

The Birds of Kazakhstan

(abridged edition)

Edward I. Gavrilov and Andrey E. Gavrilov

Introduction

With the publication of the 5-volume monograph "The Birds of Kazakhstan" (1960, 1962, 1970, 1972, 1974), organised and basic executed by outstanding ornithologist Professor Igor Alexandrovich Dolgushin, the long-term study of birds came to an end. The research emphasis was replaced by detailed study of biology of separate species and groups and their seasonal migration. However the necessity for faunistic works has not disappeared. Global changes in climate and economic activity result in changes of ecological conditions reflected in numbers and distribution of animals. They especially have an effect on birds, as the most mobile representatives of our animals. A number of northern species have expanded their area further south, and southern ones in a northern direction (Korelov, 1964; Varshavskiy, 1965; Kovshar, Berezovikov, 2001). On the reservoirs of Central Kazakhstan the ecological conditions periodically vary sharply depending on the amount of water, resulting in a natural pulsation of birds distribution (Chelzov-Bebutov, 1957, 1958, 1960). This rather interesting biological phenomenon, unfortunately, is still poorly investigated. The negative changes in ecological conditions in a number of regions of Kazakhstan and reduction of habitat and numbers of some animals have given rise to the creation in 1978 of the Red Book of Kazakhstan (subsequent editions in 1991 and 1996), where species are included whose destiny is cause for special alarm (Appendix 1).

The sporadic research in various regions in this respect remained poor (Dolgushin, 1960; Kovshar, Gavrilov, 1982), and the elimination such "blank spots" has resulted in the revelation of new species for Kazakhstan, details of their length of stay and the boundaries of distribution. In this respect the results of work executed in the Altai by B.V. Scherbakov and N.N. Berezovikov, and on a mid-stream part of the Ural river valley by A.S. Levin and B.M. Gubin are indicative. The passage from mobile expeditions to stationary study, sometimes long-term, and the application of various methods of mass bird catching for ringing have apparently been productive not only in deciding special biological tasks, but also for revealing species, new to the Republic. Practically, all ringing stations made interesting faunistic finds. Much new information about the birds distribution was received as a result of mobile trips to lesser known areas of Kazakhstan (Ustyurt, Betpak-Dala, Trans-Irtysh'e etc.). For the period, which has elapsed since publishing "The Birds of Kazakhstan", a substantial number of large faunistic works on various regions were published, which add much information about birds of Kazakhstan (Kovshar, 2000).

The problem of bio-diversity conservation on the planet has ceased to be an abstract concept. In the majority of the states, including the Republic of Kazakhstan, are not only anxious scientists, but also government. It has become obvious, that the future of mankind depends on how we continue to build our relationship with the environment. To continue only to consume - Michurin's slogan of Soviet time - "We can not wait for gifts from nature; to take them is our task" or, to strive for harmonious coexistence ensuring maintenance of ecological stability. Ecological problems are now our priority. The burning topic of the day is the organisation of recording the condition of the environment, animals and plants. Monitoring investigations should first record the increasing negative tendencies and draw public attention to the necessity for their elimination. Among them changes in the distribution of some animals is especially evident and should to be a priority. Animals particularly birds are one of the first to react for ecological changes such as climate, vegetation, increase in anxiety, reduction in food supply and so on. Probably this work will engage not only scientific establishments, but also regional monitoring stations. Establishing areas of distribution of bird species at the end of 20 century represents unequivocal practical interest.

The majority of ornithologists will carry out research on species level, which although is a basis, does not reflect biological differentiation available in a nature. Such a situation is not appropriate to the

modern level of ornithology and it is impossible to allow this. Partly it is possible to explain it by the absence of field guides with morphological diagnoses of sub-species, existing only in inaccessible multi-volume books by S.A. Buturlin and G.P. Dementiev (1934-1937), by G.P. Dementiev and N.A. Gladkov (1951-1954) and by L.S. Stepanyan (1975, 1978, 1990). The publication of the list of birds in “The Book of the Genetic Fund of the fauna of Kazakh SSR “ (Gvozdev, 1989) has not solved this problem. Not all birds are listed in the book, distribution is given rather schematically and only at species level, and does not present morphological diagnoses of sub-species.

The above reasons have also induced us to write the present work. In general systematic and English names we follow mostly S. Cramp (“The birds of the Western Palearctic”), but in species and subspecies “The birds of Kazakhstan” (1960–1974) and especially L.S. Stepanyan (1990), who the first paid attention on species independence of Hume’s Warbler (*Phylloscopus humei*), Pale Sand Martin (*Riparia diluta*), Eastern House Martin (*Delichon dasypus*), Sykes’ Warbler (*Hippolais rama*), and E.I. Gavrilov (2000). We retain species status of *Lanius phoenicuroides* and *Remiz coronatus*, which are considered by L.S. Stepanyan as geographical races. After E.N. Panov (1995), we consider Great Grey Shrike (*Lanius excubitor*) and Desert Grey Shrike (*L. meridionalis pallidirostris*) as separate species. The essential divergences are revealed in the treatment of geographical variability of separate species. So, we recognise the validity of the following races: *Perdix perdix arenicola*, *Streptopelia decaocto stoliczkae*, *Aegolius funereus pallens*, *Caprimulgus europaeus plumipes*, *Delichon urbica meridionalis*, *Galerida cristata tenuirostris*, *Alauda arvensis dementjevi*, *Acrocephalus arundinaceus zarudnyi*, *Muscicapa striata sarudnyi* and *Acanthis flavirostris kirghizorum*. We believe that the removal of any race also requires argued proof similar to that used in the description of new sub-species. As an example we mention *Perdix perdix arenicola*, which was removed by L.S. Stepanyan as a synonym of *robusta*, in spite of the fact that S.A. Buturlin (Buturlin, Dementiev, 1935) marked its sharp differences recognised “even by a such conservative in systematic, as G.E. Dresser” (page 197). Subsequent research by E.A. Pavlova (1987) convincingly proved the validity of this race. In systematic of “Large White-headed Gull” we follow Pierre Yesou (2002) who assigns 8 species and two semi-species which are better to consider as subspecies: *barabensis* (of *L.heuglini*) and *mongolicus* (of *L.vegae*). Concerning *Sylvia curruca* at last time V.M. Loskot (2001) confirms subspecies validity of *halimodendri*, *telengetica*, *jaxartica*, *snigirewskii* and *margelanica*. But H.Shirihai *et al.* (2001) consider four semi-species within *S.curruca* superspecies: *curruca* (subspecies *curruca* including *blythi*, and *halimodendri*), *margelanica*, *minula* and *althaea*. They consider *telengetica* as intermediate population between typical *curruca* and *margelanica/minula*, and then include *telengetica* in *halimodendri*. Southern desert forms *jaxartica* and *snigirewskii* they regard as synonyms of *minula*. We consider last position more precisely reflect the current knowledge of this bird and accept it for exception Hume’s Lesser Whitethroat which species validity without any doubt. As independent species we consider *Motacilla lutea* and *M.feldegg* which breed in Kazakhstan by places together with *M.flava* but hybrids not known or very rare. *Motacilla calcarata* is a full species also as it settled from neighbour Kyrgyzsan and in new territories Grey-backed Citrine Wagtail replaced by Black-backed Wagtail. At first we consider *Buteo japonicus* as independent from *Buteo buteo* species. Though these birds have different wing structure and pass the winter in different continents (Asia and Africa), they need to further study. There are also distinctions concerning geographical distribution of some races and populations. So, the Red-necked Grebe occupying the Balkhash-Alakol’ depression we have split to race *holboellii* to attract attention to the necessity for its study. In general, it is necessary once again to emphasise the necessity of continuing fauna research, collecting skins from various areas of Kazakhstan is one of ornithology’s urgent task.

Breeding biology is fairly well known for those species, which were specially studied, *Tadorna tadorna*, *Alectoris chukar*, *Phoenicopterus roseus*, *Falco cherrug*, *Fulica atra*, *Chlamydotis macqueenii*, *Ibidorhyncha struthersii*, *Larus relictus*, *Pterocles orientalis*, *Melanocorypha calandra*, *Alauda gulgula*, *Eremophila alpestris albigula*, *Troglodytes troglodytes*, *Prunella atrogularis*, *Prunella fulvescens*, *Luscinia pectoralis*, *Phoenicurus caeruleocephalus*, *Turdus viscivorus*, *Sylvia hortensis*, *Phylloscopus humei*, *Leptopoeile sophiae*, *Lanius meridionalis*, *Lanius phoenicuroides*, *Pica pica*, *Podoces panderi*, *Corvus monedula*, *Sturnus vulgaris*, *Passer hispaniolensis*, *Loxia curvirostra tianschanica*, *Carpodacus rhodochlamys*, *Mycerobas carnipes*, *Emberiza bruniceps*, for example. No nest were found in Kazakhstan in Marbled Duck (*Anas angustirostris*), Daurian Partridge (*Perdix dauurica*), Great Rosefinch (*Carpodacus rubicilla*), Pallas’ Rosefinch (*Carpodacus roseus*), Greater Red-mantled Rosefinch (*Carpodacus grandis*), Two-barred Crossbill (*Loxia leucoptera*), Common Redpoll (*Carduelis flammea*), Long-tailed Rosefinch (*Uragus sibiricus*), Olive-backed Pipit (*Anthus hodgsoni*), Moustached Warbler (*Acrocephalus melanopogon*), Siberian Blue Robin (*Luscinia cyane*), Red-flanked Bluetail (*Tarsiger cyanurus*), Pied Stonechat (*Saxicola caprata*) and some others. No nests

are known for many subspecies, breeding in different habitats. At bottom we have enough data on some species from one, two or three points only (Kovshar, 2004) and it is impossible now to compare productivity many birds in different areas.

Morphological diagnostics of races follow mainly L.S. Stepanyan (1990), though in some cases new information was added, and for sub-species not accepted by him on the basis of the skin collections at the Institute of Zoology, and literary data. It is necessary to remember, that sub-species identification in nature is very difficult, and the numerous skin collections of birds are necessary for reference. The existing diagnoses of many forms are imperfect and demand further research. This difficult, time-consuming task is a beneficial field of activity for young ornithologists.

In species accounts the main biological information – migration, status, habitat, time of moving and breeding, nests and their location, and other information – are included. To make the check-list more precise, all species not confirmed for at least 100 years or doubtful and erroneous, were removed to “Rejected species” section. Birds mentioned in “The Birds of Kazakhstan” and found on nearby territory only were placed in another section “Expected species”. We hope that such an approach will stimulate the gathering of new facts (skins, photographs and drawings) for the inclusion of these birds in main check-list.

It is necessary to make some general remarks for users of the present work. All confirmed documented species found in Kazakhstan have a serial number. The name of each geographical race and its distribution is given, followed by an account of the species. If some races are in Kazakhstan, after each name a morphological diagnosis and distribution are given in very general line as ever for species with well significant morphology difference in sub-species (as in *Milvus migrans migrans* and *Milvus migrans lineatus*, *Oriolus oriolus oriolus* and *Oriolus oriolus kundo*, for example) there are very few exact breeding points and they integrates widely, so it is impossible to outline its sub-species distribution exactly.

It is necessary to know, that after independence many towns and villages were re-named and we mostly use new names. For anyone using old papers, we give some new names:

Now	Before	Now	Before
Aktau	Shevchenko	Dzharkent	Panfilov
Aktobe	Aktyubinsk	Korday	Georgievka
Almaty	Alma-Ata	Kulan	Lugovoye
Atyrau	Gur'ev	Ridder	Leninogorsk
Dzhabagly	Novonikolaevka	Taraz	Dzhambul

All geographical points mentioned in the text you can find on coordinates given in Appendix 2.

We hope that this book will be of interest to those who study our birds or only visit our country for a short time. All critical remarks will gratefully accepted by the authors.

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KAZAKHSTAN and BIRD WATCHING

Kazakhstan Republic situated in the centre of Eurasian continent. Its territory has roughly 2715 100 square kilometres and stretch for 2925 km from west to east (Caspian Sea – Altai) and for 1600 km from north to south (southern part of Western Siberia plain – Kyzylkum Desert). In mostly plain, at western part on Mangyshlak Peninsula there is Karagie hollow situated at 132 m below sea level, and in eastern part there are mountain systems Tien Shan (main ridges Ugamskiy, Talasskiy, Kirgizskiy, Zailiyskiy, Terskey Alatau, Ketmen and Tengri-Tag with peak Khan Tengri, 6695 m above sea level, near border with Kyrgyzstan and China). To north of Tien Shan between Ile valley and Alakol' depression, on the border with China, there is Dzhungarskiy Alatau ridge (peak 4464 m) and Tarbagatai ridge (peak 2991 m) which stretch out from west to east south of Zaysan depression to north of which there is Altai area (main ridges Narymskiy, Kholzunskiy, Lineyskiy, Kurchumskiy, Ivanovskiy, Manrak, Saur, Altayskiy Tarbagatai and Southern Altai, peak 3483 m). To north west of Zaysan depression there is Kalbinskiy Altai (ridge) of low mountains, and large area of Kazakh upland, which consist of old low mountains. Between Irgiz – Turgai depression and Ural river valley old low Mugodzhary ridge exist. Above Caspian and Aral Sea the main lakes are Balkhash, Alakul, Tengiz, Selety-Teniz and many smaller ones. The main rivers are Ural, Irtysh, Syrdaria and Ile, which have forested flood-lands. Vast different desert (sandy, stony, clay) with spots of saxaul forest, steppe (wormwoody, feather-grassy, fesque-grassy and others) with lakes and by places with groves and shrubs, which inhabited by many birds. In Northern Kazakhstan prevailed steppe with forest-islands (pine, birch, oak, poplar etc). But different habitats occur in mountains which can be forested (spruce, fir, juniper etc) or not, with steppe and meadow parts and stony peaks covered by snow, and many streams and rivers. Plain river valleys have deciduous forest and shrubs, as a rule.

Therefore not surprisingly that 503 bird species occur in our country. Out of them 90 are sedentary, 313 breeding migrant, 68 occur during migration only, 29 accident and 3 with unknown status. It needs to mention at first such ones as Black Lark (*Melanocorypha yeltoniensis*), White-winged Lark (*Melanocorypha leucoptera*) and Sociable Lapwing (*Vanellus gregarius*) which nesting areas disposed mostly in Kazakhstan and small parts in neighbouring Russia. It needs to mention Relict Gull (*Larus relictus*) and Yellow-eyed Stock Dove (*Columba eversmanni*) also, which have restricted breeding areas. But other birds distributed more widely.

In last years the numbers of some species decreased and their distribution reduced, therefore they included in The Red Book of Kazakhstan (formed in 1978). In the last edition (1996) 56 species of birds (and Lesser White-fronted Goose some later, in 2002) are included (Appendix 1).

Of course, this list can be discussed and on our opinion some species must be excluded. For example, Eagle Owl, Little Curlew, Blue Whistling Thrush, Great Rosefinch. But it exists more than 25 years.

The main form of conservation in Kazakhstan is special protected areas which included 9 reserves (in Western Tien Shan Aksu-Djabagly from 1926, in steppe area Naurzumskiy from 1930, in Zailiyskiy Alatau ridge Almatinskiy from 1931, on Aral Sea Barsa-Kelmesskiy from 1939, in Central Kazakhstan Korgalzhyn from 1958, on Altai Markakol'skiy from 1976 (Markakol' lake and adjusted area of Kurchum ridge), on Mangyshlak peninsula Usturtskiy from 1984, Western-Altayskiy from 1992 (Black and White Uba river basins, eastern of Ridder town), and on Alakol' depression Alakol'skiy from 1998) and 6 National Parks (in Kazakhishe upland Bayan-Aul'skiy from 1985, in low Altyn-Emel' ridge Altyn-Emel'skiy from 1996, in Kokshetau upland Kokshetauskiy from 1996, and in Zailiyskiy Alatau ridge Ile-Alatauskiy from 1996, in Kazakhishe upland close to Karkaralinsk village Karkaralinskiy from 1999 and on Altai close to Katon-Karagay village Katon-Karagaiskiy from 2000).

No special works on conservation and increase numbers of some species was conducted and only in 2004 the project of Bird Life International on Sociable Lapwing ("Investigation into the causes of the decline of Sociable Plover") begins in Korgalzhyn reserve. In future special projects on Relict Gull (study of change breeding colonies by colour marking of nestlings in Kazakhstan, Russia and China) and Yellow-eyed Stock Dove (increasing numbers by special nest-boxes, as birds have shortage of tree-holes for breeding) will be perspective.

Our birds attract attention of foreign specialists and in last years hundreds of ornithologists and bird-watchers visit Kazakhstan yearly. There are several tourist firms, which organise such trips and supplied them with qualified ornithologists as a guide, "Silk Road" (sradventure@nursat.kz) and "Khan-Tengri" (kazbek@kantengri.almaty.kz), for example.

But it needs to remember that related species when breeding together hybridised freely. Out of them especially Grey Partridge (*Perdix perdix*) and Daurian Partridge (*Perdix dauurica*), Long-legged

Buzzard (*Buteo rufinus*) and Upland Buzzard (*Buteo hemilasius*), Hooded Crow (*Corvus cornix*) and Carrion Crow (*Corvus corone*), Western Jackdaw (*Corvus monedula*) and Daurian Jackdaw (*Corvus dauuricus*), Yellowhammer (*Emberiza citrinella*) and Pine Bunting (*Emberiza leucocephala*), Goldfinch (*Carduelis carduelis*) and Grey Goldfinch (*Carduelis caniceps*), Azure Tit (*Parus cyanus*) and Yellow-breasted Azure Tit (*Parus flavipectus*), Blue Tit (*Parus caeruleus*) and Azure Tit (*Parus cyanus*), Great Tit (*Parus major*) and Grey Tit (*Parus bokharensis*), Great Reed Warbler (*Acrocephalus arundinaceus*) and Clamorous Reed Warbler (*Acrocephalus stentoreus*), Booted Warbler (*Hippolais caligata*) and Sykes' Warbler (*Hippolais rama*), Red-backed Shrike (*Lanius collurio*) and Turkestan Red-tailed Shrike (*Lanius phoenicuroides*) and may be some others (Great Spotted Woodpecker (*Dendrocopos major*) and White-winged Woodpecker (*Dendrocopos leucopterus*). In such birds field identification is a problem in many cases, except *Corvus*. The better is to have such bird in hand. Some details you can read in the species accounts.

The more attractive and frequent visited by foreign tourists and bird-watchers such places.

Sorbulak Lake (desert area, 80 km north-west of Almaty; 43°46N 76°05E). It is artificial sewage-water reservoirs system with open or overgrown with reed-beds shores and several forest belts. In summer here breed Ruddy Shelduck, Common Shelduck, Great Cormorant (colony of several hundred pairs), Little Bittern, Dalmatian Pelican (colony up to 300 pairs), Common Pheasant, Marsh Harrier, Shikra, Water Rail, Little Crake, Moorhen, Common Coot, Black-winged Stilt, Collared Pratincole, Little Ringed Plover, Northern Lapwing, Common Redshank, Black-headed Gull, Caspian Gull, Gull-billed Tern, Common Tern, Little Tern, Black Tern, Black-bellied Sandgrouse, Common Cuckoo, Common Kingfisher, European Bee-eater, European Roller, Hoopoe, Calandra Lark, Short-toed Lark, Eurasian Skylark, Eurasian and Pale Sand Martin, Barn Swallow, Tawny Pipit, Black-headed Wagtail, Bluethroat, Isabelline Wheatear, Cetti's Warbler, Grasshopper Warbler, Paddyfield Warbler, Reed Warbler, Great Reed Warbler, Clamorous Reed Warbler, Bearded Tit, Turkestan Red-tailed Shrike, Lesser Grey Shrike, Magpie, Western Jackdaw, Rook, Carrion Crow, Common Starling, Rose-coloured Starling (colony up to one thousand pairs), Common Mynah, Indian Sparrow, Spanish Sparrow, Tree Sparrow, Red-headed Bunting and Corn Bunting. During migration, especially in April-May and August-September, several hundred species can be observed here and White-headed Duck among them.

Kolshengel' village (desert area, 200 km north-west of Almaty; 44°30N 75°07E) is situated in area where sand dunes overgrown with grasses and bushes border on plain clay and stony desert. Small patches of saxaul forest exist nearby. There are several artesian wells, which used by birds for watering, especially during hot days. Such points are very effective for birding, catching and ringing birds. Out of breeding birds it needs to mention Houbara Bustard, Demoiselle Crane, Greater Sand Plover, Black-bellied Sandgrouse, Pin-tailed Sandgrouse, European Nightjar, Eagle Owl, Calandra Lark, Bimaculated Lark, White-winged Lark, Short-toed Lark, Lesser Short-toed Lark, Eurasian Skylark, Oriental Skylark, Barn Swallow, Isabelline Wheatear, Desert Wheatear, Asian Desert Warbler, Southern Grey Shrike and Red-headed Bunting and some others. Sometimes Egyptian Vulture, Long-legged Buzzard, Pallid Harrier and even Trumpeter Finch, which stay in Kazakhstan is not clear, can be observed too. During migration much more species can be met here, including very unexpected, as Little Bittern, Common Swift and others.

Djelturanga village situated near 200 km to north north west of Kolshengel' (45°03N 75°47E), close to Ile valley. Here is the famous Grove of relict turanga tree (*Populus diversifolia*). Very old trees have many natural holes, which used by Yellow-eyed Stock Dove (may be 30-50 pairs), European Roller, Striated Scops Owl, Eurasian Scops Owl, Hoopoe, Western Jackdaw, Common Starling, Grey Tit and Saxaul Sparrow for breeding. White-winged Woodpecker also very common here and it make additional holes for other birds. Out of other species White-tailed Eagle, Shikra, Stone Curlew, Lesser Whitethroat, Sykes' Warbler and probably Booted Eagle breed here also. Grey Heron, Great White Egret, Night Heron and Ruddy Shelduck can be observed every day and they must breed nearby.

Big Almaty Lake (42°59N 76°57E) situated 30 km south of Almaty in Zailiyskiy Alatau ridge (Tien Shan) at 2500 m above sea level. On road you pass along river through deciduous (apple, apricot, asp, birch) and coniferous (spruce) belts. Further the road is going up to Observatory (2750 m, here the Hotel exists) and Kosmostation (3300 m) through juniperus belt and alpine meadows surrounded by cliffs, crumbled stones with moraine and glacier nearby. Various habitats have different breeding species. Ruddy Shelduck, Black Grouse, Himalayan Snowcock, Chukar Partridge, Common Quail, Common Pheasant, Lammergeier, Eurasian Sparrowhawk, Eastern Buzzard, Golden Eagle, Common Kestrel, Merlin, Hobby, Barbary Falcon, Corn Crake, Ibisbill, Eurasian Woodcock, Oriental Turtle

Dove, Common Cuckoo, Hawk Owl, Eurasian Scops Owl, Tengmalm's Owl, Great Spotted Woodpecker, Three-toed Woodpecker, Shore Lark (probably), European House Martin, Tree Pipit, Water Pipit, Masked Wagtail, White-throated Dipper, Brown Dipper, Wren, Black-throated Accentor, Brown Accentor, Alpine Accentor, Himalayan Accentor, Himalayan Rubythroat, Blue-headed Redstart, Eversmann's Redstart, Common Redstart, Guldenstadt's Redstart, Northern Wheatear, Rock Thrush, White's Thrush, Blue Whistling Thrush, Blackbird, Mistle Thrush, Common Whitethroat, Greenish Warbler, Hume's Warbler, Olivaceous Leaf Warbler, Goldcrest, Severtzov's Tit-warbler, Tien-Shan Willow Tit, Coal Tit, Azure Tit, Great Tit, Wallcreeper, Eurasian Treecreeper, Turkestan Red-tailed Shrike, Magpie, Nutcracker, Yellow-billed Cough, Red-billed Cough, Western Jackdaw, Carrion Crow, Common Raven, Common Starling, Common Mynah, Red-fronted Serin, Grey Goldfinch (ssp. *paropanis*), Hodgson's Rosy Finch, Brandt's Rosy Finch, Common Crossbill (ssp. *tianschanica*), Common Rosefinch, Tien-Shan Red-mantled Rosefinch, Red-breasted Rosefinch, White-winged Grosbeak and Rock Bunting can be observed as breeding here. On migration Spotted Flycatcher, Dusky Warbler, Black-throated Thrush, Bluethroat and some others can be met too. But for several days it is impossible to observe all these birds, as some of them are very rare and have restricted distribution.

Syugaty valley (170 km east of Almaty) surrounded with low ridges Syugaty, Boguty and Turaigyr, artesian well near Burundysu (43°42'N 78°39'E), Charyn ash-tree Grove with Yellow and Red Canyons are visited by ornithologists often. Here many raptors breed (Lammergeier, Himalayan Griffon, Eurasian Black Vulture, Short-toed Eagle, Long-legged Buzzard, Upland Buzzard, Steppe Eagle (rare), Eastern Imperial Eagle, Golden Eagle, Booted Eagle, Lesser Kestrel, Common Kestrel, Hobby, Saker Falcon, Barbary Falcon) and Black Stork, Chukar Partridge, Demoiselle Crane, Greater Sand Plover, Black-bellied Sandgrouse, Pallas's Sandgrouse, Stock Dove (ssp. *yarkandensis*), Collared Dove (ssp. *stoliczkae*) and Laughing Dove (in villages on road), Common Cuckoo, Eurasian Scops Owl, European Roller, Hoopoe, White-winged Woodpecker, Bimaculated Lark, Short-toed Lark, Lesser Short-toed Lark, Asian Short-toed Lark, Crested Lark, Barn Swallow, Red-rumped Swallow (in villages on road), European House Martin, Tawny Pipit, Grey Wagtail, Masked Wagtail, Rufous Bush Robin, Common Nightingale, Isabelline Wheatear, Pied Wheatear (including *vittata*), Desert Wheatear, Cetti's Warbler, Savi's Warbler, Sykes' Warbler, Barred Warbler, Lesser Whitethroat, Orphean Warbler, Hume's Lesser Whitethroat, Long-tailed Tit, Great Tit, Grey Tit, Eurasian Treecreeper (very rare), Black-headed Penduline Tit, Golden Oriole (ssp. *kundoo*), Turkestan Red-tailed Shrike, Long-tailed Shrike, Lesser Grey Shrike, Magpie, Western Jackdaw, Rook, Carrion Crow, Common Raven, Common Starling (ssp. *porphyronotus*), Rose-coloured Starling, Common Mynah, House Sparrow, Indian Sparrow, Spanish Sparrow, Saxaul Sparrow, Tree Sparrow, Rock Sparrow, Greenfinch, Grey Goldfinch, Linnet, Crimson-winged Finch, Desert Finch, Mongolian Finch, Pine Bunting, White-capped Bunting, Rock Bunting, Grey-necked Bunting, Red-headed Bunting and Corn Bunting too.

Merke Gorge is very interesting in Kirgizskiy Alatau Ridge (near 350 km west of Almaty; 42°55'N 73°14'E) where deciduous and juniperus forest with alpine meadows and vast rocky and crumbled stones parts exist. Here you can observe Himalayan Snowcock, Chukar Partridge, Lammergeier, Himalayan Griffon, Eurasian Black Vulture, Hobby, Blue Hill Pigeon, Wood Pigeon, Oriental Turtle Dove, Common Cuckoo, Eurasian Scops Owl, Grey Wagtail, Long-tailed Shrike, Lesser Grey Shrike, Common Mynah, Red-billed Cough, Yellow-billed Cough, White-throated Dipper, Brown Dipper, Black-throated Accentor, Common Whitethroat, Hume's Lesser Whitethroat, Greenish Warbler, Hume's Warbler, Olivaceous Leaf Warbler, Severtzov's Tit-warbler, Blue-headed Redstart, Eversmann's Redstart, Blackbird, Mistle Thrush, Blue Whistling Thrush, Black Crested Tit, Yellow-breasted Azure Tit, Black-headed Penduline Tit, Red-fronted Serin, Linnet, Common Rosefinch, Tien-Shan Red-mantled Rosefinch, Great Rosefinch, White-winged Grosbeak, Rock Bunting and some others, as this area not well investigated.

Korgalzhyn reserve (Central Kazakhstan close to new capital Astana, 1200 km north of Almaty; 50°29'N 70°00'E) also attract attention of foreign ornithologists as here the northernmost breeding colony of Greater Flamingo, small colonies of Sociable Lapwing exist, Black Lark and White-winged Lark are very common on breeding too. It is very interesting that Short-eared Owl hunted here for Steppe Lemming (*Lagurus lagurus*) by day, as this is day animal. Many ducks (including White-headed Duck), gulls, terns, waders and small Passerine inhabited reed-beds live here, and in summer thousands of waterfowl gathered for moult on Tengiz Lake (especially Common Shelduck) and swans and river ducks on fresh-water lakes. In July-August a lot of waders (up to 1 million of Red-necked Phalarope only) migrate through this area and stopped for rest and feeding on many lakes.

Kazakhstan Altai also attracts ornithological attention, but it is far of Astana (above 2000 km) and of Almaty (near 2000 km), have bad mountain roads and close borders with China and Russia do this

trip not easy. Though here you can observe on breeding such birds as *Melanitta deglandi*, Black-throated Diver, Hazel Grouse, Willow Grouse, Ptarmigan, Black Grouse, Capercaillie, Altai Snowcock, Black Stork, Eastern Buzzard, Long-legged Buzzard, Upland Buzzard, Osprey, Altai Falcon, Peregrine Falcon, Corn Crake, Common Crane, Dotterel, Common Sandpiper, Great Snipe, Pintail Snipe, Swinhoe's Snipe, Solitary Snipe, Oriental Cuckoo, Pigmy Owl, Ural Owl, Great Grey Owl, Tengmalm's Owl, White-throated Needletail, Pacific Swift, Wryneck, Grey-headed Woodpecker, Black Woodpecker, Great Spotted Woodpecker, White-backed Woodpecker, Lesser Spotted Woodpecker, Three-toed Woodpecker, European House Martin, Olive-backed Pipit, Tree Pipit, Citrine Wagtail, Masked Wagtail, White-throated Dipper, Black-throated Accentor, Himalayan Accentor, Siberian Rubythroat, Bluethroat, Siberian Blue Robin, Red-flanked Bluetail, Eversmann's Redstart, Black Redstart, Common Redstart, Guldenstadt's Redstart, Common Stonechat, Rock Thrush, Black-throated Thrush, Song Thrush, Fieldfare, Mistle Thrush, Sedge Warbler, Blyth's Reed Warbler (very numerous), Barred Warbler, Lesser Whitethroat, Common Whitethroat, Greenish Warbler, Hume's Warbler, Dusky Warbler, Olivaceous Leaf Warbler, Common Chiffchaff, Willow Warbler, Goldcrest, Spotted Flycatcher, Sooty Flycatcher, Long-tailed Tit, Marsh Tit, Willow Tit, Siberian Tit, Coal Tit, Great Tit, Eurasian Nuthatch, Eurasian Treecreeper, Penduline Tit, Red-backed Shrike, Turkestan Red-tailed Shrike (and hybrids between them), Great Grey Shrike, Eurasian Jay, Siberian Jay, Magpie, Nutcracker, Yellow-billed Cough, Red-billed Cough, Western Jackdaw, Rook (ssp. *pastinator*), Carrion Crow, Hooded Crow, Common Starling (ssp. *poltaratskyi*), House Sparrow, Tree Sparrow, Common Chaffinch, Brambling, Grey Goldfinch (ssp. *subulata*), Linnet, Twite, Common Redpoll, Hodgson's Rosy Finch, Rosy Finch, Two-barred Crossbill (breeds?), Common Crossbill (ssp. *altaiensis*), Common Rosefinch, Pine Grosbeak, Long-tailed Rosefinch, Grey Bullfinch, Pine Bunting, Yellowhammer and their hybrids, Rock Bunting, Ortolan Bunting, Yellow-breasted Bunting and Red-headed Bunting. During migration some additional species can be observed too.

Who is interested in ringing and study of birds-in-hand (species and sex-age differences, moulting, photography) can visit **Chokpak Ringing Station**, which situated in Western Tien Shan (between Djambul and Chimkent, 600 km west of Almaty; 42°31'N 70°38'E). Here on joint of Djabaglytau ridge (2900 m) and Borolday ridge (1600 m) many birds concentrated (as in "bottle-neck") during migration especially in autumn when above 100 thousand can be count for two morning hours. Near 300 bird species registered here. When head wind birds fly very low and some of them fly into stationary traps (12 m in height and 40 m in width), but when tail wind they pass by on great altitude. Therefore catching depends on weather condition and yearly numbers fluctuation of birds. Though passage migration on Chokpak Pass predominated, some birds stopped for rest in forest belts and mist netting used here successfully. From 1966, when the Station was organized, 1624342 birds were ringed here (at spring 1042528, at autumn 581814). Recoveries were received from Eastern and Western Siberia, China, Kyrgyzstan, Uzbekistan, Turkmenistan, Tadjikistan, Azerbaydjan, French, Kenya, South Africa Republik and India. Out of interesting species it can be mention such as Daurian Partridge, Oriental Honey Buzzard, Shikra, Eastern Buzzard, Upland Buzzard, Booted Eagle, Osprey, Lesser Kestrel, Merlin, Water Rail, Corn Crake, Stone Curlew, Eurasian Woodcock, Yellow-eyed Stock Dove, Striated Scops Owl, Eagle Owl, Blue-cheeked Bee-eater, Wryneck, White-winged Woodpecker, Eastern House Martin, Buff-bellied Pipit, Yellow Wagtail (ssp. *leucocephala*, in spring), Black-backed Citrine Wagtail (*Motacilla calcarata*), Wren, Black-throated Accentor, Robin, White-throated Robin, Blue-headed Redstart, Eversmann's Redstart, Black Redstart, Pied Stonechat, Pied Wheatear, Desert Wheatear, Naumman's Thrush, Red-throated Thrush (hybrids with Black-throated Thrush), Song Thrush, Blyth's Reed Warbler, Upcher's Warbler, Garden Warbler, Barred Warbler, Orphean Warbler, Menetries's Warbler, Arctic Warbler, Pallas's Leaf Warbler, Yellow-browed Warbler, Olivaceous Leaf Warbler, Paradise Flycatcher, Red-breasted Flycatcher, Yellow-breasted Azure Tit, Grey Tit, Isabelline Red-tailed Shrike, Red-backed Shrike, Long-tailed Shrike, Brown-necked Raven, Rock Sparrow, Greenfinch, Siskin, Crimson-winged Finch, Desert Finch, Mongolian Finch, Tien-Shan Red-mantled Rosefinch, White-capped Bunting, Rock Bunting, Ortolan Bunting, Grey-necked Bunting, Reed Bunting, Red-headed Bunting and Corn Bunting. In last years we successfully try to attract some birds in mist nets or stationary traps by CD-player but this not well developed now.

When "dead" days, it is possible to visit nearby interesting points for birding and ringing. **Stone Lake** (42°49'N 70°56'E) situated east of Karatau ridge, 50 km of Chokpak. Nearby Little Bustard, Long-legged Buzzard, Lesser Kestrel (colony), Short-toed Eagle, Egyptian Vulture, Eagle Owl, Eastern Rock Nuthatch, Collared Pratincole, Rose-coloured Starling (colony), Bimaculated Lark can be observed. On lake very effective place for mist-netting exists and many breeding and migrating Passerines can be caught here (Great Reed Warbler, Clamorous Reed Warbler, Reed Warbler,

Paddyfield Warbler, Blyth's Reed Warbler, Savi's Warbler, Bearded Tit, Penduline Tit, Common Rosefinch, Cetti's Warbler, Moustached Warbler, Bluethroat, Common Chiffchaff and others, but Common Kingfisher, Water Rail, Little Bittern and Baillon's Crake sometimes too. Some Ducks, Gulls, Terns, Great Crested Grebe, Common Coot, Eurasian Bittern, Blue-cheeked Bee-eater and Black Stork can be observed too. Near 30 km further **Berkara gorge** (42°57'N 70°33'E) exists, where Paradise Flycatcher, Spotted Flycatcher (ssp. *zarudnyi*), Lesser Grey Shrike, Common Nightingale, Grey Tit and Black-headed Penduline Tit breeds in quite high numbers.

Very beautiful for birding and mist-netting of small Passerine and waders is **Kyzylkol' Lake** (43°44'N 69°31'E), situated in foothills of Karatau ridge 250 km from Chorpak. Here you can observe many ducks (Pintail, Gadwall, Common Pochard, Red-crested Pochard, Common Shelduck, Ruddy Shelduck, Marbled Duck), Common Coot, Great Crested Grebe, Dalmatian Pelican, Black Stork, Black-bellied Sandgrouse, Pin-tailed Sandgrouse, Oriental Turtle Dove, Baillon's Crake, Common Kingfisher, European Nightjar (ssp. *sarudnyi*, *unwini*), Common Whitethroat, Lesser Whitethroat (ssp. *halimodendri*, *curruca*, *minula*, *jaxartica*), Barred Warbler, Garden Warbler, Great Reed Warbler, Clamorous Reed Warbler, Reed Warbler, Paddyfield Warbler, Cetti's Warbler, Common Chiffchaff, Willow Warbler, Hume's Warbler, Greenish Warbler, Moustached Warbler, Yellow Wagtail (ssp. *flava*, *beema*, *thunbergi*), White Wagtail, Black-headed Wagtail, Isabelline Red-tailed Shrike, Turkestan Red-tailed Shrike, Rufous Bush Robin, Bluethroat, Common Stonechat, Northern Wheatear, Isabelline Wheatear, Spotted Flycatcher, Common Rosefinch, Grey Goldfinch, Desert Finch, Red-headed Bunting. Many waders stop here for rest and feeding, Black-winged Stilt, Common Redshank, Greater Sand Plover, Caspian Plover, Red-necked Phalarope, Little Stint, Temminck's Stint, Curlew Sandpiper, Common Sandpiper, Little Ringed Plover, Ringed Plover, Kentish Plover, Terek Sandpiper, Northern Lapwing and some other. Many larks (Bimaculated Lark, Eurasian Skylark, Lesser Short-toed Lark, Short-toed Lark, Crested Lark) live in this area too and fly for water on lake and artesian well (we saw several times White-winged Lark too). In August – September many White-headed Duck stop on migration (2838 were counted by Andrew Grieve in 14-17 September 2001, and 1000 9 April 2002), near 20 thousand Ruff and 12 thousand Demoiselle Crane in early September 2005. Near 30-40 km further in Karatau ridge there is **Griffon Vulture colony** (43°16'N 68°40'E), where near 15-20 pairs breeding (in September nestlings are at the nests else). Here you can observe White-throated Robin, Rock Thrush, White-throated Dipper, Red-headed Bunting, White-capped Bunting, Orphean Warbler, Hume's Lesser Whitethroat, Eastern Rock Nuthatch, Rose-coloured Starling and other birds.

From Chokpak Station it is possible to organise special ringing trip on above points and 600-1300 birds can be ringed for two weeks. As an example, we bring results of such trip in 2005 (Appendix 3). The oldest in Kazakhstan Aksu-Djabagly reserve located 30 km west of Chokpak Station with pictorial Aksu canyon can be visited too, where you can observe Lammergeier (*Gypaetus barbatus*), Eurasian Black Vulture (*Aegypius monachus*), Brown Dipper (*Cinclus pallasii*), Blue Whistling Thrush (*Myophonus caeruleus*), Black Crested Tit (*Parus rufonuchalis*), Tien-Shan Red-mantled Rosefinch (*Carpodacus rhodochlamys*) and some others. If you wish to visit Chokpak Station please write to Andrey Gavrilov (agavrilov@nursat.kz).