

SPECIALIST GROUP ON STORKS, IBISES AND SPOONBILLS

NEWSLETTER

Volume 6, Number 1/2

November, 1993

LETTER FROM THE CO-CHAIRS

The Specialist Group is in the process of developing an Action Plan for Storks, Ibises and Spoonbills. This is basically an overall summary of their status and conservation needs (see page 2 [Action Plan]). We have mentioned this briefly in earlier newsletters, and we now are in the process of preparing this. This will be a major effort of the entire group. Your ideas will be critical in developing the Action Plan.

We have begun summarizing status and conservation of needs of African SIS following the Pan-African Ornithological Congress of October, 1992. We will begin a similar summary of the status and needs of SIS in Central and South American and the Caribbean.

We hope to hold a CAMP (see page 2 [Action Plan] and the Newsletter supplement) in Asia to develop a conservation strategy for the region. The largest number of species encounter the greatest threats in Asia. This will be extremely important. But, for other regions, we will solicit your ideas and concerns by mail as we have always done. This is the strength of our organization. We look forward to your ideas and concerns.

While we prepare for this important initiative, we had significant recent developments:

Giant Ibis *Pseudibis gigantea*. This species had not been seen for over 30 years, and was thought possibly to be extinct. We are excited that it was recently recorded by a joint Laotian and British expedition in southern Laos.

SIS Library. Dr. M. Phil Kahl very generously donated his library of literature on storks, ibises and spoonbills to the SIS library. This included over 1,000 articles and books, many of which are rare and hard to find. We are extremely grateful for this important gift.

Black Stork *Ciconia nigra* Conference. Maris Strazds hosted the First International Black Stork Conference in Latvia in April 1993. This was a great success with participants coming from many parts of the world.

Black-faced Spoonbill *Platalea minor*. While many people have written letters in support of preserving the important but threatened winter habitat of the Black-faced Spoonbill in Taiwan, we are still very concerned. The Tsen Wen River Estuary does not yet have protected status. If you have not written a letter to the Taiwanese government (see the last newsletter for details), we strongly encourage you to write a letter now.

-- Malcolm Coulter and Koen Brouwer

GIANT IBIS *PSEUDIBIS GIGANTEA* REDISCOVERED

The Giant Ibis *Pseudibis* (= *Thaumatibis*) *gigantea* had not been seen for more than 30 years. While there was concern that the species may have become extinct, there was still hope that populations still persist in the wetlands of Laos, Viet nam and Kampuchea. Two individuals were spotted in southern Laos during a recent joint expedition of the Laos Department of Wildlife and Fisheries Conservation and a group from Cambridge in the United Kingdom.

The expedition was surveying the Xe Pian Proposed Protected Area and surroundings. A total of 314 bird species including the White-shouldered Ibis *Pseudibis davisoni*, Lesser Adjutant Stork *Leptoptilos javanicus* and Woollynecked Stork *Ciconia episcopus* were recorded. The proposed protected area is composed of semi-evergreen forest and the adjacent area where the ibises were found is a riverine system. Following the discovery of the Giant Ibises, an extension of the park to include the riverine habitat was proposed.

-- from *World Birdwatch* [1993] 15(2):6

ACTION PLANS FOR STORKS, IBISES AND SPOONBILLS

The Specialist Group on Storks, Ibises and Spoonbills is developing Action Plans for SIS. The action plan is basically a summary of the status of the species and their conservation needs -- both general conservation needs and specific project proposals. Most conservation needs concern preservation of wild populations and their habitat. For particularly rare species, such as Waldrapp Ibises *Geronticus eremita* or Oriental Crested Ibises *Nipponia nippon*, it is important to include captive breeding programs to develop a population that could eventually be released into the wild once threats in the wild are minimized or under control.

The Action Plan will be useful to increase the awareness of politicians and conservation groups of our needs, and in searching for funds. It will also highlight needs to collect more information in certain areas, and will summarize baseline data for future comparison. The document will be based on the input that each of us provides, and will be available to each of us to use in our own work. The value of the document will depend on how each of us uses it for conservation. The plan will be updated and rewritten to remain current.

Action Plans for different groups of birds or other animals are often developed through a CAMP workshop (see the enclosed supplement to this Newsletter). These workshops can be very instructive and helpful. However, because they are expensive to run, they have often consisted of bringing together a few people with wide expertise. In our case, our strength is our wide participation throughout the world. Therefore, in developing the Action Plan for SIS, we are depending heavily on correspondence with all of the members to determine status and needs of the species. We also presently have an initiative in Africa to summarize this information for that continent (see below: Status of Storks, Ibises and Spoonbills in Africa) and will shortly begin a similar initiative for Central and South America. We also depend on workshops at scientific meetings such as the Pan-African Ornithological Congress and the recent Black Stork meeting in Latvia.

We are planning to hold a CAMP meeting to concentrate on the situation in Asia where the largest number of species face the greatest threats. We feel that this is the best use of our limited funds.

In developing the Action Plan for SIS, we will depend heavily on the input of each member of the Specialist Group. Your continuing advice and suggestions are always welcome. We will keep you informed and solicit advice along the way. We thank you in advance for your contribution and support in this major effort.

-- Malcolm Coulter and Koen Brouwer

STATUS OF STORKS, IBISES AND SPOONBILLS IN AFRICA

At the Pan-African Ornithological Congress last fall (30 September to 5 October, 1992) in Bujumbura, Burundi, the SIS Specialist Group held a workshop on SIS in Africa. 25 people from 19 countries participated. We summarized the status of SIS and their conservation needs in the countries represented (1993). Conservation status of threatened Ciconiiformes in Africa. In: Wilson, R.T. (ed.), Birds and the African Environment: Proceedings of the Eighth Pan-African Ornithological Congress. Annales Musee Royal de l'Afrique Centrale (Zoologie) 268:635-639.

This summary produced at the workshop is an excellent beginning. We are following this with a larger effort with brief, but more thorough summaries of status and conservation needs of SIS. This will cover both the countries in the initial summary as well as additional countries.

-- Malcolm Coulter

FIRST INTERNATIONAL BLACK STORK CONFERENCE IS A SUCCESS

Some 60 participants attended the First International Black Stork Conservation and Ecology Symposium held at the Kremeri Sanatorium in Jurmala, Latvia, 19-23 April 1993. Maris Strazds and his assistant, Sanda Golde, of the Latvian Fund for Nature, and the Latvian Ornithological Society were largely responsible for conference organization with support from the SIS Specialist Group and the Swedish Ornithological Society. The British Airways Assisting Nature Conservation scheme provided transportation for the Chinese ornithologist Ma Ming and the Fort Wayne Zoological Society made funds available to cover visa expenses of a number of the former Soviet Union participants. Many others contributed in various ways to the success of the conference and are kindly acknowledged for their valuable support.

Two-thirds of the participants work with this species in former Soviet Union states and many of the 25 talks given during the meeting emphasized status, distribution and biology of the Black Stork *Ciconia nigra* within its breeding range (the most extensive of any stork). Migration and dispersal, study methods, management techniques and conservation issues were also lecture topics. Numerous poster presentations were given, and some of the speakers unfortunately not able to attend because of visa acquisition problems were still able to present their information using this medium.

Evening activities included a number of excellent slide and video presentations of Black Storks at study sites of various participants as well as other nature related presentations.

The last conference day participants divided into four working groups: biology/research, migration, conservation and eastern populations. Conclusions reached by the working groups were presented to and discussed with all participants during the final formal conference hours, and reports for each group made by the appointed working group leader.

These reports as well as oral and poster presentations will be included in a conference proceedings to be edited by Koen Brouwer, Catherine King and Maris Strazds. The proceedings will be in English with Russian summaries, while conference lectures and posters were in either English or Russian with lectures simultaneously translated.

Conference participants strongly felt that standardization of study techniques and terminology would greatly facilitate research efforts for this species. Consequently it was agreed that a manual would be produced including contributions by various volunteer participants. Funding for manual production has not yet been secured.

Most of the conference participants participated in a Black Stork (and other bird) census in the study site of Maris Strazds on the morning following the conference. This provided an opportunity to become acquainted with Latvian wildlife as well as to see Latvian Black Stork habitat (Latvia has the densest Black Stork breeding population of any country). The results of this collective census will also be included in the proceedings.

The conference provided an excellent opportunity for Black Stork researchers to meet, for many of the participants for the first time. A second symposium emphasizing migration and wintering issues to be held in Spain in 1995 was proposed by Spanish attendants, and was enthusiastically endorsed by participants.

-- Catherine E. King and Koen Brouwer

Black Stork T-shirts

T-shirts with a beautiful print of a Black Stork foraging in a pool can be ordered from Koen Brouwer (c/o EEP Executive Office, c/o Amsterdam Zoo, 1000 HD Amsterdam, The Netherlands). The T-shirts are available in medium, large and extra-large and can be obtained for US \$ 20-, or Dutch Fl.35-, including mailing. Payments can be made by check (USA only), Eurocheque (Europe only) or international money order. All profits made through sales of these limited edition T-shirts will be donated to "Project Black Stork" of the Latvian Fund for Nature in Latvia.

POPULATION MONITORING OF WHITE AND BLACK STORKS IN THE UKRAINE

Until recently censuses of European White Storks *Ciconia ciconia* and Black Storks *C. nigra* have been carried out every few years. These sporadic censuses do not accurately reflect the species status

because they include other natural variation. Unfortunately, it is impossible to carry out a complete census each year because of the vast territory in the Ukraine, the large numbers of storks, and the few amateur and professional ornithologists. In order to deal with this, we have decided to sample the number of storks and their breeding success each year in permanent sample plots throughout the Ukraine. These plots range from 10's to 100's of km². The information from these plots will represent the situation throughout the Ukraine.

The data collected each year will be included in an annual report which will be sent to all participants in the program and to others particularly interested in these species.

In 1992, we initiated this program with a small network. We are now expanding the network of observers. The program is off to a promising start. We will appreciate input, both financial and scientific, from foreign organizations and scientists to this important project. Please contact: Dr. V. N. Grishchenko, Laboratory of Ecological Monitoring, Kanev Nature Reserve, 258300, Kanev, The Ukraine.

-- Vitaliy Grishchenko

Laboratory of Ecological Monitoring, Biological Faculty, Kiev University, Vladimirska Strasse 64, The Ukraine 252601

WHITE STORK SATELLITE-TRACKING IN EUROPE AND AFRICA: A PROGRESS REPORT

The European White Stork *Ciconia ciconia* is one of the endangered species in Europe. The western populations of this species, which migrate over the Iberian peninsula to western Africa, have decreased in number to about 40,000 individuals. The eastern populations, which migrate around the eastern Mediterranean toward southern Africa have declined less dramatically. These populations have been estimated at 400,000 individuals. The western birds declined by about 20% from 1974 to 1984, while the eastern birds declined by about 12% during the same period (Rheinwald *et al.* 1989).

White Stork survival depends considerably on environmental conditions along their migration routes. Therefore, conservation measures have been developed within the framework of the *Bonn Convention for the Conservation of Migratory Species* (Nowak and Berthold 1987). In order to plan conservation measures adequately, and to better judge their success, a program to track White Storks with satellites was recently initiated. The goal of this project was to better understand the migration of the storks and the potential problems that could arise during the migratory journey. The topics are being investigated: (1) the detailed spatial and temporal routes of migration as well as individual variation with respect to speed, migration bouts and stop-over areas, (2) the ecological characteristics of the resting areas, and (3) a charac-

terization of natural and anthropogenic factors effecting migration. To examine these topics, it is necessary to compare ground observations with satellite data.

Originally, a pilot study was planned to begin with the German *D-2 mission* in 1985 using a small research satellite TUB SAT 1 (Nowak and Berthold 1987, Berthold and Nowak 1990). For several reasons, primarily the delay of the mission until 1993, this project was not initiated. However, the development of several commercial minitransmitters that can be used with the ARGOS satellite-system allowed us to begin White Stork tracking studies in 1991 and 1992 in eastern Germany. In the first year, six juvenile birds were tagged with Japanese NAVISAT T 2028 transmitters, constructed by Toyocom, in the second year 11 juveniles had American PTT 100 transmitters developed by Microwave Telemetry. As is common in all telemetry studies, some transmitters did not work at all, the others had varying life spans (Table 1, page 5). Nonetheless, a data base was initiated. The main findings of our preliminary studies can be summarized as follows.

The normal course of migration, the migratory route, is amazingly straight and essentially free from diversions. Individual bouts of migration increased with the migratory season to a mean maximum of about 300

km per day near Africa. The temporal course of migration showed considerable individual variation, especially with respect to stop-over duration. Some variation in migratory routes did occur when storks tried to avoid mountain crests in search of appropriate passes. Some individuals appeared even to have difficulties in successfully crossing mountains like the Carpathians. Some interrupted their routes shortly before the mountain crossing, and roamed around in the mountains. On individual terminated migration there and fell victim to winter. Farmers in southern Poland reported that they occasionally found weak storks that were unable to cross the Carpathian Mountains. Outside these geographical obstacles, some other individuals seemed to have simply lost their way. One bird from the western population migrated to Belgium and started to cross the North Sea in a northwesterly direction. It then turned back and flew back to central Germany where it was trapped. The proportion of juvenile storks that die during migration appears to be high -- it was 4 out of 11 in our studies. In our opinion survival and migration problems of the White Stork are directly related to human agricultural practice which alter the ecological basis of the stork migration faster than populations are able to cope with despite mixed genetically- and culturally-dependent routes. Most of the problems treated will be examined in more detail in the near future. It is planned to integrate this work with joint satellite-tracking and ecological research programs on White Storks by scientists in Israel.

Table 1. Details of transmitter operations, and tracked distance and final locations of storks fitted with radio transmitters used in the study of migrating White Storks in Europe.

Year	Transmitter Number	Switching on:off (hours)	Functional period	Number of days with locations	Number of locations	Tracked distance (km)	Final location (Coordinates, country)
1991	14554	12:36	23.8 - 28.9	15	24	1734	41.51N-27.30E Turkey
1991	14555	12:36	23.8 - 8.10	11	12	640	49.41N-19.29E Poland
1991	14556 ¹	12:36	---	--	--	--	---
1991	14557	12:36	23.8 - 16.9	13	42	4704	22.29N-32.21E Egypt
1991	14558 ¹	12:36	---	--	--	--	---
1991	14559	12:36	23.8 - 6.9	7	13	1394	43.19N-00.19W France
1992	14542	12:12	22.8 - 26.9	27	48	5745	14.57N-24.12E Sudan
1992	14544 ¹	12:12	26.8 - 13.9	8	9	--	---
1992	14545 ¹	8:16	22.8 - 6.9	9	11	--	---
1992	14546 ¹	8:40	14.4 - 1.10	--	--	--	---
1992	14547 ¹	8:16	---	--	--	--	---
1992	14548	12:12	23.8 - 13.10	33	77	1951 ²	37.37N-26.18E Greece
1992	14549	12:12	22.8 - 21.11	40	89	391 ²	50.27N-17.04E Poland
1992	14550	8:40	23.8 - 1.12	50	100	7040 ²	02.58N-33.45E Uganda
1992	14551	12:12	---	--	--	-- ^{2,3}	---
1992	14552	8:40	5.9 - 25.9	11	18	1292 ²	45.01N-03.06E France
1992	14553	8:40	4.9 - 18.9	7	18	1099 ³	50.46N-07.03E Germany

¹Transmitter or battery failure likely.

²Bird died.

³Bird trapped or recovered, transmitter removed.

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-- P. Berthold, E. Nowak and U. Querner, Max-Planck-Institut fuer Verhaltensphysiologie, Vogelwarte Radolfzell, and Bundesforschungsanstalt fuer Naturschutz, Bonn. Correspondence: Vogelwarte Radolfzell, Schloss Moeggingen, D-78315 Radolfzell, Germany

JABIRU STORK AND WADING BIRD STRONGHOLD DISCOVERED IN NICARAGUA

In March of 1992, preliminary wading bird surveys were undertaken as part of a resource assessment of the newly created Miskito Coast Protected Area on the Atlantic coast of northeastern Nicaragua. The protected area contains large tracts of freshwater wetlands, mangrove forests, and estuarine lagoons, and is poorly known ornithologically. The aerial survey carried out by Charlie Luthin of Caribbean Conservation Corporation, and Peter Frederick and Marilyn Spalding of the University of Florida, showed the area to be one of the few strongholds of the Jabiru Stork *Jabiru mycteria* north of Venezuela. During the 12.5 hours of flying time donated by Lighthawk, 74 individual Jabiru Storks and 6 active Jabiru nests were identified, as well as an active breeding colony of Wood Storks *Mycteria americana* and Roseate Spoonbills *Ajaia ajaja*. It was estimated that there are 0.16 Jabirus per km², and 12.2 ciconiform birds of all species per km². These density estimates are quite high by comparison with other neotropical and subtropical wetlands, including the Everglades of Florida. The surveys are part of longer-term project to enhance the conservation and sustainable development of coastal habitats in the protected areas by the Caribbean Conservation Corporation and IRENA (The Nicaraguan Natural Resources Sinistry), with local support from MIKUPIA (The Miskito Indian Natural Resources NGO), and funding from the United States Agency for International Development, the Art and Liz Claiborne Foundation, and Lighthawk. Further surveys and research are planned in the area to better elucidate habitat relationships and migratory patterns of the

wading birds, and to search for the large migratory populations of ducks and shorebirds rumored to also use the area.

-- Peter Frederick

ESTUARINE CROCODILE CATCHES A LESSER ADJUTANT STORK

Bhitarkanika Wildlife Sanctuary (10° 04' to 20° 08' N and 86° 45' to 87° 50' E) is situated on the east coast of India. It is one of the few remaining strongholds of the endangered estuarine crocodile *Crocodilus porosus*. The sanctuary encompasses an area of 175 km² out of which 115 km² are dominated by mangrove. The rest of the area is wetland.

The present encounter of predation on Lesser Adjutant Stork *Leptoptilos javanicus* by an estuarine crocodile was observed in February 1993 during a six-month filed study on the water monitor lizard *Varanus salvator*. An adult Lesser Adjutant Stork was walking on the mudflats of Bhitarkanika River during low tide. Suddenly a 3-4 meter crocodile emerged from the water and grasped one leg of the stork. The stork escaped from the grip of the crocodile and flew up. As soon as it tried to perch on a branch overhanging the river it fell down and the crocodile caught it.

Lesser Adjutant Storks were seen nesting in the sanctuary during February. Three nests were located on the top branches of *Avicennia officinalis* trees on the Bhitarkanika Island of the sanctuary. Seven juvenile Lesser Adjutants were frequently seen foraging in a grassland near a tidal creek. The juveniles were distinguished from the adults by the silver color of their legs. I estimate that there may be around 20 Lesser Adjutants in the sanctuary.

-- Vivash Pandav.
Wildlife Institute of India

NEW BREEDING SITE FOR GLOSSY IBIS *PLEGADIS FALCINELLUS* IN INDIA

The Glossy Ibis *Plegadis falcinellus* is partly resident and partly nomadic in India according to Ali and Ripley (1983: Handbook of the Birds of India and Pakistan). It has been reported breeding in Sind, Uttar Pradesh, Orissa, Assam and Manipur. Most records are old with few details and do not include exact locations or numbers. The species has been reported wintering in both small and large numbers in the Kutch in winter (September - April). In this paper I describe here the breeding record of Glossy Ibis in Luna, Kutch (Gujarat).

On 30 September, 1992, at Luna Village at the edge of the Great Rann of the Kutch, I encountered a large heronry with between 3500 and 4000 nests of eight species, including the Glossy Ibis. I returned on 30 October to make additional observations.

Luna Village is located at the western- and northernmost limits of the Banni Grand. From this village, a vast expanse of saltflats begins. Tidal water reaches the village during heavy monsoons. Like many other low-lying villages in the Banni Grassland, Luna is vacated during heavy rains. Such hamlets in the Banni are locally known as "Jheel Villages".

The breeding of the waterbirds was in full swing in the colony nearby. The birds nested in trees of mesquite *Prosopis chilensis* and Desi Babool *Acacia nilotica*. The water depth beneath the nests varied from 0.5 to 2.5 m. The Glossy Ibis nests were small for the size of the birds and similar in size to the nests of House Crows *Corvus splendens*. At most there were four to five nests per tree. The nearest neighbors were usually Cattle Egrets *Bubulcus ibis* or Night Herons *Nycticorax nycticorax*.

Table 1. Estimated numbers of nests and young waterbirds nesting at the Luna waterbird colony in Kutch, Gujarat.

Species	Estimated numbers of nests	Estimated numbers of young
Cattle Egret (<i>Bubulcus ibis</i>)	3,000	5,500
Little Egret (<i>Egretta garzeta</i>)	50	90
Intermediate Egret (<i>Egretta intermedia</i>)	35	75
Night Heron (<i>Nycticorax nycticorax</i>)	50	100
White Ibis (<i>Threskiornis melanocephala</i>)	40	100
Glossy Ibis (<i>Plegadis falcinellus</i>)	250	500
Eurasian White Spoonbill (<i>Platalea leucorodia</i>)	5	10
Little Cormorant (<i>Halietor niger</i>)	220	500

The nestlings at one- to three-weeks old are dark brown. The bill is pinkish rose with two black bands, one broad in the middle and one on the tip. Brood size varied from one to three. Snails, fish and frogs were abundant in the Luna Jheel. Glossy Ibis fed snails to their young. The parents would jerk their heads and necks to regurgitate the food that the young would eat greedily while begging. Many of the young were nearly ready to fledge in September. From the sizes of the young, I estimated that nest-building and incubation had begun in July.

Many nestlings of the waterbirds died, either by becoming entangled in the vegetation or impaled in the formidable thorns of mesquite, or by falling into the water and drowning. Pale Harrier *Circus macrourus*, Marsh Harrier *Circus aeruginosus* and House Crow were observed preying on nestlings in the colony, including young Glossy Ibises.

The Luna heronry is reputed to be about 50 years old. The Luna villagers call the Glossy Ibis in their language (Sindi-Kutch) "Kala Kanera". The villagers provide strict protection for the heronry. They say that a few years ago a pastoral community in a neighboring village used to take young for food, but that this has been stopped. They say that in good years the ibises breed regularly at the colony with the other species.

-- J.K. Tiwari
Grassland Ecology Project
Bombay Natural History Society

STATUS OF STORKS, IBISES AND SPOONBILLS IN NEPAL

When people think of Nepal, they usually think of snow clad peaks of the mighty Himalayas. Most people have the impression that Nepal is wholly a mountainous country with steep and rugged hilly terrain. But Nepal encompasses a wide variety of landscapes and habitats. In the south lies the Ganges Plain that includes the tropical Sal forest of hardwood timber and extensive areas of farmland. As one travels north, one encounters the outermost foothills of the Himalayas, the Siwalik Range. Parallel and to the north are the mountains of the Mahabharat Lekh, with valleys between the two ranges. The Chitwan and Dang Valleys are broad valleys between these two mountain ranges. These valleys and the Ganges plain contain the most important wetland habitat for storks, ibises and spoonbills in Nepal.

North of the Mahabharat Lekh, one encounters the midlands rising as high as 3,000 m above sea level with luxuriant subtropical and temperate forests. The midlands give way to the Himalayas, including Mount Everest at 8848 m. The vegetation includes alpine forests, pasture land and lichen-plastered bare rock. Behind the great Himalayas, within their rain shadow, lies the Tethys Himalayan zone with Tibetan flora and fauna.

Nepal is the meeting place of two zoogeographic regions. To the south lies the Oriental realm and to the North lies the Palaearctic realm. Numerous mountain streams, lesser lakes, glaciated and riverine valleys are found where they come together. Here, one can expect to find birds of the Oriental region as well as birds of the Palaearctic region.

The variety of large waders found in Nepal is exceptional for a small country. Eight species of storks, three ibises and one spoonbill have been recorded in

Nepal. The species are listed below alphabetically according to scientific name within family.

Storks: Ciconiidae

Asian Openbill Stork *Anastomus oscitans*. Resident. This is the most abundant stork in Nepal. It is a summer breeder in Nepal. From July through early October, including the breeding season, the resident population is augmented by additional birds from the Indian plains. After breeding, some birds remain in Nepal throughout the year, others return to India. It prefers wet fields and rivers for foraging. A healthy population still thrives in the country. Estimated resident population: more than 500 (number counted during surveys: 373).

Oriental White Stork *Ciconia boyciana*. Scarce passage migrant. There have been ten sightings of single birds. A maximum of 50 white storks was seen flying east of Dharan in eastern Nepal on 6 November 1989 by Jacobsen and Nielsen. The most recent record is of two Oriental White Storks in the Koshi Tappu Wildlife Reserve on 24 May, 1993. Estimated population: ? (number counted during surveys: none).

Woollynecked Stork *Ciconia episcopus*. Resident. It is widely distributed throughout the lowlands of Nepal, although it has been reported at 3,000 m. It breeds from June to September. It is never found in large numbers and prefers dryer habitats than the other storks. It is primarily found in the same habitat as the Oriental Black Ibis. Estimated population: 50 (number counted during surveys: 37).

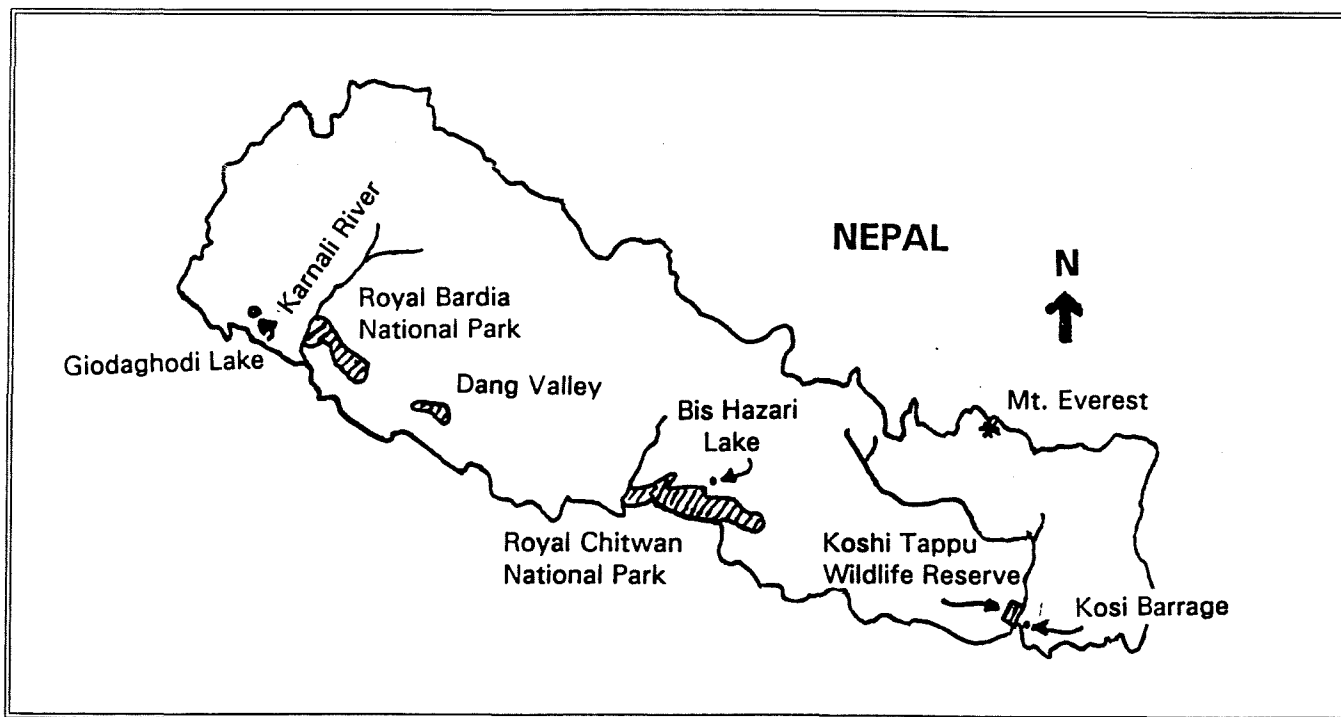
Black Stork *Ciconia nigra*. Winter migrant to lowland Nepal. Black Storks arrive in Nepal in mid-October and some individuals may stay as late as the first week in May. It is found regularly in good

numbers during the winter. Kosi, Chitwan, Bardia and Suklaphanta are the main wintering areas. A large roost of 55 storks was located in Lami Tal, Chitwan in November 1988. Single records are reported from unprotected areas elsewhere in Nepal. The numbers have declined in recent years. The reason for this decline is unclear. Estimated wintering population: 100 (number counted during surveys: 71).

Blacknecked Stork *Ephippiorhynchus asiaticus*. Rare resident and winter migrant. It is found singly or in pairs. A magnificent stork of lowland Tarai, it is recorded only from protected areas. It is found in both wet and dry habitats that it shares with other storks. It is very sensitive to disturbance. It is the most endangered of the storks regularly found in Nepal. These storks have been recorded breeding at Kosi in eastern Nepal. Estimated population: 14 (number counted during surveys: 10 [all in protected areas]).

Lesser Adjutant Stork *Leptoptilos javanicus*. Resident. The largest concentrations of birds occur in eastern Nepal, including the Kosi River marshes. The species is still fairly common, but with increasing wetland deterioration and continuing hunting of the bird for meat, its survival is threatened. They prefer the wetter habitats that are used by the Openbill Storks more than the dryer habitats of the Woollynecked Stork. Lesser Adjutants breed from mid-September to February. They nest in large colonies close to rivers and other water bodies. Thirteen pairs bred in the Royal Chitwan National Park in 1989. Estimated population: less than 100 (numbers counted during surveys: 72).

Greater Adjutant Stork *Leptoptilos dubius*. Summer migrant, primarily in the lowlands of eastern Nepal. The numbers of storks vary with the monsoon rains and the availability of food. There are records of



single lone birds spending the winter at Chitwan. Estimated population: less than 5 (numbers counted during surveys: none).

Painted Stork *Mycteria leucocephala*. Primarily a summer visitor, although few birds may be seen throughout the year. The numbers fluctuate from year to year. It is primarily found in the lowlands. It is a rare resident of southwest Tarai, and primarily a summer visitor to the Kosi barrage area of eastern Nepal. The largest numbers have been recorded at Gaidhawa Tal in southwest Nepal. There are only rare records of the species elsewhere in the country. Breeding in Nepal has yet to be confirmed. Estimated population: less than 100 (number counted during surveys: 72).

Ibises and spoonbills: Threskiornithidae

Glossy Ibis *Plegadis falcinellus* is a rare vagrant or passing migrant. Small numbers (up to 4) have been observed along the Kosi River and one was seen at the Royal Chitwan National Park. Estimated population: ? (number counted during surveys: none).

Oriental Black Ibis *Pseudibis papillosa*. Resident breeder. This ibis is a fairly common resident throughout lowland Nepal. Large congregations have been noted along the Karnali River in the Southwest, at Bis Hazari Lake in the Royal Bardia National Park, and in the Royal Chitwan National Park. It begins breeding in February. Both parents share equally incubation, and rearing the young. It frequents dryer habitats than those used by Oriental White Ibises. Estimated population: over 400 (number counted during surveys: 281).

Oriental White Ibis *Threskiornis melanocephalus*. Resident in southeastern Nepal. It is a resident and fairly common summer visitor to eastern Nepal (primarily in Tarai). There are single records from elsewhere. The population is increased during the summer by birds from India. This ibis has not been recorded west of the Lumbini zone. Large flocks have been observed resting with Eurasian White Spoonbills on sand bars in the Kosi River in eastern Nepal. It prefers wetter habitats than the Oriental Black Ibis. It is fairly common at Kosi and in eastern Nepal; rare elsewhere. There has been a dramatic decrease in the population in central and west Nepal. Estimated population: 200 (number counted during surveys: 131).

Eurasian White Spoonbill *Platalea leucorodia*. Primarily winter visitor, although a small population is resident. Large congregations have been reported along the Kosi River (maximum count 111 [December 1991 - January 1992]). It is rare elsewhere. Single birds have been recorded throughout the year at Rani Tal, west Nepal. It shares the same foraging habitat with the Oriental White Ibis. Estimated population: 120 (number counted during surveys: 113).

Conservation: efforts and needs

Nepal has a large system of protected areas that include almost every type of biotype found in the country. However, forests and wetland habitats are not well represented among the protected areas and much of these habitats remains unprotected. The Kosi barrage in the East is by far the most important foraging area for a large variety of waterbirds staging, wintering or summering in the country. Lumbini in Rupandehi District and Bis Hazari Lake at Chitwan are other important sites that have not yet been included among the protected areas. Finally, Ghodaghodi Lake in western Nepal is unique among the lakes. It will be important to protect these areas not only for storks, ibises and spoonbills, but for the many species of waterbirds and other wetland species that use them.

Among the protected wetlands, it will be important to ensure that disturbance is minimized and that these areas are managed for the waders and other aquatic species.

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-- Hem Sagar Baral
Nepal Bird Watching Club

BLACK-FACED SPOONBILLS IN THE NORTH OF VIET NAM 1992-1993

We investigated the migratory waterbirds in coastal northern Viet nam from August 1992 through April 1993 with support from the Asian Wetland Bureau. The Black-faced Spoonbill *Platalea minor* is a species of considerable concern because it is globally endangered. We counted Black-faced Spoonbills in three river deltas: the Red River, Day River and Van Uc River.

1. The Red River Estuary. This is part of the larger Xuan Thuy Ramsar area in the Xuan Thuy District, Nam Ha Province. It was the first Ramsar site in Viet nam and the first in Indochina. The delta is located about 130 km southeast of Ha Noi.

More than sixty Black-faced Spoonbills were observed in April, 1987. There were no censuses in 1988 through 1991. Censuses were conducted from August, 1992, to April, 1993:

4 November, 1992	24 birds
10 January, 1993	68 birds
20 March, 1993	2 birds
23 April, 1993	3 birds

2. **Day River Estuary.** This wetland is in Nghia Hung District, Nam Ha Province, about 30 km south of the Xuan Thuy Ramsar Site. Spoonbills were counted on the following dates:

21 March, 1993	2 birds
9 April, 1993	27 birds

3. **Van Uc River Estuary.** This is in Hai Phong City limits, Tien Lang District, and is located about 140 km east of Ha Noi. The estuary is heavily used by migratory birds. On 19 February, 1993, we counted 2013 birds of 17 species. No spoonbills have been recorded in the area.

The Red River Estuary in the Xuan Thuy Ramsar site is the most important feeding area for Black-faced Spoonbills. It will continue to be an important protected area for the species.

-- Le Dien Duc, Le Dinh Thuy, and Hoang Van Thang
Waterbird and Wetland Working Group of Vietnam

SPONBILLS IN YANCHENG, JIANGSU PROVINCE, CHINA

Two species of spoonbill visit the Yancheng Biosphere Reserve in Jiangsu Province, People's Republic of China. The Eurasian White Spoonbill *Platalea leucorodia* is common along the Yancheng coast. It is also seen occasionally in the ponds and tidal mudflats during migration and in winter. The Black-faced Spoonbill *P. minor* which is globally endangered, is less common. More than 47 birds were observed migrating along the Yancheng coast. Fewer than ten birds wintered in the area over the last two years. During the winter of 1992/93, five Black-faced Spoonbills and two Eurasian White Spoonbills wintered at Yancheng.

The spreading of poisoned food baits to catch waterfowl caused many ducks and cranes to die. In December, 1992, one Eurasian White Spoonbill was found dead from this poisoning.

More information is available from the author.

-- Wang Hui, Yancheng Nature Reserve,
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People's Republic of China

MILKY STORK BANDING AT PULAU RAMBUT, WEST JAVA, INDONESIA

The endangered Milky stork *Mycteria cinerea* is restricted to Indonesia, Malaysia and Indochina; the population has drastically fallen in the last few decades and is presently estimated to be 5000 birds (Silvius, 1986).

The Asia Wetland Bureau (AWB) and Directorate General of Forest Protection and Nature Conservation (PHPA) are currently undertaking a survey and monitoring programme for this species. This project is part of the PHPA-AWB Integrated Waterbird Hunting Conservation Programme (IWHCP). The aim of the IWHCP is to study bird trade activity along the northern coast of West Java. Ninety Milky storks were caught in this area by local hunters for consumption during October and November 1990 (Johnson, 1991). No storks were reportedly caught during the period of November 1991-February 1992; this decline is attributed to AWB-PHPA awareness programme and PHPA law enforcement activities (Sibuea, 1992)

According to existing information, Javan feeding areas for this species are found between Jakarta to the west and Indramayu/Cirebon to the east. The only known Milky stork breeding site for Java is the Pulau Rambut Nature reserve, a small island lying north-west of Jakarta. It is assumed that resident West Javan Milky storks breed on this island, although it is also possible that some breeding birds come from Sumatra (Allport and Wilson, 1986). A banding project to gain more information on the distribution and movements of Milky storks along the northern coast of West Java was therefore proposed. It was decided to band nestlings not yet able to fly at the Pulau Rambut breeding colony. Plastic bands were obtained from BirdLife-Netherlands and metal bands from Zoo Negara in Kuala Lumpur, Malaysia.

Results

A nest survey was carried out on 2 June 1992; 2-3 young in 17 nests, totaling 45 birds, were found.

A mangrove tree (*Rhizophora* sp.) with three Milky storks nests, each guarded by an adult, was ascended by one banding team member at ca. 15:30 the same day. The tree also contained nests of Black-crowned night herons *Nycticorax nycticorax*, cormorants *Phalacrocorax* sp. and Little egrets *Egretta garzetta*. One nest, somewhat apart from the other two and situated in the highest strata of the outer canopy was chosen for the first ringing operation to minimize disturbance to the other nests.

One of three young in complete juvenile plumage was captured and lowered to the ground for banding and morphometric measurements. Measurements were: wing length 160mm, bill length 180mm, bill depth 44.8mm, tarsus length 220mm, and weight 2.6kg. Following handling the bird was immediately returned to its nest; the entire handling procedure took about 13 minutes.

The behavior of the birds was then monitored from a natural blind 25 m from the nest. The adult guarding the nest had flown off when the nest was approached, and the other two chicks had fled to other branches in the same tree. The adult returned to tree, perching on a branch ca. 1.5m from the nest, at 15:50. The banded bird had remained standing

motionless following its return to the nest and did not respond to the adult's arrival. The other two juveniles then returned to the nest. Another adult perched on a branch some distance from the nest at 16:02. The banded young sat down at 16:05, and the juveniles were quiet, engaging only in "watching" behavior.

All three juveniles began begging for food at 16:30. The adult suddenly attacked the young by stabbing with its bill. The banded juvenile remained in the nest, while one of the others fled the nest and the third fell from the tree. The fallen bird was replaced in the nest by a team member, and bleeding on the forehead and nape of the banded bird was observed. The juveniles thereafter remained on the nest; the adults had not returned to the nest by 18:00, when observation ceased.

The nest was observed between 7:00 and 14:00 the following day (3 June). One or both adults guarded the nest throughout this period, however the juveniles did not beg and were not fed. The banded juvenile was less active than its siblings. One month later a PHPA guard confirmed that all three juveniles were still alive and able to fly.

Conclusion and Future Plans

Banding was discontinued following the first experience due to the possibility that it could provoke attacks on the young by adults. We felt that risk to the juveniles (outright death or starvation) outweighed the research value of the project.

The reason underlying the parental attack on its chick remains a mystery. It is unclear whether nest disturbance or handling and banding of the chick provoked the attack. T.M.N. Yaacob (pers. comm.) reported that captive young Milky storks bred in an aviary at Zoo Negara are routinely banded without evoking aggression; however operations there take place after the young have left the nest.

There are plans to continue banding in 1993 at the breeding colony and possibly also at feeding sites. The authors welcome information and comments that would assist in planning and evaluating future Milky stork banding activities.

Acknowledgements

The authors are grateful to Arie Spaans (ICBP Netherland) and Mohd. Tunku Nazim Yacoob (Zoo Negara - Malaysia) for their support in providing bands. Deni Herdimansyah, Pak Masduki and sons, and Pak Laksa provide helpful assistance during the field work. Useful comments have been given by Marcel J. Silvius, Taej Mundkur, Scott Frazier, Bas van Helvoort and Paul Jepson.

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FEEDING AREAS OF SPOONBILLS *PLATALEA LEUCORODIA* IN NORTH HOLLAND (THE NETHERLANDS):

Present situation, problems and improvement

The small, isolated breeding population of Eurasian White Spoonbills *Platalea leucorodia* in the Netherlands (400 breeding pairs) is coming under increasing pressure. A significant proportion of the Dutch Spoonbill population relies on polder ditches in the province of North Holland as feeding habitat in the breeding season. Within the framework of a conservation plan for this species, a survey characterizing 30 inland foraging areas that are regularly visited by spoonbills was completed. A report summarizing the findings per site includes descriptions of the following site characteristics: administration, physical planning policy, land use, water management, land consolidation, conservation status, importance for spoonbills, problems and suggestions for improvement. Feeding conditions have deteriorated due to land consolidation, water pollution and changes in land use. As the density of feeding birds in these polders is very low (at most 12/1000 ha), general measures are necessary: i.e. improvement of water quality, adjustment of water level, creation of gently sloping ditch banks and maintenance of present land use and water tables. In some polders specific measures are suggested to develop or restore conditions for prey species and spoonbill foraging.

Summary of: Jonker, J. 1992. Voedselgebieden van de Lepelaar *Platalea leucorodia* in Noord-Holland: actuele situatie, knelpunten en verbeteringen. Techn. Rapport Vogelbescherming 8. Pp. 112. [in Dutch].

[This report can ordered from Vogelbescherming for Dfl. 31,-. Please transfer money to postal giro account 75775 c/o Vogelbescherming, Zeist, the Netherlands. Eurocheques and international money orders are also accepted as payment. Include the name of the report and send a separate letter to Vogelbescherming (Driebergseweg 16-C, 3708 JB Ziest) indicating your interest in ordering the report]

STATUS OF STORKS, IBISES AND SPOONBILLS IN THE MATABELELAND AREA OF ZIMBABWE

Matabeleland is the low rainfall, western half of Zimbabwe. The Zambezi and the Limpopo Rivers form the north and south boundaries at an altitude of around 300 m. The highest, on the plateau between Plumtree and Gweru, reach 1450 m. The northern portion and the plateau usually have a rainfall of around 600-1000 mm. The south is generally drier, with only around 400-600 mm, but there is great variation both within and between seasons. There is some suggestion that approximately alternate decades are wetter than the intervening ones, i.e. the fifties and the seventies had more above average rainfall years than the sixties and eighties. Some 15,000 sq km in the north have been set aside as Hwange National Park (Hustler 1986). The original waterbird habitats were rivers, mostly flowing into the Zambezi or Limpopo, from off the plateau. Only the Nata flows west into Botswana. There is a suggestion that the concentration of people and their livestock after 1900 into what are now called Communal Lands has resulted in increased erosion and hence increased siltation of the rivers, causing them to become more temporary. There were a number of pans in the northwest; many of which have been made more permanent to serve wildlife in the dry season.

Since 1900, and particularly after 1945, a large number of impoundments (now totaling around 10,000 in Zimbabwe as a whole) have been constructed for stock and recreational purposes. Impoundments are particularly common on the plateau; with 25 impoundments in the area, the Matopos/Figtree area has an exceptionally high concentration. The most important waterbird site in Matabeleland is Aisleby Sewage Farm, just north of Bulawayo, which has operated since the fifties.

My own studies have been conducted in the Matopos in the seventies and on the Umzingwane River above West Nicholson in the eighties. Data have been collected at Aisleby since 1962; I have recently submitted a paper to Ostrich summarizing the results. Below I have attempted to synthesize all the data plus the literature on the storks, ibises and spoonbills of Matabeleland (Irwin 1981). Historical data are supplied by Chubb (1909) and Mouritz (1915). Irwin (1981) gives a gazetteer with the coordinates of most, if not all, of the localities mentioned here.

Storks: Ciconiidae

European White Stork *Ciconia ciconia*. This bird can appear in any month, but is only regular in January and February, leaving in early March. It is

particularly common on the pastures of Bulawayo and Aisleby Farm, sometimes appearing by hundreds. It is less common in the surroundings area, being usually only observed on passage. In the Bulawayo newspaper the Chronicle (31 October 1985), Dr. P.J. Mundy, the Ornithologist with the Department of National Parks and Wildlife Management, reported that some 50,000-100,000 birds/year are observed in Zimbabwe. Reports of breeding (Priest 1934) are erroneous. Most recoveries are of birds ringed in the western Germany/Poland area (Irwin 1981).

Black Stork *Ciconia nigra*. The Black Stork breeds widely on the granite shield of Zimbabwe and indeed on virtually any cliff face. There may be between 15 and 20 pairs in the 1200 sq km of the Matopos and some 300-500 pairs in Zimbabwe (Lorber 1982). Flocks of between 10 and 30 birds have been seen in July-September outside the breeding areas. The group of 45 birds that I sighted on the Umzingwane was among the largest groups ever recorded in Southern Africa. These birds may have been on passage to South Africa. Most records are between April and December.

Abdim's Stork *Ciconia abdimii*. Status of the Abdim's Stork is similar to that of the White Stork, with which it often associates, though it occurs in larger numbers. Mouritz (1915) reported the opposite, stating that the decline of the Abdim's Stork parallels the recent decline of the White Stork in the European breeding areas) and is less frequently seen in winter. It is also primarily found in the Bulawayo fields and Aisleby Farm where it occurs sometimes in hundreds. It is usually only on passage in the surrounding area. Priest (1934) reported a ratio of 20 Abdim's Storks to every White Stork, which would still apply today. It does not breed in Zimbabwe.

Woolly-necked Stork *Ciconia episcopus*. This bird breeds in the southeast of Zimbabwe and not in Matabeleland. Birds apparently from a different population move from the north into the Hwange area, where up to 200 birds have been recorded (Irwin 1981). Single records for the Bulawayo and West Nicholson are the only records for the rest of Matabeleland.

African Openbill Stork *Anastomus lamelligerus*. The African Openbill Stork is most common on the Hwange pan system. The first records for the Matopos and Aisleby Farm are from the 1970's, but it remains vagrant outside of the northwest region. Breeding has been reported in two localities during one year. However, flocks including birds with unopened bills have been reported a number of times from Hwange National Park and may indicate more frequent breeding in this area, as, the bill-opening becomes visible at 4 months of age in *A. oscitans* (Bigham 1876).

Saddlebill Stork *Ephippiorhynchus senegalensis*. This species breeds regularly in Hwange National Park, where ten breeding sites are known (Hustler 1986). Elsewhere there are breeding records from Manama and Doddieburn in high rainfall years. It occurs widely but in low densities in Southern Africa, where the total population may not include more than a thousand birds in Southern Africa (Ewbank, in prep.). It is possible however that impoundment construction has increased the numbers of this stork.

Marabou Stork *Leptoptilos crumeniferus*. The Marabou has bred in Hwange National Park when elephant culling has taken place. In the pre-ranching days it may have been more widespread in Matabeleland but today it is most common in National Parks, and uncommon elsewhere.

Yellow-billed Stork *Mycteria ibis*. Though this stork it may occur at any time of year it is mainly a summer visitor. It occurs widely if erratically in Matabeleland, and breeding has not been recorded in Zimbabwe.

Ibises and spoonbills: Threskiornithidae

Sacred Ibis *Threskiornis aethiopica*. Aisleby is now a major staging area for Sacred Ibis on the way north from the Transvaal to tropical Africa in April. Over 500 birds have been reported there in the last 20 years, paralleling a recent increase in the Transvaal. Some birds are present every month on the pastures of Aisleby. This ibis bred at Aisleby on islands on a newly constructed impoundment in 1978 and 1979. This was the first breeding record for Zimbabwe. Elsewhere in Matabeleland the Sacred Ibis is usually a transient nomad.

Glossy Ibis *Plegadis falcinellus*. Aisleby, where up to 80 birds have been reported in summer, is the most important site in Matabeleland for the Glossy Ibis. It is a regular migrant to Hwange National Park (Hustler 1986) but it is unusual elsewhere, and has not been reported breeding in Zimbabwe.

Hadeda Ibis *Bostyrchia hagedash*. This bird is a resident breeder on the Zambezi and Limpopo rivers as far upstream as Kazangula and Tuli but does not move up the tributaries into Matabeleland. The origins of a birds seen recently in Bulawayo are uncertain (Tree 1989).

Hamerkop *Scopus umbretta*. This bird occurs wherever there is water whether this is in the form of rivers or pools; it even raids fish from suburban garden ponds. There is no data to assess whether it was present in pre-impoundment days in the Bulawayo/Matopos area. However it was present and breeding a few years later: a nest was reported at Hillside Dam by Chubb (1909) where I also saw nests in 1965 and 1984. It was resident on the Umzing-

wane River above West Nicholson with 2 pairs in 20 km. A total of two pairs were believed to be present in the Matopos area. Hamerkops in the Matopos probably feed in the smaller, more temporary waterbodies in the wet season before moving to the larger more permanent waters in the dry season. It appears more likely to breed in wet years. Its nest is often taken over by a variety of birds, in particular the Barn owl *Tyto alba*.

African Spoonbill *Platalea alba*. The African Spoonbill is most frequently seen at Aisleby Farm, where ten or more birds were often present during the 1980's. It bred at this locality in 1978. It was more common on the Umzingwane River than on the impoundments of the Matopos area. It is a regular migrant to Hwange National Park (Hustler 1986). I found it breeding at Beit Bridge in 1990.

Conclusions

Two species of storks, ibises and spoonbills are recent breeders in the area. Three more species apparently breed more regularly in Hwange National Park and occasionally in high rainfall years elsewhere. Aisleby is the most important site for most species. Most species appear to have increased with the construction of impoundments and only the Marabou Stork appears to have declined this century. Africans do not appear to predate these birds, especially not the Hamerkop, about which they are very superstitious.

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SADDLEBILL STORKS IN THE OKAVANGO, BOTSWANA

On 16 and 17 August, 1993, following the first all-Africa workshop on cranes in Botswana, we surveyed Saddlebill Storks and cranes in the Okavango Delta south of the dense papyrus zone. Participants were Seteng Motalaote (Botswana Wildlife Department), Bashir Barba (Nigeria Wildlife Department) and George Archibald (International Crane Foundation). We flew transects at 600 feet and 1.5 Km apart.

We counted 143 Saddlebill Storks and 384 cranes of various species. We felt that these numbers, while representative, did not include the total numbers and there may easily have been twice as many birds. The storks were usually solitary or in pairs, although one group of three and one group of four were spotted. Two storks were observed on nests. The cranes were in singles or pairs, scattered across the delta, with the exception of flocks of 5-70 along the Boro River Lowlands west of Chief's Island. We were amazed that although there were vast expanses of wetlands east of Chief's Island and south of the Khwai River, the region was devoid of storks and cranes, and there were noticeably fewer of the other aquatic birds, particularly ducks and egrets. In contrast, there were large populations of birds north-east of Chief's Island along the Khwai River, and in regions southeast of Chief's Island.

The Okavango Delta is clearly of major importance to the Saddlebill Storks and will continue to be as long as the integrity of the ecosystem is maintained.

-- George Archibald

INTERNATIONAL WHITE STORK SYMPOSIUM

A symposium on the conservation of the Western White Stork population will be held in Basel (Switzerland) on 7-10 April 1994. The aim of the symposium is to initiate and coordinate actions designed to reduce unnatural mortality and to improve breeding and feeding habitats of the White Stork throughout the range of the western population. For information, contact Dr. Olivier Biber, Swiss Institute of Ornithology, CH-6204 Sempach, Switzerland; Phone: 041 99 00 22, FAX: 041 99 40 07.

ICBP TAKES A NEW NAME:

BirdLife International

The International Council for Bird Conservation (ICBP) has taken on a new name: *BirdLife Inter-*

national. ICBP was the first international conservation organization, established in 1922 by the renowned ornithologist Jean DeLacour. At present, at least in Europe and North America where conservation has become popular, it is felt that in order to raise funds effectively, names of organizations must be short and easily recognized.

STORKS, IBISES AND SPOONBILLS OF THE WORLD

Recently published

Storks, Ibises and Spoonbills of the World. -- Hancock, J.A., J.A. Kushlan & M. P. Kahl. 1992. Academic Press, London. vi + 385 pp. 150 tables, 49 color plates, 40 color photographs, 49 maps. ISBN 0-12-322730-5, cloth \$139.00

We have long awaited this book that has been in preparation, pulling together the information that is available on SIS. All of the authors have made substantial contributions to research and conservation of these birds. M. P. Kahl has studied storks for more than 30 years, and J. A. Kushlan (authority on American White Ibises *Eudocimus albus*) and J. A. Hancock, authors of the *Heron Handbook*, have made substantial contributions to our knowledge of these wetland birds. The Brehm Foundation for the International Bird Conservation, which has supported SIS conservation in many parts of the world, contributed substantially to this book.

This is an important book. The known literature on these birds has been summarized. It is presented in species accounts for each species. This is an impressive and helpful summary of what is known about these birds.

The plates of each species provide good views of the birds with appropriate details for scientists. But they are more valuable and pleasing because each plate has its own artistic perspective. The plates were sponsored by the Brehm Foundation for International Bird Conservation in Germany. The Brehm Fund has been an important supporter of conservation of these birds for very many years.

The Conservation status of the birds in general and of each species in particular is emphasized. It is unfortunate that the high cost (\$139) of this fine book will make it unavailable to many people involved with conservation issues who could benefit from it.

For those who can afford it, the book will be a valuable source of information for anyone dealing with storks, ibises and spoonbills.

-- Malcolm Coulter

M. P. KAHL HAS GENEROUSLY DONATED HIS LIBRARY TO SIS

Dr. M. Phil Kahl who has studied almost all species of storks and spoonbills in the world during the last 30 years collected a vast library of articles and books on SIS. This year he donated over 1,000 of his articles and books dealing with storks, ibises and spoonbills to the Specialist Group. This generous gift includes many old and difficult-to-find references. We are extremely grateful for this gift.

-- Malcolm Coulter

SIS BIBLIOGRAPHY AND LIBRARY

Thanks to the many contributors, the SIS bibliography and library continue to grow. The bibliography is a computerized listing of all books and articles that deal with SIS; the library is a hard copy. Since the bibliography was printed a couple of years ago, we have added about 3,000 articles to the bibliography and 700 to the library. The bibliography now contains over 7,000 references and library contains over 2,500 references.

This is an important resource available for everyone. Bibliographies dealing with species, geographic region, etc., can be easily produced. Copies of articles that are rare and difficult to find or are otherwise needed can be sent as requested. There is no cost for this service, although we request a small donation from people in developed countries in order to cover the basic costs of the service and maintaining the library.

In order to keep this resource current, I hope that you will continue to send me articles and other references that you produce. This will be very important and I thank you very much for your cooperation.

-- Malcolm Coulter

NEW LITERATURE

A collection of articles on Black Storks has recently been published in the Ukraine:

Gristchenko, V.N., and I.V. Skilsky (eds.), The Black Stork in the Ukraine. Chernivtsi.

Afanasyev, V.T. 1992. [Black Stork in Sumy Polesye and in south of Bryansk Region]. Pp. 17.

Borzakivsky, D.M. 1992. [Black Stork nesting in Evankiv District of the Kiev Region]. Pp. 17-18.

Godovanets, B.I., I.V. Skilsky, and V.V. Buchko. 1992. [To the Black Stork distribution in the Carpathian Mountains and in the Ukrainian Carpathians]. Pp. 24-25.

Godovanets, B.I., I.V. Skilsky, I.I. Chornei, P.V. Bundzyak, O.M. Vasin, V.V. Buchko. 1992. [The finding of a Black Stork nest in the North Bukovina and the botanical and geographical description of its distribution]. Pp. 22-23.

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Knysh, N.P. 1992. [To the Black Stork distribution in the Sumy Region]. Pp. 19.

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Semenov, N.N. 1992. [Black Stork in nature reserve "Askania - Nova"]. Pp. 20-21.

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ADDITIONAL LITERATURE

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PETER SHANNON AND BIRDLIFE INTERNATIONAL
FOR PRINTING AND MAILING THIS NEWSLETTER**