; Novo Marinsk, 1 specimen, May 12; Gichiga, 10 specimens, June 8 (male), and 15 (female), July 19, 2 females and 7 young, a few days old, in the first downy plumage.

"Shot on a slough near my station, May 26, 1901. The residents say that it is very rare. One of the fattest birds that I ever prepared, requiring two and a half hours. Nos. 912 and young (Nos. 913 to 919, inclusive) were taken on one of the chain of tundra pools along the water front, August 19, 1901." — N. G. B.

Marcova: "Common; breeds." - N. P. S.

32. Aythya fuligula (Linn.). — One specimen, adult male, Gichiga, May 23.

"Very rare; unknown to the Russian residents. Saw but the one, which I killed on a small tundra pool." — N. G. B.

- 33. Clangula clangula (Linn.). One specimen: female, Gichiga, October 19.
- 34. Harelda hyemalis (Linn.). Thirteen specimens: Gichiga, 1 adult male, July 28; Marcova, 5 males and 2 females; Novo Marinsk, 3 males and 2 females.

"Old Squaw. Russian local name, Sáhf-kah. An abundant spring and fall migrant, and a few remain all summer and probably breed, although I found no nests and saw no young. They first appeared in the open places in the river, May 22, but they had probably been outside on the sea some time before that date. After the river cleared of ice, May 26, they were abundant on it and remained there in large numbers during June, flying up and floating down and feeding in the quieter places below the gravel bars. A very few remain there and along the seacoast all summer. About the middle of September they begin to return to the river, are again abundant by the 30th, and from that time on until they have all gone, October 16, one can hear their Ah-ah-linck, or see them almost every day."—
N. G. B.

Marcova: "Abundant; breeds." — N. P. S.

35. Histrionicus histrionicus (Linn.). — Five specimens: Gichiga, 1 male, June 10; Marcova, 2 males, May 17; a pair, Novo Marinsk, May 29.

"Harlequin Duck. Not rare. A very few are seen along the lower river, and more about the tundra pools. Along the rocky coast south of the mouth of the Ovecho River, they are not rare, and some are also found far up the river, where they are said to breed." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

36. Polysticta stelleri (Pallas). — Three specimens: an adult male, Gichiga, June 10 and July 1; 2 adult males, Novo Marinsk, May.

"Steller's Duck. A single specimen taken from a flock of twelve, just outside the mouth of the Gichiga River, June 10, 1901. The Cossacks had no name for it, and said that they had never seen one before. However, it is probably common in spring and fall, but stays outside on the Gulf, so that it is seldom observed." — N. G. B.

Marcova: "Rare."-N. P. S.

37. Somateria mollissima (Linn.). — Seven specimens: Gichiga, 2 adult males, June 8, 2 adult females, July 17 and October 14, and 3 newly hatched young, July 14 and 16.

"Russian local name, Bah-oó-lah. Tolerably common summer resident. They first appear in pairs or in small paired flocks, flying up and down the river a few days before it breaks up, the last week of May, and as soon as it clears of ice they begin making trips up the river. The males of those pairs that remain to breed leave by the latter part of June and are seen no more, at least on the river. I saw sixteen males out at sea, September 7, 1901. By the 1st of June they have begun nesting, and few are seen along the river until the middle of July, when the females collect in flocks of from six to thirty, and spend their time on the gravel bars along the lower river, and along the sea coast near the river's mouths. Nests are built in the vicinity of the tundra pools, and the young are hatched the latter part of June and first of July. All have gone by the third week of September. Two specimens (Nos. 817 and 818) together weighed eleven and three quarter pounds, and neither was extremely fat." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

38. Somateria v-nigra Gray. — Four specimens: adult male and

female, Novo Marinsk, June 1; adult male and female, Indian Point, May 28 and June 6.

39. Somateria spectabilis (Linn.). — Three specimens: adult male, Gichiga, June 10; 2 males, Indian Point, May 19.

"On the morning of June 10, 1901, while beating down the rocky coast along the Taiganose Peninsula, in a leaky river boat, a mixed flock of seven Pacific Eiders and two male King Eiders flew over our boat, when I killed this specimen. None of the five Cossacks with me had ever seen the species before and called it a 'droo-goy bah-oo-lah,' or an Eider different from the Pacific, which is the only one that they are acquainted with. These were the only two that I saw on the Okhotsk Sea. Mr. Sokolnikoff says that it is common at Marcova, where it breeds, and is abundant at the mouth of the Anadyr River in the spring and fall."— N. G. B.

40. **Oidemia nigra** (*Linn*.). — Five specimens: an adult male and a young bird in downy plumage from Gichiga, July 27 and August 8; and 3 males from Novo Marinsk, May 26 and June 30.

"Black Scoter. Russian local name, Chor'-na-oót-kah. Not uncommon. First makes its appearance at Kooshka just after the river clears of ice, flying up the river singly and in flocks of two or three at high tide and returning as the water goes out. A few remain all summer and breed about the tundra lakes lying along the mainland coast. First record of them, June 7, 1901; last, August 29, 1901.

"This species and the White-winged Scoter are said to breed in large numbers about an old lagoon near Yamsk, and, while moulting in August along the seacoast, the natives surround them in canoes and kill them with clubs." — N. G. B.

41. Oidemia fusca (Linn.). — Three specimens: a pair of adults from Gichiga, June 8; and a male from Marcova.

"White-winged Scoter. Russian local name, *Tour-pon'*. Not uncommon. The notes on the Black Scoter will apply to this species, which is, perhaps, a little more common." — N. G. B.

Marcova: "Common on the river in summer." - N. P. S.

42. Anser fabalis middendorffi (Severtz.). — Six specimens: Gichiga, adult male and female, May 12 and 17; Marcova, adult male (?), May; Novo Marinsk, 2 adults and 1 young in the first downy plumage.

"White-fronted Goose. Russian local name, Kah-sark-kah. Very

abundant spring and fall migrant, and a limited number remain. during the summer and nest. The first birds are usually seen about the first of May, although their arrival is hastened or delayed by the condition of the snow and wind. An early season and southerly winds will bring them several days earlier, and the reverse will delay them an equal length of time. From this time on until the first of June more or less are seen every day, although there are only a few days when really large flights occur. These large flights take place during the early morning, or at night from 5 P.M. until 11 or 12 P.M., when there is a southerly wind, or on the day following one. They come in from over the sea, fly low over the lower tundra, and continue northward up the valley or over the high tundra, where some remain to feed on the blossoms of the bunch grass before passing on. few stop on the marsh along the water front or return there at night to feed. On May 16, 1901, there was a very large flight which lasted all day, when I counted as many as 15 flocks in sight at one time, and some of them contained more than 200 individuals each. average size of a flock is eight or nine. By the end of May the migration is over, and those that have remained to nest have moved inland and scattered out among the tundra lakes to breed. A set of eggs was brought to me, June 16, 1901. The latter part of July, they congregate on the large lakes inland and moult. As they are unable to fly at that time, the Russians organize hunting parties and visit these lakes, when they shoot many of them. I joined such a party at the beginning of the second week of August, but we were about ten days too late, and got only a few. We saw flocks of nearly 200 on some of the very large lakes, but were unable to reach them, as we had no canoe. The Tunguese visit these places with canoes and obtain hundreds.

The birds from the north reach Gichiga on their return, September 1, and continue to pass until the first of October. In the fall many stop on the marshes along the head of the bay and feed and rest for a time before continuing southward.

"Some of the best hunters at Gichiga kill as many as 70 on the spring migration and nearly as many in the fall, which they salt and use during the long winter." — N. G. B.

43. Anser albifrons gambeli (Hartl.). — Six specimens: Gichiga, 2 adult males and 1 adult female, May 16 and 20; Marcova, 1; Novo Marinsk, 2, May 19 and 25.

"Russian name, Goo-may'-nick. A little less abundant than the

preceding, with habits practically the same. Not so many remain to breed." — N. G. B.

Marcova: "Breeds near the seacoast." — N. P. S.

- 44. Philacte canagica (Sevast.). Four specimens, Novo Marinsk.
- 45. Branta nigricans (Lawr.). Five specimens: 4 from Novo Marinsk and 1 from Indian Point.
- "Black Brant. Russian local name, *Nee-mock'*. The Russians described this bird to me perfectly, and said it was very rarely seen at Gichiga, but was common at Ola, Okhotsk, and Marcova."—N. G. B.
- 46. **Olor** sp.? No species of swan is represented in the collection; hence the species mentioned below as "Olor cygnus" cannot be determined. Sokolnikoff, in his notes on Marcova birds, as transmitted by Mr. Buxton, gives two species, as follows:

"Cygnus musicus. Common, breeds"; and "Cygnus bewickii. Killed two and saw five."

"Olor cygnus [?=Olor bewickii Yarrell]. Whooping Swan. Russian name, Lle-bed (ë). One of the earliest migrants to arrive. One was killed on the upper Gichiga River, April 1, 1901, and they were common there by the last week of that month. They breed there. Near Kooshka, I saw seven on May 1; three on June 7; four on June 10, and one was killed at Gichiga, August 10, 1901." — N. G. B.

47. Crymophilus fulicarius (Linn.). — One specimen, male, Marcova, June 21.

Marcova: "Abundant; breeds." — N. P. S.

48. Phalaropus lobatus (Linn.). — Thirty-eight specimens: 35 from Gichiga and 3 from Marcova. Of the Gichiga specimens, 29 are adults in breeding plumage (males and females), and were taken May 29 to June 19, and 1 (in moult), August 27; 6 are young or adults in fall dress, and were taken August 1 to 4, and August 23 (1 specimen). The 3 Marcova specimens (breeding birds) were taken May 13 and 22.

"Northern Phalarope. Abundant summer resident. Begins to arrive the last of May, and is common on the tundra pools by the end of the last week in June. Eggs are deposited by the first of June. The nest is a depression in the moss or grass, near a pool, lined with

a little grass. About the last of July they collect in small flocks of three to ten on the pools, where they remain to feed until they leave in the fall. When feeding they turn and spin about on the water and nervously jerk their heads in such a manner as to resemble mechanical toys. They begin their southward migration the latter part of August, and are nearly all gone by September 10. Those migrating from further north are seen on the river for a few days the first week of September." — N. G. B.

49. Gallinago gallinago (Linn.). — Three specimens, all males, Gichiga, May 23 and 25, and June 4.

"Snipe. Russian, Koó-lek. A regular and not uncommon sum-They first appeared on the low tundra along the seamer resident. coast, May 20, when I saw three. Next day I saw but one there. On the night of the 23d of May, while returning across this marsh from goose shooting at 11 o'clock, I was attracted by a bird note far off on the tundra, which sounded like the noise made by a rusty pump-handle in motion, or a piece of machinery in motion that needed oil,—a regular recurrent creak, oo-ee. Proceeding in that direction. I soon flushed two of these snipe, which flew away uttering their peculiar tsweep. A minute later I heard above and in front of me a rapid, sibilant, drum-like vibration, and for the next few minutes, while I stood with gun cocked, I heard this sound at intervals of a few seconds from every quarter of the compass, as if the bird was circling rapidly around me, although I could see no bird. It was the most distinct yet elusive sound that I ever heard, and as I could see nothing, although the nearly full moon and bright northern twilight made distant objects in the landscape plain, I began to doubt whether I heard anything at all. Suddenly it ceased and I heard a splash in a little pool, thirty yards distant. Upon approaching it I again flushed two birds, and got one of them, No. 646, as it flew over the pool. They also have a short, low whistle. Later I saw and heard one near my station during the day. A pair nested in the grassy marsh on the higher tundra in June, but I was unable to locate the Saw none after August 15." — N. G. B.

Marcova: "Only three seen, but many are heard passing over on migrations. One was taken in May, 1899." — N. P. S.

50. Limicola sibirica Dresser. — Eleven specimens: Gichiga, 10, taken July 19 and 31, August 17, 23, and 27, and September 2 and 7; Marcova, 1, June.

"These sandpipers have already [August 17] collected in large flocks, of twenty-five to two hundred birds, and fly up and down the beach. They feed on the maggots found in the decaying salmon, which have been left on the beach by the tide, and especially about the fish-drying racks. With one load of dust-shot I killed twelve. They were gorged with maggots, which would crawl out of their mouths, while the digested ones oozed from the rectum. They were very fat, and the Russians said they were good eating, but I did not try them." — N. G. B.

51. **Pelidna alpina** (Linn.). — Forty-eight specimens, of which 42 are from Gichiga and 2 from Marcova; 43 are adults in breeding dress, 1 an adult in fall plumage, and 4 are young of the year. The spring specimens were taken May 25 to June 1, and two on June 24; the fall specimens were collected August 23 to September 9.

In 28 spring males, the bill (culmen) measures 30-35 mm., averaging 32.7; in 14 spring females, the same measurement is 34-40 mm., averaging 37.2.

The two specimens from Marcova, a pair, are rather above the average in size, and are more brightly colored, and may be referable to *Pelidna alpina sakhalina*, agreeing very well with American specimens in summer dress.

"Red-backed Sandpiper. The most abundant of the shore birds at Gichiga. The first appeared May 22, flying high overhead, and they became common by the 26th, feeding in flocks on the marsh and along the river, in company with the small sandpiper like No. 1065 [Actodromas ruficollis]. By June 1 they had mostly paired and scattered out on the tundra, preparatory to nesting and moved further Their breeding note is so distinctive that once heard it is never forgotten. It is an exact reproduction of the little marsh-frog's note that one hears in our North Central States early in March when the ponds are thawing out. They have two variations to this trill-one given low, and in rhythmical beats, and the other shriller and prolonged. The latter is exactly imitated by removing the ends of a small tin can and replacing one end with a piece of parchment, through the center of which is run a short piece of catgut knotted on the inside. The free end of the gut is then looped over the end of a small. round, rosined stick, and the can made to rotate by holding the distal end of the stick and swinging in a small circle. Such a toy was on the market a few years ago. Eggs are deposited by the latter part of June, and the young are seen by the middle of July. The nest is

simply a slight depression in the grass near a tundra pool, lined with a little grass and a few leaves. The eggs are four in number.

"By the middle of August, they have again collected in flocks—some of them very large—on the marsh and along the river. Near my cabin was a fish-drying rack, and the ground under this was covered with maggots that had fallen from the fish. The Red-backs and the smaller Tringa (No. 1065 [=Actodromas ruficollis]) collected here in one large mixed flock during the latter half of August and gorged themselves on the maggots. Later, they move out on the great mudflat at the head of the Gulf, and collect into a few immense close flocks that can be seen for a distance of three or four miles, as they flash in the sunlight when on wing. They are mostly gone by September 15."—N. G. B.

Marcova: "Sometimes abundant; breeds." — N. P. S.

52. Ancylochilus subarquatus (Güldenst.). — One specimen, male, Gichiga, June 2.

"This specimen was feeding with a large flock of Red-backed Sandpipers on the maggots under the fish-drying racks along the river when I shot it. It was the only one seen at Gichiga." — N. G. B.

- 53. Actodromas damacensis (Horsf.). Seven specimens, Gichiga, June 4 and 7, and August 3, 4, and 20. Not distinguished by Mr. Buxton from A. ruficollis, the notes on which apply in part to A. damacensis.
- 54. Actodromas ruficollis (*Pallas*). Thirty-eight specimens, all from Gichiga, of which 29 are in breeding dress (May 28 to July 16), the others being in fall plumage (August 23).
- "Abundant spring and fall migrant, and some breed at Kooshka, but the majority move further inland during the breeding season. First birds arrived May 28, and were common on the 30th in large flocks and in company with the Red-backed. By June 5 they have paired or passed on, and are not common again until the second week of July. They have mostly gone by September 11. In habits similar to *Pelidna alpina*. See notes on that species." N. G. B.
- 55. Pavoncella pugnax (Linn.). One specimen, a bird of the year, Gichiga, August 30.

"Taken along the bank of the river. The only one that I saw while at Gichiga. Undoubtedly rare and does not breed." — N. G. B. Marcova: "Not common; breeds." — N. P. S.

56. Rhyacophilus glareola (Linn.). — Sixteen specimens, taken at Gichiga at intervals from May to September, and illustrating the plumages of both adult and young, as follows: 4 males, May 24, 28, and 31; 3 males and 1 female, June 4, 7, 24, and 27; 3 males and 1 female, adults in autumn plumage, August 1 and 4; 2 adult males and 2 half-fledged young, July 12, 16, and 26.

"Not uncommon. Arrive last week of May, pair immediately, and proceed to nesting. They do not arrive or collect in flocks in the spring as do the sandpipers. They nest on the higher tundra near the little tundra pools. At this season the males mount high in the air and circle and soar over the locality of the nest, and sing almost continuously for an hour or more before descending to the ground again. The song is a clear mellow whistle, which could hardly be distinguished from that of the Tufted Titmouse. It always begins with a half note and rapidly repeats peto, four to six times. They are gone from the tundra by the latter part of August and have moved out to the mud-flats along the head of the bay, where they remain until the middle of September." — N. G. B.

57. Glottis nebularius (Gunner.). — Three specimens: 1 adult male, Gichiga, July 7; 2 young males, August 29.

"Saw two pairs of these birds around swamps in the larch woods at Christova, where they were evidently breeding. They would circle about over me rapidly, uttering a whistling sweet, sweet, for a time, and then alight on the topmost branch of a dead tree. No. 875 is from one of these pairs. Also heard several more that I did not see. During the last week of August they were common about the chain of tundra pools near the mouth of the river, but soon disappeared."

— N. G. B.

58. Pseudototanus guttifer (Nordm.). — A single specimen of this rare species was taken at Gichiga, August 2.

"Saw three of these birds together along the gravelly border of the river, of which this is one. An almost continual patrol of the river banks rewarded me with a number of species of shore birds; but none of them, with the exception of the sandpipers, were ever common, and the collection of the large shore birds represents nearly all that I ever saw and all that I was able to kill." — N. G. B.

59. Terekia cinerea (Güldenst.). — Seven specimens: 4 from Gichiga, July 28 and August 3 and 4; 3 from Marcova, May 18.

"No. 958 was taken on a gravel bar in the river. It was alone.

No. 991 is one of several I saw along the river bank. Nos. 1002 and 1003 were killed out of a bunch of five that were running along the gravelly bank of the river. Saw no others."—N. G. B.

60. Tringoides hypoleucos (Linn.). — Four specimens: 3 from Gichiga, June 2 and 7, and August 3; and 1 from Marcova, June 7. One of the Gichiga specimens is a two-thirds-grown young bird.

"I saw a few single birds of this species during the first week in June, along the river bank and sloughs, and on June 15 I saw a pair along a little stream which flows into the sea near Matuga, which I am certain were nesting. When running on the ground they wag their tails like the Spotted Sandpiper." — N. G. B.

Rare at Markova (Sokolnikoff).

61. Heteractitis brevipes (Vieill.). — Ten specimens: 4 adult and 2 young from Gichiga, May 1, 4, 7, and 24 (adult), and August 6 and 20 (young); and 4 adults from Marcova, May 28 and 30.

"Not common. Observed only in spring. A few single birds seen along river banks and sloughs leading from the river at high tide to the sea. Does not breed at Gichiga." — N. G. B.

62. Totanus ater (Sander). — Six specimens: 2 males and 3 females, all in fall plumage, Gichiga, August 30; and 1 adult in breeding plumage, from Marcova, May.

"During the last week of August and the first of September I saw three or four small flocks of these birds standing on the banks of the tundra pools near the river's mouth." — N. G. B.

Marcova: "The only one observed." — N. P. S.

63. Limosa lapponica baueri (Naum.). — Five specimens: 3 from Gichiga, June 5; and 2 from Marcova (no date).

"Tolerably common spring and fall migrant. Arrives the latter part of May and remains until the middle of June, feeding on marshes along the water front. Returns the latter part of August and collects in large flocks far out on the mud-flats, exposed at low tide, and remains until the middle of September." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

64. Numenius phæopus variegatus (Scopoli). — Two specimens: a young bird from Gichiga, September 8; and an adult from Marcova.

"This bird (No. 126) was feeding on ground-berries on the low tundra when I shot it. It was alone. Extremely fat and evidently hatched near there. On several occasions—May 29, June 22, and 23, 1901—I saw and heard Long-billed Curlews, which were possibly this species." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

65. Arenaria interpres (Linn.). — Six specimens, of which 3 are from Gichiga, May 29 and 31; 1 from Lake Kanka, June 2; and 2 from Novo Marinsk, June 4.

"Turnstone. Rather rare spring migrant. During the latter part of May, I saw a few single birds along the gravelly bank of the Gichiga River." — N. G. B.

- 66. Squatarola squatarola (Linn.). Four specimens, Gichiga, as follows: a male in breeding dress, July 22; two males and a female in fall plumage, September 23 and October 5.
- "Spring and fall migrant; not common. September 23, 1900, I saw five feeding on the marsh near the sea; and October 5, 1900, I saw one lone bird along the river. On July 22, 1901, I saw four along the sea beach south of the mouth of the Ovecho River; and on May 24, 1901, saw a few flying northward." N. G. B.
- 67. Charadrius dominicus fulvus (Gmelin). Two specimens, young males, Gichiga, August 29 and September 10.
- "Not common; spring and fall migrant. I saw and heard a few flying northward on May 24 and 25, 1901, but none stopped. During the latter part of August and first of September, I saw a few single birds feeding on black ground-berries, which grow so abundantly on the lower tundra. September 23, 1901, I saw three single birds flying southward." N. G. B.
- 68. Ægialitis mongola (Pallas). Three specimens, two males and a female, June 2 and 3.
- "No. 757 was feeding in company with five Red-backed Sandpipers along the river bank near my station when killed, June 2, 1901. On the following day, two more single birds, in company with the sandpipers, were taken further down the river. No more were seen."
 — N. G. B.
- 69. Ægialitis hiaticula (Linn.). Eleven specimens, of which 9 are from Gichiga and 2 from Marcova, collected as follows: Gichiga, May 23-June 1, and August 31; Marcova, May 31 and June 7. All are in breeding dress, except the single specimen taken in August.

"Rather common spring and fall migrant. More common in spring than in fall. First appears along the marshy beach at the head of the Gulf, May 20, while the sea is still filled with ice. A week or ten days later a few are seen feeding with the sandpipers along the river and on the higher marsh, but they soon pass on and are not seen again until the latter part of August, when some return for a few days and then leave for the south. No. 1060 is a young specimen taken at Gichiga, although I do not think that it was hatched there."

— N. G. B.

Marcova: "Common; breeds." — N. P. S.

70. Urogallus parvirostris (Bonap.). — One specimen, an old male in fine plumage, Marcova (Buxton), March 1.

"Black Grouse. Russian local name, Tět-erev. No. 496 in collection. One of two specimens taken at Yeropole about March 1, 1901, and brought to Marcova and given to Mr. Sokolnikoff, who says that they are common at that place, and also on the rivers Main and Pengina. He says that they feed in winter exclusively on willow buds, and are easily approached while feeding." — N. G. B.

71. Lagopus lagopus (Linn.). — Ten specimens, of which 7 are in the pure white plumage of winter and 3 in the dark brown plumage of summer; one is without locality or date; 8 are from Gichiga, collected as follows: September 5 (3 in summer dress), February 1 and 2 (4 in full winter dress), and May 3 (1 beginning to show a few feathers of the summer dress). Another winter specimen is from Werchojinsk, northeastern Siberia, March 10 (W. Jochelson).

"Willow Ptarmigan. Russian name, Cür-o-pat-ka. An abundant resident in favored localities all over northeastern Siberia. Spends the winter along the river bottoms, feeding on the buds of the willow and white birch trees. There were very few near my station at Kooshka, on account of lack of suitable food; but thirty miles up the Gichiga River they were common. They were especially abundant at Pengina, and during the early morning and evening I saw hundreds of them perched in the trees along the river feeding. They were very shy at that time and could not be approached. During the middle of the day they remain quietly concealed in the thick patches of undergrowth. They are caught by the inhabitants by deadfalls and snares. In May, when the snow begins to leave the rivers, they repair to the tundra, where they feed on the grass and weed seeds, and later nest. The natives affirm that they become 'snow blind' during May

and may be approached and killed. About the first of May they begin to mate and during the long twilight hours that follow the setting of the sun, one can hear the 'crowing' or 'drumming' of the males far off on the tundra. I can describe this 'crowing' only by comparing it to the noise made by drawing a stick rapidly across five or six pickets on a fence, and then more slowly over four or five more. This is repeated at intervals of several minutes. They nest on the high tundra. Saw full-fledged young on August 1." — N. G. B.

Marcova: "Abundant; resident." — N. P. S.

72. **Lagopus rupestris** (*Gmelin*). — One specimen, from Marcova, in winter plumage, with feathers of the summer plumage beginning to appear.

"Rock Ptarmigan. Mr. Sokolnikoff, at Marcova, said that he had seen ptarmigan from the rivers Main and Yeropole which had a black stripe through the eye, which I take to be L. rupestris, or some undescribed form of it." — N. G. B.

73. Astur palumbarius (Linn.). — Two specimens: Gichiga, adult female, April 16; and Marcova, an immature female.

"Bought from a Cossack, who said it was the first that he had ever seen. I saw none." — N. G. B.

Marcova: "Rare; breeds; more common in the fall." — N. P. S.

- 74. Astur candidissimus Dybowski. One specimen, adult, Marcova, August.
- 75. Archibuteo lagopus (Gmelin). Two specimens, Marcova. "This pair was taken together. Not common; breeds; leaves latter part of August." N. P. S.
- 76. Aquila chrysaëtos (Linn.). Four specimens, all from Marcova; adult female, collected by Mr. Buxton, February 15, 2 collected by Mr. Sokolnikoff, and 1 by Mr. Axelrod.

"Common resident, nesting in cliffs along the smaller rivers, especially the Orlofki." — N. P. S.

77. Thalassoaëtus pelagicus (Pallas). — One specimen, immature male, Gichiga, October 10.

"Russian name, O-rél. On June 18, 1901, I saw a very dark-colored eagle, with white head and tail and white patches on wings, sitting on a gravel bar at the mouth of the Gichiga River. July 4, I saw another on a bar in the river; and July 10, I saw a pair of them

at Christova, thirty-five miles up the river. The Russians say there are two species at Gichiga, and that this is the commonest and shyest."— N. G. B.

78. Haliæetus albicillus (Linn.). — Three specimens: Gichiga, immature female, May 7; Marcova, 2, immature. The Marcova specimens were taken in April and on August 20.

"Sea Eagle. Russian name, O-ryel. I saw but four of these eagles at Gichiga, October 10, 1900; April 17 and 23, 1901; and May 7, 1901. In March, 1901, I saw a very large eagle's nest in a cotton-wood tree on the Pahrane River, which flows into Penginski Gulf, that probably belonged to this species." — N. G. B.

Marcova: "Rare; breeds; not resident." — N. P. S.

79. Falco rusticolus Linn. — One specimen, Gichiga, adult male, March 15.

"Rare. The only specimen observed." - N. G. B.

80. Falco peregrinus Gmelin. — One specimen, Gichiga, adult female, September 19.

"Duck Hawk. Russian local name, Yah'-strip. Quite common during the summer along the seacoast, where it breeds in crevices in the rocks. I found one pair nesting near Matuga, June 13, 1901, although I could not reach the nest, as it was placed in a hole in the soil at the top of a cliff 150 feet high. After the nesting season they spend their time along the rivers and inland in pursuit of young ducks, phalaropes, and sandpipers. I saw them first in 1901 on June 3, and last on October 18." — N. G. B.

81. Falco regulus Pallas. — Two specimens, immature male and female, September 7 and 8.

"Not common. Observed only in the fall about the chain of tundra pools along the water front, where I saw several at different times in pursuit of longspurs and wagtails." — N. G. B.

82. Pandion haliaëtus (Linn.). — One specimen, Gichiga, adult male, July 8.

"Osprey. Russian local name, $Sc\bar{o}$ -pah'. Quite common on the upper parts of the Gichiga and Ovecho Rivers, where the timber is large enough to afford it nesting sites. Arrives middle of May and remains until the first week in October, when the ice begins to form."

— N. G. B.

Marcova: "Rare; breeds." — N. P. S.

83. Asio accipitrinus (Pallas). — Three specimens, two males and a female, Gichiga, September 20 and 29, and October 12.

"Short-eared Owl. Not common. Probably breeds. Saw only three, and all in the fall. This species appears at Point Barrow, Alaska,—some years in large numbers, and breeds, and in other years it is almost entirely absent. The migration of lemming may have something to do with its movements there, as it does with that of Nyctea nyctea." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

- 84. Scotiaptex cinerea lapponicum (Retzius). One specimen, Marcova, male, February 10 (Buxton).
- 85. Nyctea nyctea (Linn.). Two specimens, both adult females, Gichiga, February 11 and April 4.

"Snowy Owl. Russian local name, Fee'-len. Very common at Gichiga some winters and entirely absent during others. Arrives in November and departs in April. The two specimens in the collection were all that I heard of during the winter of 1900–1901. Specimen No. 400 was found frozen on the tundra and had evidently died of starvation." — N. G. B.

Marcova: "Irregular winter visitant." - N. P. S.

86. Surnia ulula doliata (Pallas). — Five specimens: Marcova, male and female, March 1; three specimens, September.

"Hawk Owl. Rare at Gichiga. On February 9, 1901, I saw one flying over the tundra near my station, and on February 19 a Cossack brought me one which was so badly mutilated that I could not make a skin of it. All in the collection are from Marcova, where they are common." — N. G. B.

Marcova: "Common; resident; breeds." - N. P. S.

87. Cuculus canorus telephonus (Heine). — Three specimens: Lake Kanka, male, June 1; Gichiga, male, June 7; Marcova, June 5.

"Russian name, Coo-coosh'-ky. Not common at Gichiga, and confined to the thick growth of willows and alders along the streams back from the seacoast. Probably more abundant inland. Besides the one in the collection from Gichiga, I heard and saw but three others, all during the second week of July on the upper Gichiga. The note is a long-drawn cuck-coo, accented on the first and prolonged on the second syllable.

"In the vicinity of Vladivostok and at Lake Kanka they are very common." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

88. **Jynx torquilla** Linn. — One specimen, male, Lake Kanka, May 31.

"Caught while excavating a hole in a fish-drying rack. Not common, as there is very little suitable timber here for nesting sites."—
N. G. B.

89. Dryobates purus Stejneger. — One specimen, a female, collected April 5.

"Russian name, Dyah'-těl. This specimen was brought to me by an old man who said he got it in the pine woods near Niakinsk, about sixty miles southwest of Gichiga. While at Christova, a place thirty miles up the Gichiga River, in July, I saw numerous old woodpeckers' holes in the dead larch and willow trees there, but neither saw nor heard the birds. A man living there said that he had heard them, but never saw any." — N. G. B.

90. Dryobates minor immaculatus (Stejneger). — Three specimens: 2 males and a female, Marcova, without date.

These specimens agree with Stejneger's *immaculatus* in having pure white under tail-coverts and the outer rectrices pure white, without any trace of dusky bars in the males, and with a small dusky spot on the inner vane in the female.

Given as "rare" at Marcova by Sokolnikoff.

91. Picoides tridactylus crissoleucus (Bonap.). — Five specimens: 2 males and 3 females, taken as follows: Marcova, female, March 1, (Buxton); Marcova, 2 males and 2 females, May and June (Sokolnikoff).

Given by Buxton, on the authority of Sokolnikoff, as "common and breeds" at Marcova.

92. Chætura caudacuta (Latham). — Not represented by specimens, but without doubt the species referred to by M1. Buxton in the following notes:

"On July 24 and 25, 1901, I saw half a dozen pairs of black or dark colored Swifts, with white rumps and light colored triangular patch on throat, nesting in the crevices of the high sea wall south of the mouth of the Ovecho River. I killed two, but they fell into the

sea, which came up to the base of the 200-foot high cliff, and I was unable to get them. I saw some about the cliffs at Chevitka on the opposite side of the Gulf. The Russians say that they are also abundant far up the Gichiga, where they breed [=assemble?] in hollow trees in immense colonies."—N. G. B.

93. Alauda intermedia Swinhoe. — One specimen, male, Lake Kanka, June 1.

"Very common. I saw it all along the way from Nikolsk to the lake. This was the first time I ever had an opportunity to hear a Skylark sing. This one was shot while singing on the wing."—N. G. B.

94. Alauda buxtoni, sp. nov.

Type, No. 77175, ♂ad., Gichiga, northeastern Siberia, May 3, 1901; N. G. Buxton.

Similar in size to Alauda blakistoni Stejn., but more heavily streaked on the breast and flanks, and with the dark centers of all the feathers of the dorsal plumage, including those of the head and rump as well as the interscapular region, much broader, giving a much darker general effect; in color thus resembling A. intermedia Swinh. of the Amoor region, but much larger. Wing (type), 120 mm.; tail, 84; three males, wing, 114-120 (118.7); tail, 76-83 (78.7): two females, wing 108 (107-109); tail, 73 (72-74). The females are slightly larger than Vladivostok males of A. intermedia, while the males have the wing fully a half-inch longer.

Five specimens, three females and two males, Gichiga, April 30, May 3, and 5, and September 7.

The size alone would prevent the reference of the Gichiga specimens to either A. arvensis or A. intermedia, while both size and color prohibit their reference to A. japonica; despite the agreement in size, the difference in color renders them obviously different from A. blakistoni, with topotypes of which I am able to compare them. As no earlier name is apparently available for the Gichiga form, I take pleasure in naming it for the collector, Mr. N. G. Buxton, whose careful work in the Gichiga region has yielded such important results.

"Russian name, Fav-or-on-ok'. The first lark was observed at Kooshka, May 1. By the 3d they were common, but soon passed on to the high, rolling tundra further inland, where they nest. By the middle of August they begin their southward migration, and were again seen in small loose flocks and singly on the tundra for a short time. The young and females had all gone by the third week in September." — N. G. B.

95. Pica camtschatica Stejneger. — Fifteen specimens, 9 males

and 6 females, all from Gichiga, taken April 19, 24, and 29, June 21, August 29, September 10, October 9, 14, and 31, and November 5.

This form of the common Magpie differs so strongly from the European and North American forms, through its larger size, shorter and much thicker bill, absence of blackish apically on the primaries, and the very broad, pure white rump band, that it seems best to treat it as a full species.

"Magpie. Russian name, Sō-rō'-kah. Abundant resident. During the winter they stay around the isolated houses and settlements, feeding on refuse and the bits of fish that the dogs leave. At that time they become very tame, and I have seen them picking at one end of a dried salmon which a dog was eating, and hopping just beyond the reach of the harnessed dog when it made for the bird. About the middle of May they separate and go to the foothills and along the streams, where they begin nesting. They are the earliest nesters, and I found eggs by the last week of May. Their loose, bulky nests of sticks and twigs are placed in the tops of the low willows, and contain five or six eggs. In the fall they make daily excursions to the settlements and return to their nesting grounds at night. At Kooshka they became so persistent in their attempts to carry off my minimum thermometer, hanging on the side of my cabin, that I had to encase it until I had exterminated all that visited me." — N. G. B.

Marcova: "Common resident." - N. P. S.

96. Perisoreus infaustus (Linn.). — One specimen, Werchojinsk, northeastern Siberia, March 26, W. Jochelson.

Marcova: "Rare summer visitant." - N. P. S.

97. Corvus corax behringianus Dybowski. — Six specimens, 4 males and 2 females, Gichiga, May 3, September 16, October 14, November 17, and December 14.

These specimens are provisionally referred to this form, with which they agree in size and wing formula, the first primary being decidedly shorter than the seventh in five of the specimens, and just equal to it in the other; the fourth the longest, and the third 25-30 mm. shorter than the fifth; the length of the wing ranges from 440-450 mm. It is thus not an insular form, as regarded by Stejneger.

"Raven. Russian name, $V\bar{o}$ -ron'. An abundant resident. One of the most interesting and conspicuous birds in northeastern Siberia. During the winter many of them congregate about the Russian and native settlements, where they find garbage and dead dogs for food.

When traveling in winter time one also encounters them on the barren tundra far from villages. At that time they will come up behind the sledge and sail slowly over the whole length of the dog teams, eying the outfit critically, alight on the snow off to one side of the trail, and then repeat the performance after the sledges have passed. The dogs prick up their ears and race madly over the snow so long as the raven continues in sight. For days at a time this is the only diversion that the traveler has from his monotonous journey. They are a sacred bird to the Koraks, who hang reindeer heads and pieces of meat on poles about their camps for them.

"At Kooshka, about the first of April, they begin to fly down the river every evening in large numbers to the sea, where they roost, and return up the river the next morning. They come straggling down after their day's foraging like a lot of children just out from school. Some play on the way, chasing each other and circling about anything that attracts their attention; some fly rapidly along, alone and in groups of four or five; while others amuse themselves by uttering all their notes and calls. Have often heard one far up the river, long before it came in view, running over these notes, and it continued until it passed and disappeared over Maiak Point, two miles distant. They have seven distinct notes.

"When sailing along, looking for food, they have a curious way of closing one wing and dropping several feet on that side, and then extending it and closing the other, repeating this several times, which makes them appear to revolve in the air.

"By the end of May they have all repaired to the cliffs along the sea where they nest. After the breeding season is completed they spend their days along the water and lower stretches of the river eating salmon, and at night go up the river to roost." — N. G. B.

- 98. Corvus corone levaillantii (Lesson). One specimen, a bird of the year, just beginning to acquire the metallic plumage of the adult, Gichiga, August 1.
- 99. Nucifraga caryocatactes macrorhynchos (Brehm). Three specimens, an autumn male from Gichiga, September 2; and a male and female from Marcova, April 27.

As these specimens do not agree with N. kamchatkensis Barrett-Hamilton, they are referred to macrorhynchos.

"On the evening of September 2, 1900, while standing outside my cabin, this bird suddenly came flying across the tundra and pitched into a little garden near by, where I shot it. It was the only one I observed at Gichiga, and the people there were unacquainted with it. Mr. Sokolnikoff says that it is quite common at Marcova, where it arrives in March and breeds."— N. G. B.

100. Acanthis linaria (Linn.). — Twelve specimens, 6 males and 6 females, all from Gichiga, except one from Marcova, April 26. The Gichiga specimens were taken April 16 and 24, May 28, August 20, and September 25. One of the September specimens is in fall plumage (apparently a bird of the year), and the other is still mainly in the first or juvenal plumage, showing that it must have been hatched late in August. The single August specimen is in moult from the juvenal into the second or fall plumage.

The following notes by Mr. Buxton probably relate mainly to this form.

"Redpoll. One of the earliest birds to arrive and the latest to depart, and I am not certain that they are altogether absent at any time of the year. Abundant. On February 25, 1901, I saw one at the Pahrane River; March 1, a small flock at the Ooskon Pass near Pengina; April 1, a number at Leftchick, twenty-five miles up the Gichiga River; and on April 16 they were common at Gichiga, feeding on seeds that grow on the sod roofs of the houses. They first appeared at Kooshka on April 23, and were common from that time on, in the little patches of willows and alders, in which they nested, and which grow in the protected places about the lakes on the higher tundra and along the streams. Late in the summer they collect in small flocks and stay about the patches of shrubs, and later assemble in larger flocks. September 27, 1901, I saw a flock of more than 200 along the Ovecho River, but saw no more that fall." — N. G. B.

- 101. Acanthis linaria holbællii (Brehm). Three specimens: Gichiga, male, April 16; Marcova, male and female, May 22 and 25.
- 102. Acanthis hornemannii exilipes (Coues). Nine specimens, as follows: Gichiga, 6 males, April 16 and 24 and May 28; and 2 females, in fall plumage, September 25; Marcova, 1 male, May 16.

Marcova: "Common; breeds." — N. P. S.

103. Leucosticte arctoa (Pallas). — One specimen, a female in worn plumage, Gichiga, July 25. The greater coverts are narrowly edged with crimson; flanks, lower back, and rump with the feathers edged with grayish and pale crimson. The whitish edging of the

quills is nearly worn away, leaving the quills dusky brown. It thus does not agree well with the descriptions of *arctoa*, to which it is doubtfully referred. Wing, 100 mm., or considerably shorter than the length given for *arctoa*.

"Saw three of these in the rocks along the coast of the Taiganose Peninsula, south of the mouth of the Ovecho River, on July 25, 1901, of which this is one, and one opposite Matuga Island on June 12, 1901. Not present at Kooshka." — N. G. B.

- 104. Fringilla montifringilla Linn. One specimen, a young bird in juvenal plumage, with the quills not fully grown, Gichiga, July 11.
- "Not rare. Found one pair breeding on the tundra, July 8, 1901, and one young bird, July 11, 1901. Arrive first of June and are gone by second week in September. Nest of grass lined with feathers, placed under the edge of a bunch of grass." N. G. B.
- 105. Carpodacus erythrinus (Pallas). One specimen, adult male, collected at Marcova, Anadyr Province, by N. P. Sokolnikoff, in June, 1899. Given by Buxton, on Sokolnikoff's authority, as "Common; breeds."
- 106. Pinicola enucleator (Linn.). Eight specimens: Gichiga, 2 females, July 21; Marcova, 2 adult males, 4 adult females, April 17-26.
- "On July 21, 1901, I was crawling through the thick growth of dwarfed pines and alders which covers the old coast line back from the present head of the Gichiginski Gulf, looking for a thrush, when the male of this pair jumped up on a shrub twenty feet from me, which I killed. I then heard the female a few yards further on, uttering a trilling whistle like that made by a boy by whistling on his teeth, and soon got her. The male had two caterpillars in his throat. Breasts of both were bare, indicating that they were nesting. Rare at Gichiga, as people were unacquainted with them and they were the only ones I saw."—N. G. B.
- 107. **Uragus sibiricus** (*Pallas*). One specimen, an adult male, Lake Kanka, June 1.
- 108. Emberiza rustica Pallas. Eight specimens: Gichiga, an adult male (July 7) and a nestling (July 9); Marcova, 6 adult males, May 16, 17, and 22.

"Rare. I saw three in larch woods at Christova, July 7, where they were undoubtedly breeding. The young bird, taken July 9, was killed in willows along the Gichiga River, twenty-five miles above its mouth." — N. G. B.

Marcova: "Common; breeds." — N. P. S.

109. Emberiza pusilla Pallas. — Two specimens, males, Marcova, May 16 and 17.

"Common; breeds." — N. P. S.

110. Emberiza fucata Pallas. — One specimen, a breeding female, Gichiga, July 12.

"Rare. Killed on the tundra, near my station. The breast was bare from incubation." — N. G. B.

- 111. Emberiza sp., near citrinella. One specimen, "male," in fall plumage, Gichiga, August 20.
- 112. Emberiza aureola Pallas. Three specimens, all males: Gichiga, July 8, a male in immature plumage; Marcova, two adult males, May 22 and 24.

Marcova: "Common; breeds." — N. P. S.

113. Passerina nivalis (Linn.). — Forty-six specimens, of which 36 are from Gichiga, 9 from Marcova (April 15-19), and 1 from Indian Point (Bogoras, June 1). Of the Gichiga specimens, 28 were taken in October (October 11-24) and 8 in April (April 10-29).

"A few Snowflakes arrived at Kooshka on October 3, 1900, but they did not become common until the 6th, when a heavy snowstorm from the northeast brought them in large numbers. These soon moved on and were replaced by new arrivals until the last week of October, when they reached their maximum of abundance. About the first of November they began to diminish in numbers, and during November, December, January, February, and March only two or three remained about the settlement. In April they were again common, and the last one left on May 6. When they were common during the early winter and spring, they collected in a flock and visited the patches of ground about the settlement swept bare of snow by the wind, and the old sod-covered house roofs, in search of seeds. Three remained around my cabin, and I fed them with meal nearly every day. One of them began to sing on February 21, and continued to sing on fair days until they left." — N. G. B.

114. Calcarius lapponicus (Linn.). — Thirteen specimens, in breeding plumage,—8 males and 5 females,—all taken at Gichiga, May 25-29, and June 4 and 7, except one from Marcova, taken June 22.

The series does not differ appreciably from specimens from Greenland and the eastern United States, in either size or coloration.

"Longspur. Rather abundant summer resident. Begins to arrive the first of the last week in May and becomes common by the first of June. Nests on the tundra, placing the nest of moss and grass, lined with feathers, under the edge of a grass hummock. The eggs vary in number from four to six, generally five or six. The height of the breeding season is reached about June 1. They begin to leave the latter part of August, and are all gone by the middle of September. They are very pleasing singers, and are often heard as late as 11 o'clock at night, and as early as 2 A.M." — N. G. B.

115. Hirundo rustica tytleri (Ferdon). — Four specimens, two males and two females, Gichiga, June 6, July 2, and 31.

In all of these specimens the pectoral color is incomplete, and the color of the underparts is very deep chestnut, much darker than in the darkest males of *H. erythrogastra*.

"Russian name, Las-toch'-kah. A few pairs nest at Gichiga and Kooshka. Arrive during first week of June and depart the middle of August. The nests are built under the eaves of log cabins and on rafters of abandoned cabins. Three pairs nested at Kooshka, of which I got two pairs in spite of the protests of the residents. They were abundant at Okhotsk and Ola.

"At Lake Kanka they were abundant. The Korean fishermen's quarters there was a low mud-plastered building, 20 by 30 feet, with small windows and one low door. Along each side of it were one hundred bunks, where the men lounged and slept. Over these bunks, on the stringers that supported the rafters, were six swallows' nests, and the birds flew in and out of the windows and door, zigzagging amongst the men as unconcerned as though no one was present."—N. G. B.

116. Riparia riparia (Linn.). — Four specimens, two of which are from Gichiga (June 17), and two from Marcova (June 6 and 8).

"Bank Swallow. Russian name, Las-toch'-kah. Common summer resident. Arrives the first of June and departs by the third week of August. Nests in the banks along the Gichiga and Ovecho Rivers and along the seacoast. There is said to be a very large colony just

above the settlement of Gichiga. I saw one small one of three nests in the top of a high bank along the seacoast, and another four miles above Kooshka on the Gichiga River." — N. G. B.

117. Muscicapa albicilla Pallas. — One specimen, Gichiga, September 6, in the dress of the female, but sexed by the collector as a male. It is a bird of the year.

"Taken in a patch of shrubs along the river, September 6, 1900. Saw no others." — N. G. B.

- 118. Anthus gustavi Swinhoe. One specimen, male, in rather worn plumage, Gichiga, July 25.
- 119. Anthus cervinus (Pallas). Seven specimens, all males but one, Gichiga, June 5, 7, and 27, and July 12.

"Common. Arrives first of June and remains until the middle of September, although most have gone by the last of August. The nest is made of grass, and is placed under the edge of a bunch of grass on the edge of the tundra. Five or six eggs are deposited by the last of June. They are excellent songsters, singing while on wing. They prefer the dryer parts of the tundra, and collect in large loose flocks after the breeding season is over." — N. G. B.

120. Anthus anadyrensis sp. nov.

Type, No. 77357, Aad., Gichiga, northeastern Siberia, October 6, 1900; N. G. Buxton.

General size, size of bill and length of hind claw as in Anthus pratensis, from which it differs in less olivaceous coloring above, with the dark centers of the feathers heavier, and continued over the rump and upper tail-coverts, which are strongly instead of obsoletely streaked; below washed with deep buff instead of yellowish buff, and the dark streaks rather heavier; white spot on the penultimate tail feather broader and less wedge-shaped. In fall plumage, the feathers of the upper surface, including the quills, are edged with buffy brown instead of olivaceous, and the lower parts are much less yellow. Wing, 77 mm.; tail, 63; exposed culmen, 10-11.

Three specimens, in fall plumage, 2 males and 1 female, Gichiga, August 20 and October 6 and 10.

As indicated above, this species differs from A. pratensis (compared with both spring and fall specimens from England) very decidedly in coloration, but not essentially in size or structure. It differs from A. gustavi (Bering Island and Gichiga specimens) in much smaller size, disproportionately much smaller bill, absence of whitish edgings on the interscapulars, and in the white areas of the

outer tail feathers being clear white instead of dull buff or brownish-white. From the season when these specimens were taken, they were evidently migrants from further north, probably from Anadyr Province. It appears to be a well-marked geographical representative of A. pratensis.

121. Parus borealis baicalensis (Swinhoe). — One specimen, Marcova, June, in bad condition.

"According to Mr. Sokolnikoff, this is an abundant resident. I saw several and heard them sing at Marcova in March, 1901."—N. G. B.

122. Motacilla ocularis Swinhoe. — Seventeen specimens, of which 14 are from Gichiga, collected by Mr. Buxton, May 17 to October 2; 3 from Marcova, May 12 and 25, and 1 collected in June.

"Abundant. The first birds arrive the middle of May, but they do not become common before June 1. Before and after the nesting time they are seen in twos and threes about the houses and along the river banks and seacoast, but they never collect in flocks like the Yellow Wagtails, and are seldom seen far back on the tundra. They nest in the crevices in the banks of the streams and along the seacoast and on the ground in the grassy places along the streams. They are good songsters, singing especially while on wing. They begin to depart the latter part of August and are seldom seen after the middle of September." — N. G. B.

Marcova: "Abundant; breeds." - N. P. S.

123. Budytes flavus leucostriatus (Homeyer). — Nineteen specimens, collected as follows: Lake Kanka, adult male, June 7; Gichiga, 12 males and 4 females, June and July; Marcova, 3 males, May 24 and 25.

The series contains one in first plumage, taken July 16, a bird of the year in fall plumage, taken August 27, and two in moult, taken September 20 and October 2. The young bird in juvenal plumage was only a few days from the nest when taken, the quills being not fully grown. As I have met with no description of this plumage, which is strikingly different from the succeeding stages, it may be here described:

Above dark brown, darker on the head and interscapulars, which parts are strongly washed with blackish; postocular stripe, chin and whole throat, and a broad stripe below the ear-coverts, yellowish buff; ear-coverts blackish brown; broad superciliary stripes and malar stripes blackish, the latter joining a broad pectoral crescent of black; lower breast, flanks and under tail-coverts

strong buff, slightly varied with blackish brown on the flanks and lower part of breast; belly pale yellow or yellowish white; quills as in the fall plumage. Compared with birds in the second or 'fall' plumage, the upper parts are dull rusty brown, irregularly washed with black, as above described, instead of being olive brown with a grayish tinge; the lower parts are much deeper buff and less yellow, while the broad black malar stripe and broad black crescent on the breast are only faintly indicated by a few irregular, faint, dusky markings in the fall plumage. The tone and pattern of the coloration are thus widely unlike what is seen in young birds in fall plumage.

"This is the most abundant land bird found at Gichiga. The first birds arrive during the last few days of May, and they are abundant by the end of the first week of June. For a short time after their arrival they are seen in loose flocks feeding about the fish-racks along the river, about the tundra pools and little streams, where they find maggots and other insect larvæ. By the middle of June they have scattered over the tundra and taken up the duties of nesting. The nests are placed under the edge of a tussock of grass, and are composed of grass loosely put together and lined with feathers and horse-hairs. The eggs, generally six, are clay color, thickly covered with fine, darker markings. As soon as the nesting is over, the latter part of July, they again collect in loose flocks on the tundra, when they are very tame. They begin to leave the latter part of August, and are all gone by the 15th of September." — N. G. B.

Marcova: "Common; breeds." - N. P. S.

124. Calliope calliope (Pallas). — One specimen, in fall plumage, apparently a female of the year, Gichiga, August 20.

"Rare. Besides the one in the collection, taken August 20, 1900, I saw a pair, May 24, 1901, and saw and heard two or three singing during June. All were observed in the pine and alder thickets along the crest of the old shore line back from the mouth of the river. Perhaps common in more suitable localities." — N. G. B.

125. Lusciniola fuscata (Blyth). — Three specimens, Gichiga, June 22 and 24, and September 20.

These specimens appear to be referable to *L. fuscata*, but may represent *L. homeyeri*, a point not determinable in the absence of authentic specimens of either form.

"Tolerably common in the little patches of shrubs on the lower tundra and along the streams. Breeds. Arrives first of June and departs by first of September. Saw several old nests placed in low shrubs which I took to be of this species." — N. G. B.

- 126. Acanthopneuste borealis (Blasius). One specimen, Marcova, May 28, 1901.
- 127. Turdus dubius Bechstein. One specimen, adult male, Gichiga, June 6, 1901.

"Rare, although probably a summer resident, breeding in suitable localities. Saw the first pair, June 1, 1901, in a thick growth of stone-pine and alder which covers the crest of the ancient coast line back from the river's mouth, and subsequently several more there during the summer. Residents were unacquainted with it and had no name for it. When startled they have a note similar to that of the Robin. Extremely shy and hard to approach. Excellent songsters, singing morning and evening from the top of a dead shrub. Saw no nests."— N. G. B.