

AMENDMENTS TO APPENDICES I AND II OF THE CONVENTION

A. PROPOSAL

Maintenance of the Zambian population Crocodylus niloticus subject to an annual export quota of 10,000 specimens.

B. PROPONENT

The Republic of Zambia.

C. SUPPORTING STATEMENT

1. Taxonomy

11. Class: Reptilia
12. Order: Crocodylia
13. Family: Crocodylidae
14. Species: Crocodylus niloticus Laurent, 1768
15. Common Names: English: Nile crocodile
French: Crocodile du Nil
Spanish: Cocodrilo del Nilo
16. Code Numbers:

2. Biological Data

21. Background: Zambia acceded to the Convention on International Trade in Endangered Species of Wild Fauna and Flora on 23 February 1982 with a reservation on the Nile crocodile (Crocodylus niloticus) and on the African Slender Snouted Crocodile (Crocodylus cataphractus).

This reservation was entered because, although the Nile crocodile was placed in Appendix I of the Convention, it was very common and abundant in Zambia, and in some areas, was regarded as a vermin because of its predatory habits on human life and livestock.

22. Distribution: The Nile crocodile occurs throughout Zambia in all rivers and lakes. It is most abundant in the following major rivers and lakes and their tributaries:

Rivers

Zambezi, Kafue, Luangwa, Luapula, Kabompo, Lunsenfwa, Chambeshi and Lunga.

Lakes

Tanganyika, Bangweulu, Mweru, Mweru-Wantipa, Kariba, Itezhi-tezhi and Lushiwashi.

The estimated length of Zambia's river system and lakes is 12,500 km. of shoreline.

23. **Population:** Populations of the Nile crocodile in Zambia have been reported to have been increasing since the early 1950s. Cott (1961) reported that the population of the Nile crocodile of Mweru-Wantipa was probably the highest in Africa. Munyenyembe attributed the damage to fishing gear and increase in the number of fishermen taken on the lake to the increase in the population of the Nile crocodile. Munyenyembe (1980) estimated a total population of 4,465 crocodiles in an effective area of 843 km² of lake Mweru-Wantipa.

José Tello (1984) estimated an average density of 12 crocodiles per river kilometre in the Luangwa river while Munyenyembe (1986) had a mean estimate of 15.61 crocodiles per river kilometre on the same river. Bower and Boddy (1981) estimated a population of 98 crocodiles on a stretch of 6 km on the Kafue River during night counts of crocodiles between their camp and the confluence of the Kafue and Zambezi rivers. This yielded a mean density of 16.33 crocodiles per river km.

The estimate by José Tello (1984), a consultant hired by the CITES Secretariat to estimate the number of crocodiles in East, Central and Southern Africa, yielded a total of 150,000 crocodiles for Zambia's major rivers. While the estimate by Munyenyembe with a mean density of 15.61 per km. yielded a total of 195,125 crocodiles for Zambia's major rivers, these estimates indicate that Zambia has a crocodile population of between 150,000 and 195,125.

Reports on nesting activity are those by Cott (1971) who reported a count of 6 nests in an area of 20 km² on lake Mweru-Wantipa with an average of 52 eggs per nest. Parker (1984) recorded an average of 49 eggs in twelve nests while collecting eggs for Kariba crocodile farm on the shores of the Zambezi and Kafue rivers, including lake Kariba. Bills (1985) reported an average of 51.25 in 13 nests while collecting for Circuits Safaris, on the shores of lakes Tanganyika and Mweru-Wantipa. Beukes (1985) had an average of 38.7 eggs in 64 nests and a second average of 38.5 eggs in 72 nests while collecting eggs for the Luangwa Crocodile Farm along the Luangwa, the Lunga and Kabompo rivers.

These figures yield an average nest size of 46 eggs for Zambia's crocodile population.

24. **Discussion:** Zambia's crocodile population is estimated at 150,000 crocodiles. An estimated 15% - 20% of this population would be mature females in the egg laying group. This yields a population of 25,500 and 30,000 egg laying females at the lower and upper limits respectively.

At the lower limit of 22,500 egg laying females, and at an average nest size of 46 eggs per nest, the number of eggs laid per year would be 1,035,000. Subtracting an estimated 15,000 eggs collected by farmers annually, a balance of 1,020,000 eggs would remain in the wild.

At a survival rate of 3%, a total of 30,600 young crocodiles are added to the population annually. With an annual offtake and export quota of 2,000, management stands the risk of the

population reaching epidemic levels and causing more problems for management in efforts to protect human life and property. The situation is made even worse by the fact that the quota of 2,000 has to cater for crocodile farms which have an estimated population of 23,706 crocodiles.

Zambia should therefore be allowed greater flexibility in the number of skins it can export annually. The ideal situation would be to allow Zambia to set her own quota annually, communicate this to the Secretariat which would in turn communicate this to all Parties.

This kind of arrangement would enable Zambia to properly exploit its crocodile population and earn the much needed foreign exchange, which will boost the conservation programmes of the species as well as improve the image of the species among the local people through creation of employment. It will also reduce the waste of the resource which may be taking place but which management may not be aware of.

25. Public attitude: Conservation of any renewable natural resource depends a great deal on public awareness and opinion of the need for conservation of such a resource.

In Zambia, the general feeling towards the conservation and proper management of the crocodile population is that of resentment and detesting. This has been mainly due to the predatory habits of the crocodile as exemplified by the attached annexes 1, 2, 3, and 4 which carry cuttings from the Times of Zambia on crocodiles killing and attacking people. This loss of life cannot be underplayed nor ignored if the crocodile is to continue inhabiting rivers and lakes near human settlement and villages, as the life of the people is paramount to the country's aspirations. With the growing human population, it is practically impossible to isolate crocodile populations from areas of human settlement.

The problem becomes more serious when the leadership becomes concerned and upset about the loss of life due to crocodiles, as this gradually erodes the much needed support for conservation for the species.

It is against this background, and against these odds that the department of National Parks and Wildlife Service has had to strive to change people's attitude to ensure the future of the species.

A major tool in changing of people's attitude towards a resource is to show the people the value of that resource in monetary terms. The crocodile has a high value on the international market, both as a live specimen or as skin. When the leadership and the public are convinced of this value and the potential a crocodile has to earn the much needed foreign exchange, then a greater part of the battle for conservation of the species would have already been won.

26. Habitat: The main habitat of the Nile crocodile has increased in the past two decades. This has been due to the impoundment of several river channels for dams and lakes to supply electricity,

the best examples being lakes Kariba, Itezhi-tezhi and Lushiwashi. This has resulted in the general upward trend of the Nile crocodile population of Zambia.

3. Trade Data

31. National Utilization:

- i) sport hunting by safari clients;
- ii) sport hunting by citizens and residents of Zambia;
- iii) commercial hunting by citizens under special licence; and
- iv) collection of eggs and breeding stock for crocodile farms.

Commercial hunting under a special licence has only gained significance in the last few years. It is this trade together with products from farms that have made an impact in indicating the value of the crocodile.

Annually since 1985, 2,000 crocodiles from both the farms and the wild are exported earning Zambia an estimated \$ 200,000, a most welcome and valuable contribution to the foreign exchange needs of the country.

A maximum of 15,000 eggs are annually collected to support crocodile farms in the country.

These figures have no effect on the population as they are but a fraction of the exploitable population.

Nationally, crocodiles and their products are not utilized in their raw or unprocessed form except for eggs and breeding stock for farms; consequently all trade in crocodile skins and other derivatives is international.

32. Legal International Trade: Zambia is one of the African range states allowed an export quota under the Convention. The quota of 2,000 skins serves both for the farms and for the wild cropped crocodiles.

Exports of skins are closely and strictly controlled. These controls include the physical tagging of skins by a member of the department, and the centralization of the export documentation at Headquarters.

However, the quota of 2,000 has proved inadequate for both skins from the wild and from the farms.

33. Potential Trade Threats: No potential trade threats exist as any off take and export is sanctioned by the department, and there is little evidence of poaching of the crocodile for illegal export.

4. Protection Status

41. National: The Nile crocodile is a game animal under the National Parks and Wildlife Act, Cap. 316 of the Laws of Zambia. This means that the crocodile can only be hunted under a licence

issued by the department or a special licence issued by the Minister in consultation with the department. In addition, ownership or possession of a crocodile or products therefrom is permitted only under a valid certificate of ownership issued by the department.

42. International: Zambia being a Party to the Convention adheres strictly to the provisions of the Convention. Any trade and export is strictly under CITES procedures.

43. Additional Protection Needs: The Nile crocodile (Crocodylus niloticus) is considered secure in Zambia and indications are that the population is on the increase. With the proper system of monitoring trade and licensing of export already in place, there seems to be no need for additional protection measures, other than continued monitoring of population trends.

5. Information on Similar Species

The African Slender Snouted Crocodile (Crocodylus cataphractus) only occurs on lake Tanganyika and possibly Mweru-Wantipa. However, it is infrequently seen and in the last decade, only one specimen has been captured alive by Lake Tropicals Limited during their collection exercise. Exploitation of the Nile crocodile (Crocodylus niloticus) does not therefore seem to affect the population of Crocodylus cataphractus.

Detailed information on all species of Crocodylians is contained in the reptile and amphibia Volume of the IUCN Red Data Book.

6. Comments from Countries of Origin

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7. Additional Remarks

The management of the Nile crocodile (Crocodylus niloticus) population in Zambia has reached a stage where the value of the crocodile is slowly tipping the scales against the public in whose eyes the only good crocodile is a dead one.

It is at this critical time that the Zambian CITES Management Authority needs assistance and is appealing for this assistance from the Conference of the Parties in allowing her greater flexibility in the annual quotas for export of crocodile skins.

When management is able to show to its authorities and to the public at large the tremendous potential a crocodile population has in the generation of foreign exchange, then management will be assured of support for its conservation programmes for the species.

Zambia requests support for a quota of 10,000 which is only but 0.067 of Zambia's estimated crocodile population. This quota will cater for both wild cropped and farm crocodiles.

8. References

Beukes, C.J., 1985. Luangwa Crocodile and Safaris collection and hatching report to the Director of National Parks and Wildlife Service.

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Cott, H.B., 1961. Scientific results of an inquiry into the ecology and economic status of the Nile crocodile (Crocodylus niloticus) in Uganda and Northern Rhodesia.

Cott, H.B., 1971. Parental care in the Crocodylia, with special reference to Crocodylus niloticus. Proc. of the 1st working meeting of crocodile specialists Vol. I.

Munyenembe, F., 1986. National Parks and Wildlife Service Chinzombo Research Station Annual Report, 1986.

Parker, G., 1984. Summary of egg collection and Hatching Data report to the Director of National Parks and Wildlife Service.

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**HERE
AND
THERE**

SIX people have been killed by crocodiles on the banks of Luangwa river in Lusaka Rural, it was learnt.

Chairman for Mankanda ward Comrade Mathew Nyangu who disclosed this appealed to the department of wildlife in Chilanga to send hunters to Shimungubo branch which is heavily infested with the reptiles to kill them before more lives are lost.

TIMES OF ZAMBIA

MARCH, 1987

LETTERS

Let police issue reg cards

It is not uncommon to find long queues of people, young and old, waiting to be issued with national registration cards at the bomas throughout the Copperbelt.

I wonder, do the authorities ever realise that these people usually leave their homes very early in the morning with the hope that they will be among those to be served first?

Most of these people live very far from the bomas, which means either they have to board buses or be forced to walk long distances.

At the bomas most of them stand in queues everyday for more than eight hours without food and it usually takes several weeks before an individual is attended to.

The mobs formed by these people could become potentially dangerous to order and peace.

There are so many demerits in the current system which makes it imperative to change it.

I suggest that all police stations in the districts be authorised to issue national registration cards.

What we need is a simple, straightforward and efficient system to serve the people quickly without subjecting them to undue hardships and inconveniences.

Could the powers that be consider my suggestion.
SOKWE SOKWE,
Kitwe.

Times of Zambia April 2, 1987

House crisis hits all

THE problem of teachers' accommodation is a long standing one. But it should be understood that it is not only the teachers who are facing this problem. There are many others. I have faced this problem since 1969.

My attempts to acquire a plot on which to build a house have all come to nought. I had bought a house in a shanty township but before I could improve it, it was demolished by the district council.

I had again secured a plot at the Mazyopa township. Just as I was about to build, the district council came and demolished the settlement.

Can I please know from the Lusaka Urban district governor whether development in Lusaka means only widening roads, building flower beds along Freedom Way and building some fly-over bridges without considering shelter for the people.

Can't the governor do anything to reduce the housing waiting list?

CONCERNED

Lusaka.

Put up humps

I AM appealing to whoever is responsible, to construct humps on Luanshya's Mukulu Road stretching from Mpatamatu post office up to mine police headquarters to save the lives of innocent pedestrians who are being knocked down like dogs.

As a resident of this township, Mpatamatu, I think everyone will agree with me that this road is always busy and a month hardly passes without learning of an accident on this road.

Meanwhile, pedestrians must be extra careful.
BERNIE MAKALASHI,
Luanshya.

Crop crocs

I HAVE been following the frequency of attacks by crocodiles in Livingstone. Can't hunters be sent there to control the situation before it gets out of hand?

The present situation could frighten tourists and make them reluctant to visit the place.

The recent incident in which a Maramba cultural dancer narrowly escaped death brings to seven the number of people who have been either bitten or drowned by crocodiles this year alone.

Quick action is called for.

G.K. JAKOPO,

Mazabuka.

Tax dogs

MR LAWRENCE Mponda's letter (Times, March 24) made a lot of sense. I support it wholeheartedly.

We should indeed introduce taxes on dogs, bicycles and other items.

I hope the Government will consider this without delay.

H.J.M. BWALYA,

Lusaka.

commission. From the time he reported the matter to the commission officers monitored his meetings with Dakino and he was given a recording device.

He met DeLino outside offices of the Special Investigations Team for Economy and Trade

State shop burgled

By Times Reporter

THIEVES blew up a metal door at Kabwe's Mwaiseni Store at the weekend and got away with goods worth thousands of Kwacha. Central Province police chief Mr Elias Kaite said yesterday.

No arrest had been made, but police and workers believe the gang used a vehicle which might have been parked some metres away from the shop to carry groceries, clothes and an assortment of spirits.

The theft disrupted last-minute Christmas shopping by a large crowd of people who flocked there on Monday but were turned away by security men as auditors from Lusaka tried to determine the value of stolen goods.

The store remained closed yesterday although on Sunday—hours before the break in—it was jammed by shoppers scrambling for washing powder which reappeared after a long time.

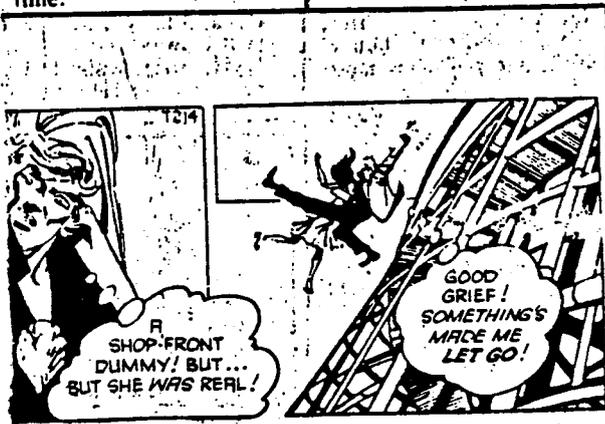
yesterday donated a chair to a Grade 1 at Kabwe Secondary School. Zacharia Tiribangani is paralysed following a car accident in November last year. Club president Mr Greg Byrne made the presentation.

A fisherman has been killed by crocodiles at Mufulla Boating Club, district police chief Mr David Chuunga has confirmed. The man who has not been identified was killed as he was fishing in the dam.

*Times of Zambia
25 December 1985*

TELEVISION

- 12.00 National Anthem
- 12.05 Bugs Bunny Show
- 12.25 Fraggle Rock
- 12.55 Christmas Message From Pope John Paul II and Apostolic Blessing
- 13.30 Christmas Carols
- 14.00 News
- 14.15 Christmas Carols
- 15.45 USA For Africa
- 16.31 Cleo Lane Christmas Show
- 17.22 Christmas Carols
- 17.40 Children On Christmas Day
- 18.10 Youth Forum
- 19.00 News/Weather Report
- 19.20 Inter Denominational Church Service
- 19.50 Family Ties
- 20.20 Christmas With Pamodzi
- 21.00 News Summary
- 21.05 Christmas Prologue
- 21.10 Hill Street Blues
- 22.00 Jimmy Swaggart Ministries
- 23.00 Closedown.



for various production to mbia to become and earn some change for pr-ntial items. aral production y hope for survi-er was no longer enough and its survival were Times Reporter/

Cde Chansa in the 1983 general elections.

HERE AND THERE

The Dairy Produce Board has been hit by a shortage of milk bottles, and the board's general manager Mr Boniface Sandala appealed to the public to return the empty bottles for which they will be paid 50 ngwee each.

The weeklong search for the remaining two bodies of the six boys who drowned in Nkulumashiba stream has been abandoned, Luan-shya district police chief, Comrade Bernarico Mulenga said.

Francis Kazembe, 19, labourer, of Kola township was jailed for three years for theft of goods in transit from a Zambia Railways wagon. He admitted that on March 13 he stole a bale with 10 blankets from a wagon in Ndola.

Sesheke district executive secretary Cde Daniel Longwe has appealed to the wildlife department to crop crocodiles in the Zambezi river to protect the lives of people in the area.

Preparations for this year's Copperbelt Agricultural and Commercial Show are in an advanced stage and most of the stands have been taken up by exhibitors, said show society director, Cde Patrick Chamunda.

TELEVISION

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LIST

declined to hear that the petition but that Mr Munthali will claim damages to the State for in- treatment and arrest over his detention. dge will make a ter on whether that in be heard directly e petition as an matter or whether nthali should file uit in the normal

munthali was one of businessmen held afinsa prison on ms that they stole ent from ZCCM and it mostly to the) inflated prices. as further alleged search by police at iness premises on u road, Kitwe un- a large assortment s suspected to have alen from ZCCM for e could not account. had denied all the ions.

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18534/d-27

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TELEPHONE NUMBERS CHANGED TO:

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TIMES OF ZAMBIA
FRIDAY MARCH 27, 1987