



SISSEROU EXPRESS ARRIVES IN DOMINICA

By Nick Reynolds,
World Parrot Trust

On the 15th of February I delivered the Sisserou Express to the Geest depot at Barry Docks in South Wales. Ahead of it was the ten day crossing aboard the Geestline banana boat to land in Dominica on the 29th of February.

As part of the team which purchased, serviced, converted and fitted out the British Leyland bus for its new and exotic existence, I was burdened with the task of handing over the Sisserou Express and explaining its special features. I flew out on 4th March to St. Lucia, where I was met by Paul Butler of RARE, our partners in this interesting joint venture. The next day we travelled on to Dominica, where we visited the Forestry Department and met Felix Gregoire (Director of Forestry and Wildlife), Arlington Jones (Head of Education) and Ronald Charles (Education Officer).

Ronald and I went to clear the bus through Customs, not a task to be given to the light of heart. We trekked to and from four different offices, but at last we were able to drive Sisserou off the docks and through the capital town of Roseau to the Botanical Gardens where we left it for the night. We spent the next couple of days cleaning and preparing the bus and its exhibits for its presentation on Wednesday 11th March.

On Monday the 9th we had the great privilege of going to the forest reserve to see some parrots. We drove for a couple of hours until we were high in the banana and grapefruit plantations, where we saw a pair of Red-necked Amazons fly overhead. We stopped shortly

after this first sighting and walked for ten minutes until we came to a small clearing with a platform overlooking the most spectacular view I have ever seen. Just then we saw five more Red-necked Amazons down in the valley. We were just recovering from the excitement of that when a pair of Imperial Amazons appeared about twenty yards above us. That was brilliant, and in total we saw five Sisserous and twelve to fifteen Red-necked Amazons or Jacquots. A day we will never forget.

Back to the presentation, which took place at 3pm on the cricket pitch in the Botanical Gardens. The

principal guests were four government ministers: Senator Hon. Rupert Sorhaindo, Minister of Education, Hon. Charles Maynard, Minister of Tourism, Hon. Alan Guy, Minister of Health, Hon. Maynard Joseph, Minister of Agriculture and Environment, to whom I presented the keys of the bus. Felix Gregoire introduced Paul Butler who gave a short talk about the bus and its value in helping to conserve Dominica's forests through educating the children.

A vote of thanks to World Parrot Trust and RARE was proposed by Ronald Charles, after which I demonstrated the various exhibits

on the bus. After the guests departed we took the bus through the streets of Roseau to see what response it would get. It was quite amazing, people were shouting and waving and obviously pleased to have their Sisserou Express.

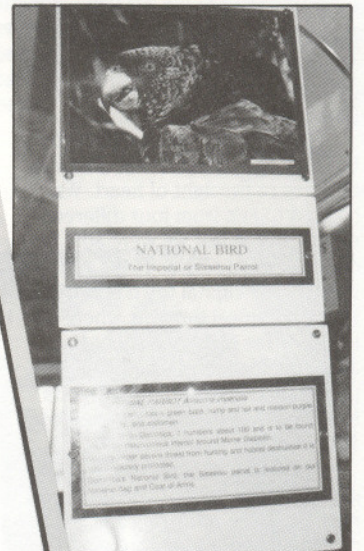
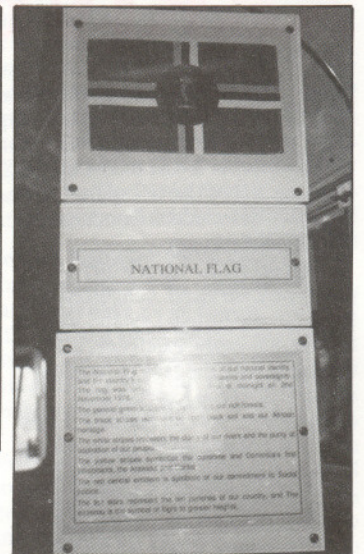
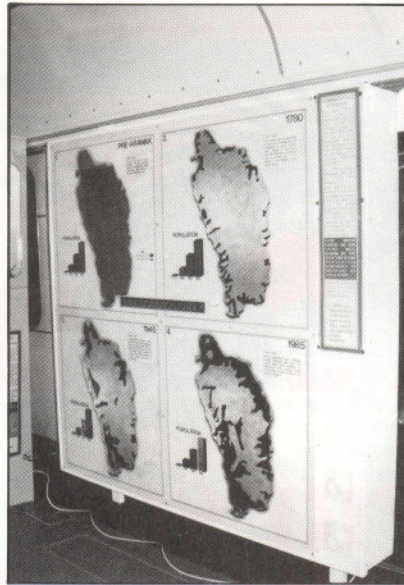
Now my colleagues and I are hard at work preparing bus number three, the Vincie Express, which is expected to be ready to go to St. Vincent later this year. This conservation bus scheme demonstrates that joint projects between comparatively small and specialised charities can be remarkably successful and give outstanding value for money.




“psittacine
(sit'ā sīn) Belonging
or allied to the
parrots; parrot-like”



EDITOR:
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**MINISTRY OF AGRICULTURE
 FORESTRY DIVISION**

**BOTANICAL GARDENS,
 ROSEAU,
 DOMINICA, W.I.**

Tel. 82731
 Our Ref. F
 25th March 1992

Mr. Nick Reynolds
 Home of the World Parrot Trust
 Hayle
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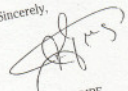
Dear Mr. Reynolds:

Another dream has come true!!! The Sisserou Express landed in Dominica without a scratch on February 29, 1992. On March 11 1992, the Environmental Bus was presented to the Minister of Agriculture and Environment, Honourable Maynard Joseph, in the presence of Minister of Tourism Honourable Charles Maynard, Minister of Education and Sports Honourable Rupert Sorhalindo and the Minister of Health Honourable Alan Guy. All the Ministers of Government addressed the gathering at the lovely Botanic Gardens. The school children made the audience more distinguished. The audience also included our international friends in the persons of Victor Gonzalez of RARE, Nick Reynolds and wife of World Parrot Trust and Paul Butler also of RARE.

The Sisserou Express will be a giant in the area of environmental education and we look forward to taking the message of conservation to the rural communities on wheels.

All this would not be possible without the valuable contribution of your organisation and its membership, which in no small way, made that programme a reality. On behalf of the Government and people of Dominica, I thank you immensely and wish you continued success in your endeavours in the future.

Please accept our best regards.

Sincerely,

**FELIX GREGOIRE
 DIRECTOR OF FORESTRY & WILDLIFE**

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It will of course consider articles or letters from any contributor on their merits.

STATUS AND MANAGEMENT OF THE BLUE-FRONTED AMAZON PARROT IN ARGENTINA

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Unpublished Advance Report
Prepared for TRAFFIC U.S.A.

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SUMMARY

1. In Argentina, the range and abundance of the Blue-fronted Amazon population continues to shrink. The impact of habitat destruction from forest cutting and overgrazing is exacerbated by the current method of collecting parrot nestlings. To procure nestlings, the local people usually open a hole in the trunk or even cut the entire tree, which leaves more than 95% of the cavities unusable for future nesting by parrots. Around 100,000 trees have been destroyed or damaged between 1981 and 1989 as a direct result of this practice. Besides destroying the nest cavity, trappers remove the whole brood from every nest they find, resulting in no recruitment of young birds into the wild population. While a drastic fall in the Blue-fronted population may take some time before becoming apparent due to the parrot's long lifespan, conditions are building for a sudden crash in the remaining population within the next few years.

2. A similar process of nestling gathering and nesting habitat destruction is now taking place in the Paraguayan Chaco. Given that trade is not legal in Paraguay, it is likely that parrots are being smuggled into Argentina and from there exported legally to the U.S.A. and Europe.

3. The parrot trade does not benefit either the Chaco campesinos or the parrots and their ecosystem. It provides limited economic benefits to the campesinos, at a considerable cost in terms of loss of resources. Middlemen do not make any kind of investment to ensure sustainability of the parrot trade in the region.

4. At present damage by parrots in the citrus growing areas of

northwestern Argentina is low to very low, with very few exceptions. In those cases where control is needed, there is ample scope for the development of integrated pest management techniques that maximize damage reduction without endangering the survival of the pest species.

5. Implementation of sustainable harvesting schemes for the Blue-fronted Amazon is in principle a viable alternative that may help the local economy without endangering the resource. This should therefore be promoted. However, substantial social, political, and economic difficulties lie in the way requiring detailed research and careful implementation.

6. We recommend: a) a moratorium on all trade of the Blue-fronted Amazon in Argentina until acceptable methods of sustainable exploitation of the wild populations can be developed; b) implementation of reliable ranching schemes for the Blue-fronted Amazon; c) protection of patches of remnant mature forests in the western Chaco in order to prevent extinction of the local subspecies of the Blue-fronted Amazon (*Amazona aestiva xanthopteryx*); d) increased research on alternative, non-lethal methods of controlling damage by the Blue-fronted Amazon in citrus plantations.

INTRODUCTION

This Report summarizes the main findings of the project "Status and management of the Blue-fronted Amazon parrot in Argentina" (as of July 1991). It provides an overview of the present situation and suggests management recommendations to the national and international agencies involved in the parrot trade. A comprehensive report detailing the research results that support this advance report is being prepared.

The project is carried out by the Centro de Zoología Aplicada, University of Córdoba, Argentina, with the financial support of the World Wildlife Fund US and Traffic USA. The research group includes scientists from the Centro de Zoología Aplicada (E.H. Bucher and S. Miglietta); the Centro de Investigaciones Ecológicas del Chaco (C.J. Saravia Toledo); and the National Institute for Livestock and

Agriculture Technology (INTA) (M.E. Zaccagnini).

At the institution's request, a copy of this report is being sent to the Dirección Nacional de Fauna Silvestre, Argentina, to be used for the preparation of a national report on the situation of the Blue-fronted Amazon in Argentina.

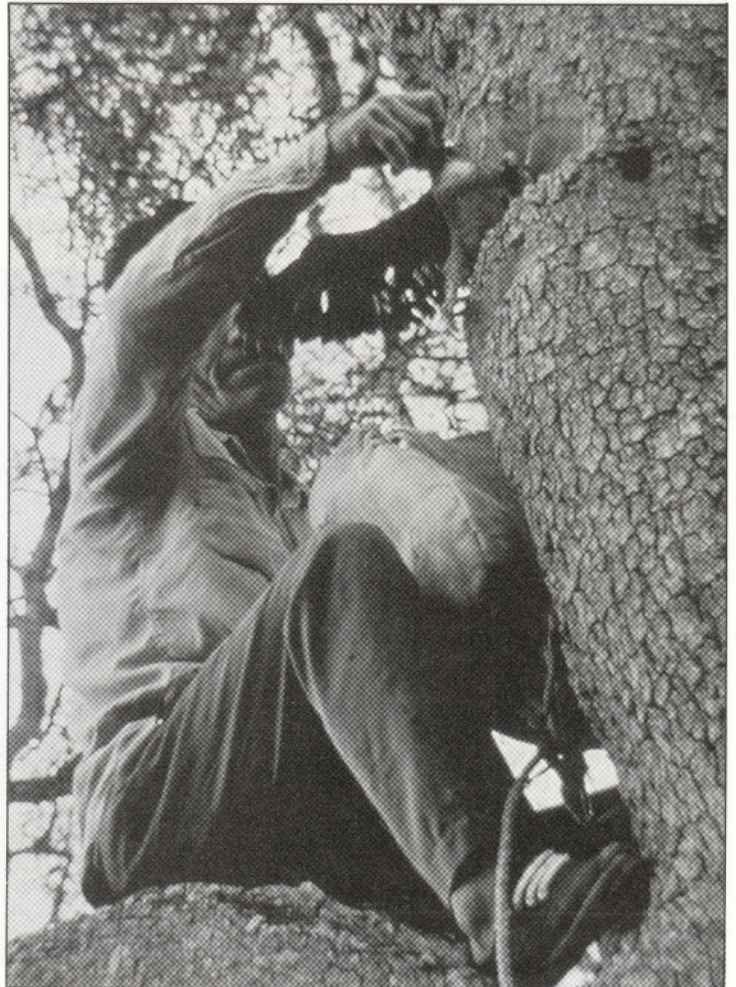
PRESENT STATUS OF THE BLUE-FRONTED AMAZON

Distribution and abundance

The original distribution in Argentina included the provinces of Córdoba, Santa Fe, Catamarca, Santiago del Estero, Formosa, Salta, Jujuy, Chaco, and Corrientes. Even in Córdoba, at the southern end of its range, it was abundant in 1550, at the time of the Spanish colonization (Bibar 1558).

Today the Blue-fronted Amazon is extremely rare in Córdoba, La Rioja, and Catamarca provinces, where it survives in isolated forest patches. It is uncommon in Santa Fe, and in Santiago del Estero its present distribution is restricted to forested areas north of the 27° S parallel (Nores et al. in press). The Blue-fronted Amazon is still relatively common in some areas of Salta, Jujuy, and Formosa, although less abundant than even 20 years ago (C. Saravia Toledo, pers. obs.) Its numbers have declined markedly in many areas, primarily within the Chaco region (Nores and Yzurieta in press).

This historical declining trend in both area and numbers, is the result of two factors: habitat destruction and overexploitation. Both factors are well known as causes of the



Robbing of Blue-fronted Amazon chicks from nest tree.

Photo - Enrique H. Bucher

widespread decline in New World parrots (Collar and Juniper in press).

Habitat destruction

The Blue-fronted Amazon requires availability of mature or over-mature forests where snags and old trees provide adequate holes for nesting, as well as the fruits which are their preferred diet (Bucher and Martella 1988). The parrot has disappeared from those areas where forest exploitation, overgrazing, and clearing for agriculture has eliminated old trees, as documented by Bucher and Martella (1988) in Salta. Mature forests have already been eliminated throughout a great proportion of the southern and central Chaco of Argentina, particularly in the provinces of Santiago del Estero, Cordoba, and Santa Fe. At present deforestation takes place at a rate of at least 50,000 ha/yr in the western Chaco, although the historical average has been around 300,000 ha/yr (C.S. Saravia Toledo unpublished data). If the present trend continues, it can be expected that all remaining mature forests in the Chaco will disappear in a few decades.

Besides forest cutting, regeneration of the Chaco forest is prevented by overgrazing. As a result of this, the original landscape of tall forests intermingled with grassland patches is replaced by a dense shrubland, a type habitat that is unsuitable for the Blue-fronted Amazon (Bucher and Schofield 1981). The combined effect of deforestation and overgrazing explains the local extinctions that occurred in the species' southern range, particularly in the provinces of Cordoba and southern Santiago del Estero. This process continues today, its intensity being limited mostly by lack of roads and the present economic state in Argentina. In the long-term, deforestation by itself is enough to lead to extinction of the Blue-fronted in large parts of the remaining distribution area.

Trade

Blue-fronted Amazons have traditionally been trapped for the national pet trade and also killed by farmers who consider them pests. Both sources of mortality were limited in intensity and range until the early 1980s, when demand from the international pet trade increased dramatically. As a result, around 310,000 Blue-fronted were exported during the period 1981-1989, according to official figures.

Exploitation of wild Blue-fronted Amazons is based on gathering of nestlings and trapping of adults. The first takes place mostly in the Chaco forests, whereas the second is concentrated in the citrus-growing areas of Jujuy, Salta and Tucuman. However, adult trapping is insignificant in magnitude compared

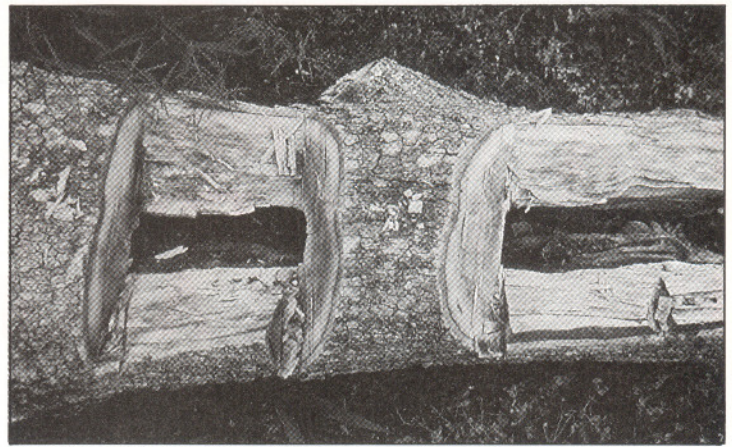
with nestling gathering because fledgling parrots are preferred by exporters because they can be hand-reared and tamed.

Nestlings are being harvested at an alarming rate throughout the western Chaco of Argentina, particularly in the provinces of Salta, Formosa, and Chaco. The actual number of birds removed from the wild population is unknown, but must be considerably higher than export figures if mortality of nestlings in captivity and in the internal trade are included. Average mortality from capture in the forest until the moment of delivery from the exportation port (Buenos Aires) is estimated to be at least 20%, although this varies according to experience and skill of traders. Export figures do not include birds sold in the national market, the magnitude of which would be very difficult to assess.

Throughout the whole Chaco, campesinos systematically remove the whole brood from every nest, precluding any recruitment of young birds into the wild population. They are so afraid of leaving nestlings that others might later steal, that the whole family guards their nests day and night as harvest time approaches. Fear of robbery also leads to premature removal of nestlings at too early an age, thereby decreasing their chances of survival in captivity.

There is evidence suggesting that overexploitation is causing drastic population declines in a large proportion of the Chaco. According to interviews conducted with traders in Joaquin V. Gonzalez, Salta Province, around 3,000 young were taken annually from a forested area of 90,000 ha of public land (Salta Forestal S.A.) in 1986 (Bucher and Martella 1988). We estimate that less than 500 nestlings were taken from the same area in the 1990-91 breeding season. Although the observed fall in productivity was due primarily to forest cutting, it also affected the remaining patches of untouched forest within the area. Furthermore, collectors interviewed in J.V. Gonzalez say that even 20 years ago Blue-fronted Amazons were easy to find near the town, whereas now they must travel 80 km north of the town to buy parrots from campesinos.

Besides its direct impact on the Blue-fronted population, the pet trade also contributes to forest destruction and reduction of nesting site availability. To obtain nestlings, campesinos usually open a hole in the trunk or even cut the entire tree, which leaves more than 95% of the cavities unusable for future nesting by parrots. This practice is widespread in the whole Argentine Chaco and is now extending into the Paraguayan Chaco (see below). In 1990, poachers robbed and damaged 9 out of the 11 nests that



This demonstrates how nest trees are cut open to extract Blue-front chicks. At a conservative estimate, 100,000 Blue-front nest trees were destroyed in the process between 1981 and 1989 in Argentina.

Photo - Enrique H. Bucher

we were studying in Salta Forestal, J.V. Gonzalez, Salta province. The same problem was found by researchers studying Amazona parrots in Mexico (Perez and Eguarte 1989).

Preferred nesting trees are also valuable timber species, particularly the red quebracho (*Schinopsis quebracho-colorado*) and the white quebracho (*Aspidosperma quebracho-blanco*). Since the average brood size at collecting age is around 3 (pers. obs.), it follows that for every three parrots from export figures at least one tree was affected. Consequently, it is valid to estimate that around 100,000 trees have been destroyed or damaged between 1981 and 1989 as a direct result of the international trade alone. This figure is conservative and, as mentioned before, can be increased by a factor of 25% if mortality from capture to shipment in Buenos Aires is considered. Quebrachos are not fast growing trees: it may take more than fifty years for a quebracho to grow to a marketable size and more than a hundred years to become old enough to have holes suitable for parrot nesting.

We conclude that if this decreasing trend in fledgling recruitment continues, due to overexploitation and habitat destruction, then the species' survival in the region will be endangered. While a drastic fall in the Blue-fronted population may take some time before becoming apparent due to the parrot's long lifespan, we caution that the present situation may lead to a sudden crash of the remaining population within the next few years.

The situation in Paraguay

The fact that bird trade is legal in Argentina may also have an impact on Blue-fronted Amazons in Paraguay. From interviews with campesinos during a recent visit to the area (August 1991) we found strong indications that a similar process of nestling gathering and

nesting habitat destruction is now taking place in the Paraguayan Chaco. This process is facilitated by the new Transchaco road that is being built across the Paraguayan and Bolivian Chaco. Given that trade is not legal in Paraguay, it is likely that parrots are being smuggled into Argentina and from there exported legally to the U.S.A. and Europe. This is not surprising since the same process has probably occurred before with the Canary-winged Parakeet (*Brotogeris versicolor*). Large numbers of this species were exported from Argentina despite the fact that it is extremely rare there (Azipiroz and Villalba-Macias 1989).

SOCIAL AND ECONOMIC ASPECTS OF TRADE

In Argentina trade of the Blue-fronted Amazon includes the following groups: trappers, field collectors, and middlemen. Adult parrots are trapped usually in citrus plantations by professional trappers. They sell the birds to collectors or directly to exporters in Buenos Aires. Nestlings are taken from the nests by both resident peasants and foresters.

The resident peasant, known locally as "puestero," lives in poor houses and breeds goats, sheep, and cattle. Usually he does not own the land he occupies, which may be either private or public. Lack of land ownership, deficient education, and poverty combined, lead him to live in a very poor and marginal condition. His domestic animals are allowed to graze freely around the permanent well, leading to severe overgrazing which in turn increases his poverty (Bucher and Schofield 1981). Hunting of wildlife, including parrots, Tupinambis lizards, foxes, snakes, and wildcats, is part of his daily activities and complements his income.

The parrots' nests are detected early in the breeding season and guarded until the nestlings can be removed. The number of nestlings that each "puestero" can collect is

usually small and limited by their range of activity around the house, which usually does not extend beyond 3 or 4 kilometers (around 30 square km). Productivity declines rapidly due to the destructive capture techniques already described. Some "puesteros" have learned to close a nest with wood and mud after it has been opened to remove the chicks, expecting to collect more birds the following year. However, this is far from being a generalized practice.

Foresters are temporary workers associated with forest exploitations, known as "hacheros" (ax men). Their daily work, which includes cutting down trees and making charcoal, increases their chances of finding parrot nests. Their familiarity with the ax and the chainsaw and their lack of attachment to the land encourages them to cut trees to collect parrots or honey from wild bees hives without any concern about habitat destruction. The sale of parrots supplements their income from forestry.

Both the "puestero" and the "hachero" live in a subsistence economy. In 1991 collectors paid about US \$4 for each parrot. As seen before, the limited economic benefits that campesinos derive from the parrot trade are short lived, having an important cost in terms of environmental degradation and loss of resources. Furthermore, problems of land tenure, illiteracy, and their cultural background with a strong influence from the indian hunting and gathering traditions do not encourage them to think in terms of investing in the future. As a result of that, earnings from selling parrots do not necessarily lead

them to improve their standard of living or to invest in ensuring the sustainability of the resource. Improvement in the living conditions of the Chaco campesino cannot be achieved simply by small amounts of extra money earned occasionally. It requires access to education, a better and sustained income, land ownership, and an adequate knowledge about how to manage their land in a sustainable way (Bucher and Schofield 1981).

Curiously, land owners, both public and private, are missing actors in the parrot trade. In both cases wildlife is not perceived by them being as part of the land's productive potential. As a result, there is no special concern by the landowner or government agencies for preserving wildlife as a complementary source of income, the whole Chaco becoming "communal land" in terms of wildlife as a resource. Exploitation of wildlife is usually in the hands of poachers or eventually given to "puesteros" or "hacheros" working for the landowner as a complement to their salaries (Bucher 1989). From the point of view of the exploitation of what in this case can be seen as nobody's property, the parrot trade is a typical example of "the tragedy of the commons" dilemma. This is the name that Hardin (1968) gave to the process that inexorably leads human nature to the overexploitation of the common land when use is not regulated.

Collectors drive around the region collecting parrots. Nestlings are gathered at a central depot, usually in a nearby town. In 1991 collectors sold them to the exporter at US \$8 each. Birds usually are

taken to Buenos Aires by road, and sometimes by airplane. Finally, Blue-fronted Amazons can be sold at the pet store in Europe and the U.S.A. for \$400 or more. As usual, collectors and exporters profit from the bird trade in a much higher proportion than campesinos (Thomsen and Mulliken 1991). However, neither of them is making any kind of investment to ensure sustainability of the parrot trade in the region. They behave as opportunistic enterprises that prefer to move to other less exploited areas of the Chaco or to shift to other species according to availability and international prices.

To summarize, the parrot trade, as it occurs today in Argentina, provides limited economic benefits to the local campesinos, at an important environmental cost. Moreover, trade certainly does not benefit parrots and their ecosystems. Instead, exploitation of the Blue-fronted Amazon can be seen as another example of short-term prosperity leading to long-term disaster in Latin America. Analysis of these processes reveals a depressing consistent sequence of events: strong demand from industrial countries leading first to overexploitation and finally to environmental degradation (Schofield and Bucher 1986). As such, trade will most benefit those economic interests outside the region that lack any commitment to the sustainability of the resource.

THE BLUE-FRONTED AMAZON AS AN AGRICULTURAL PEST

The Blue-fronted Amazon is considered a pest in the citrus plantations of north-western Argentina. Damage caused by

parrots occurs in the citrus growing areas in the provinces of Salta, Jujuy, and Tucuman. Usually citrus plantations in the region are located near foothills or in intermontane valleys surrounded by rain forests where the parrots migrate during the non-breeding season.

The Blue-fronted Amazon causes damage primarily in orange plantations, and secondarily in lemon, grapes and mandarins. According to 17 farmers interviewed in Salta in 1990, oranges are the most affected crop (70% of the complaints), followed by mandarins, grapes, and lemons (6% each). Five farmers (29%) considered damage by parrots as serious, 3 (18%) as moderate, 5 (29%) as slight, 2 (12%) as nonexistent, and 2 (12%) did not know. Sixteen of the interviewed farmers (95%) had used some kind of control measures. Shooting with guns was the most frequently mentioned technique, although considered unsuccessful and very expensive. Exploders had been used by six (35%) farmers without success, apparently because parrots habituated very rapidly. Twelve (71%) used patrolling by children and were satisfied with the results achieved.

Today trapping for the pet trade is considered a cheap way of dealing with the problem, and for that reason farmers allow and facilitate trapping. Adult parrots are trapped using different kinds of glues, some of them made from native plants. The birds are sometimes attracted by decoys (captive parrots that are strategically located). Trappers capture Blue-fronted Amazons as well as other parrots and birds, including Tucumana Amazons (*Amazona tucumana*) and toucans.

In 1990 and 1991 we evaluated damage by parrots in 31 orange and lemon plots in areas where we received complaints of damage by Blue-fronted Amazons. In none of them control had been used. Table 1 shows that in most of the plots (19) damage was very small to negligible, in 11 cases damage was less than 5%, and in only one case damage was between 5% and 10%. Variations in damage intensity between years was also noticeable. In Santa Clara, Jujuy, damage in the same plot was 6.38% in 1990 and 0.08% in 1991.

A high degree of temporal and spatial variability and a skewed distribution of damage intensity is a common pattern found in cases of agricultural damage by birds. Average damage is usually low on the regional scale, reaching significant levels in only a small proportion of plots (Bucher in press).

Table 1. Evaluation of damage in citrus plantations in Salta, Jujuy, and Tucuman. Data from 1990 and 1991. Damage is shown as percentage of damaged fruits versus the total.



Male Sexual dimorphism is often pronounced in this sub-species, the male having much more extensive yellow on head and neck. Photo: R. Low



Female The xanthopteryx sub species of the Blue-fronted Amazon is severely threatened by over collection of young from nests. Photo: R. Low



Blue-fronted Amazon of Argentinian sub-species *xanthopteryx* – hatched in captivity Photo: Rosemary Low

	Damage (%)			Sample size (plots)
	<1	1-5	5-10	
Citrus	67	28	5	21
Orange	50	50	0	10
Lemon	62	35	3	31
TOTAL				

We also interviewed specialists in citrus from the University of Tucuman as well as leading citrus growers in the region. All of them believed that at present damage from parrots in citrus is not economically important. Moreover, some of them pointed out that damage from parrots tends to be associated with poor agronomic practices (such as the presence of sick trees that have more open foliage to facilitate perching) or with those farmers that delay harvesting in the hope of receiving better prices.

We did not find any attempt to use non-lethal methods to control damage by parrots. However, there is ample opportunity for the development of integrated pest management techniques that minimize damage without endangering the survival of the pest species. Techniques and approaches other than lethal methods are available for controlling damage by parrots. Alternative methods include changes in agronomic practices, use of repellents, patrolling to repel parrots from crops, etc. (Bucher in press).

In summary, agricultural damage by Blue-fronted Amazons is restricted to citrus plantations within a well defined area in N.W.

Argentina. Damage level is at present light to very light. In those few cases where control is needed, there is ample scope for the development of integrated pest management techniques that minimize damage without endangering the survival of the pest species. Non-lethal alternatives available include changes in agronomic practices, use of repellents, bird-scaring devices, etc. (Bucher in press)

We consider that legalization of massive trapping and trade as a population control strategy is not justified, given the localized dispersion of damage incidents and the relative ecological "weakness" of the Blue-fronted Amazon already discussed (Bucher in press). Intensive killing and trapping at a regional scale may overcome compensatory mechanisms, even without destruction of nesting habitats. Besides, massive killing will probably affect many individuals that will never attack a crop. Furthermore, this practice allows for uncontrollable excesses in exploitation not directly related with damage intensity or distribution, but driven instead by the build-up of vested interests along the trade chain. Such interests are likely to resist any attempt to cancel trapping permits even if a decline in population becomes clear. Any significant delay between the onset of a population decline and the banning of trade, resulting from economic pressures or even bureaucratic delays, may prove to be fatal for the Blue-fronted Amazon in Argentina (Bucher in press).

FEASIBILITY OF RANCHING

Implementation of sustainable harvesting schemes for the Blue-fronted Amazon is in principle a viable alternative that may help the local economy without endangering the resource and therefore should be promoted. Ideally, it should be conceived within a diverse, multispecific production system that includes a flexible utilization of natural resources in the Chaco (Bucher 1989). Biological data suggest that there is a good potential to harvest parrots in a sustainable manner. However, substantial social, political, and economic difficulties lie in the way of implementing sustainable harvest schemes and require detailed research and careful implementation (Beissinger and Bucher in press). The keys to making sustainable harvesting of the parrots operational are good scientific information and a strong organization to control and enforce harvesting and trade regulations. In the absence of effective controls, attempts at sustained harvesting could prove counterproductive and exacerbate conservation problems. Massive exports from ranches should not be allowed until their viability is well proven, and adequate control mechanisms are implemented in order to prevent "laundering" of birds obtained from the wild in Argentina or smuggled from neighboring countries.

CONCLUSIONS

1. Exploitation of the Blue-fronted Amazon as it takes place today is unsustainable and threatens the

survival of the subspecies *Amazona aestiva xanthopteryx*.

Overexploitation prevents recruitment of young birds and simultaneously stimulates a massive destruction of nesting habitat that in turn will affect future nesting site availability.

2. Habitat destruction by deforestation and overgrazing is also a serious threat to the survival of the Blue-fronted Amazon. It has already caused local extinctions in large parts of the parrot's original distribution range.

3. Unless the present trend is reversed, the combined action of both factors threatens the survival of the Chaco subspecies of the Blue-fronted Amazon in Argentina and also in the Paraguayan and Bolivian Chaco.

4. The parrot trade does not necessarily benefit the Chaco campesinos or the parrots and their ecosystem. It provides limited economic benefits to the campesinos, at a considerable cost in terms of loss of resources.

Middlemen do not make any kind of investment to ensure sustainability of the parrot trade in the region.

5. At present damage by parrots in the citrus growing areas of northwestern Argentina is generally low to very low, with very few exceptions. In those cases where control is needed, there is ample scope for the development of integrated pest management techniques that minimize damage without endangering the survival of the pest species. Techniques and approaches other than lethal methods are available for controlling damage by parrots.

RECOMMENDATIONS

1. A moratorium on all trade of the Blue-fronted Amazon in Argentina should be enacted until acceptable methods of sustainable exploitation of the wild populations can be developed.

2. Ways of implementing sustainable ranching schemes for the Blue-fronted Amazon should be considered, and the necessary research promoted. Special attention should be paid to the implementation of adequate control mechanisms.

3. Protection of patches of remnant mature forests in the western Chaco should be encouraged and supported, in order to prevent extinction of the local subspecies of the Blue-fronted Amazon (*Amazona aestiva xanthopteryx*)

4. Research on alternative, non-lethal methods of controlling damage by the Blue-fronted Amazon in citrus plantations should be promoted.

References omitted for space reasons. Available from World Parrot Trust office. See back cover

PARROT WELLBEING Does it Deserve More Attention?

Catherine E. King, Biologist,
Rotterdam Zoo

After keepers in the bird department at Rotterdam Zoo and I, the bird biologist, furnished some of the parrot cages with fresh natural perching and thick ropes for the parrots to climb on, I was startled to see an article titled "Ape-caged Parrots" in the following issue of "The Nieuwsbrief" an informative, entertaining monthly newsletter put out by the volunteers at Rotterdam Zoo. Some experimental enclosure enrichment projects being undertaken with the parrots and use of rope as well as other cage furnishings were discussed; at the end of the article it was stated that "the disadvantage of large ropes in the parrot enclosures is perhaps that the enclosures now look a bit like primate cages"

It then occurred to me that perhaps evoking the similarity between these two groups of animals, primates and parrots, so far apart evolutionarily but actually very similar in habits and behaviour, may in fact be the best way to convince many people of the importance of providing parrots with a stimulating environment.

What parrots and primates really have in common

One does not have to delve very deeply into the biology of these groups to conclude that parrots and primates do indeed share many characteristics; in fact parrots can be considered "the primates of the bird world" (Birchall 1990). Parrots and primates have similar habitats, mostly living in dense forests, though a few species inhabit grasslands or other opener areas. The vast majority of species in both groups are arboreal and supremely

suitable for climbing; the zygodactylous parrot foot is especially adapted to this purpose. The parrot bill functions analogously to hands (but with a bit more bite), by which the bird pulls itself up while climbing.

Behaviorally they are quite similar, both being extremely social, bright and inquisitive creatures. Few primates or parrots are truly solitary, and many parrots as well as many primates remain in social groups throughout the year. Vision is a primary sense in both primates and parrots, and subtle displays involving colors and postures convey information among group members. The vocal abilities of both parrots and primates are memorable to anyone that has been anywhere in their vicinity when they are excited, and vocal intraspecific communication is extremely important. The majority of species are diurnal while a few members of each group are nocturnal. Both groups primarily feed on seeds, fruits, and other plant materials, though a few species are more carnivorous.

The impressive learning abilities of these groups has been well demonstrated by the amazing array of tricks that they can learn, as often proved historically (and presently) in animal shows. Recently, studies of performance of "object permanence" tasks in several species of parrots has more scientifically addressed these abilities in parrots (Pepperberg and Kozak, 1986; Pepperberg and Funk, 1990). Parrots and primates both have "tool using" members of their taxa. Parrots use their feet to handle food items just as primates use their

hands (and sometimes feet) for the same purpose. Both groups delight in manipulation of objects, and their destructive tendencies as they exuberantly explore their environments is well known.

Unequal emphasis in wellbeing of primates and parrots

In short, these groups are quite similar and in fact many of the enrichment ideas that are used for primates in captivity can be applied to parrots. For example, neither type of animal actually uses rope in its natural environment, however in both cases rope makes a very good substitute for natural climbing materials that they would have. One could as easily turn the above quotation around and say that a disadvantage to putting ropes in a primate enclosure is that it makes it look like a parrot enclosure.

The only reason why it would seem ridiculous to people to make such a statement is that the wellbeing of primates has been receiving a great deal of attention for some time, while that of parrots, or any other bird group for that matter, has not. Why this is the case is mystifying, considering that parrots are also very playful animals, and are generally quite popular with people. In fact, parrots do have the same emotional demands and tendency to get bored that primates have. Stereotyped behaviors, and self mutilation (feather plucking and much worse) are well known for captive parrots whose psychological needs are not met.

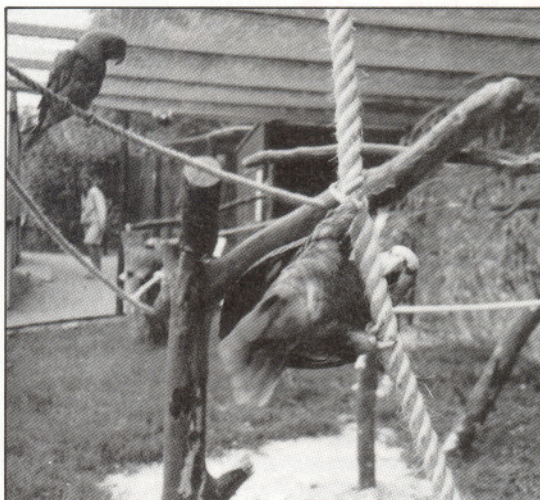
Environmental enrichment ideas

There are a number of ways to

enrich the environment for parrots, of which natural-fiber rope is in reality one of the best: it is durable, it is not dangerous, thick rope can be used for climbing and perching and for grooming (as discovered with the Palm Cockatoos at Rotterdam Zoo – when provided with rope they rub the bare facial patches against this material frequently), while thinner ropes (1 cm or larger in diameter, depending on chewing habits of the individual parrot) can be used to hang pieces of wood, branches or other objects from, forming a multipurpose structure that can function for swinging, climbing, and chewing. It is also ideal from a keeper's point of view, it does not have contact with the substrate (thereby increasing difficulties in raking or sweeping), it does not cause a great deal of mess, and it is low maintenance; materials hung on the rope can easily be replaced.

Perching can be considered enrichment materials in the environment of parrots; despite the importance of proper perching to the physical and psychological wellbeing of parrots, perching is all too frequently unsuitable. Parrots should have perching available at different levels within the enclosure, and perching should have a variety of diameters and textures. This last point is true for other birds as well, not only for psychological wellbeing but also for physical wellbeing: bumble foot, a common foot problem in all sorts of birds is often associated with inappropriate, too regular perching). Natural tree branches with a bark that is not too smooth or too hard, and with a number of horizontally oriented limbs, make the best perches.

Safe, inexpensive enrichment possibilities are only as limited as the imagination. Anything that is safe for the birds to chew on can be used: willow or other non-poisonous branches, non-poisonous weeds or other plant materials, blocks of soft wood, cardboard boxes, paper-towel and toilet paper rolls, paper cups and egg cartons, canning jar lids, cleaned stones and large keys on a safe keychain are just a few possibilities. Rolled up newspaper pushed through the cage wire so that it fits tightly, so that a parrot can perch on and chew on it is a favourite of some birds. Chew toys suitable to dogs, such as rawhide bones, are also often suitable to parrots (pers. obs., C. Falzone pers.





Planting parrot aviaries would undoubtedly enrich their environment; the problem is that most parrots destroy vegetation unless the aviary is very large and well planted.

comm., Murphy 1992, Seville 1990, Sun 1992).

Other enrichment items include well known foods that take some time to eat, such as whole nuts in the shell, pieces of corn-on-the-cob and pomegranates. Hiding food items or putting them in difficult to reach places can also interest a parrot. This can range from methods as simple as putting peanut butter, cranberries or raisins in a pine cone to more complicated tactics such as drilling holes in pieces of wood and dropping nuts or other food items that do not easily spoil or mould in these (pers. obs., D. Blomjous pers. comm.,

Seville 1990).

Just as for primates, changing of enrichment materials so that they do not become bored with "the same old thing" can be very important. Birds not used to receiving enrichment materials may not initially show interest, or may even be slightly afraid of the new element in their environment, and materials should be presented in a non-threatening manner. Where materials are placed within the enclosure is indeed important in the birds acceptance of them. For example, when initially introducing birds to enrichment materials it is senseless to place these on the

ground if the birds spend all their time 2 m high in the cage. Seville (1990) recommends hanging toys just within reach of birds, but so that they have to stretch to get it, as a way to catch a bird's interest. Even if the birds do not show interest in an item initially, it may well be that it will later be one of their favourite toys.

The safety of items used should always be considered, and parrots have never failed to amaze with their adroitness at opening, pulling, unscrewing or otherwise undoing things. Items that the bird can get entangled in such as string, or can catch its band or its bill on, such as metal rings that the bird can open should not be used. Sharp objects, or materials such as glass, most plastics and thin wire that can be broken and swallowed are of course not suitable.

Costs and benefits of parrot environmental enrichment

An added bonus to providing an "enriched environment" may be an improvement in breeding success, as graphically demonstrated in an experiment in the Avian Sciences Department at University of California at Davis (Brice 1992). Of course, providing enrichment materials to parrots takes just as much time as it does for primates. But, if it is judged to be important enough to make that time for primates, it should also be likewise considered that important for parrots. If suitable items are used, a

good program need not take more than an average of a few minutes a day per enclosure. Taking good care of any animal costs time, but in parrots this is richly rewarded by the pleasure that they, their keepers, and in the case of publicly held birds, the visitors, will receive from the enrichment materials.

Citations

- Birchall, A. 1990. Who's a clever parrot then? *New Scientist* 24 (February): 38-43.
- Brice, A.T. 1992. Psittacine research project: Parrot Research in the lab and field. *AFA Watchbird* 18(6): 4-7.
- Murphy, J.J. 1992. Breeding the Goffin's Cockatoo. *AFA Watchbird* 18(6): 37-39.
- Pepperberg, I.M. and M.S. Funk. 1990. Object permanence in four species of psittacine birds: an African Grey Parrot (*Psittacus erithacus*), an Illiger Mini Macaw (*Ara macacana*), a parakeet (*Melopsittacus undulatus*), and a cockatiel (*Nymphicus hollandicus*). *Animal Learning and Behavior* 18(1): 97-108.
- Pepperberg, I.M. and F.A. Kozak. 1986. Object permanence in the African Grey Parrot (*Psittacus erithacus*). *Animal Learning and Behavior* 14(3): 322-330.
- Seville, B. 1990. Safe Christmas toys or gifts for birds and bird-owners. *Bird World* (Nov/Dec): 7-8.
- Sun, L. 1992. In a A Family way (tips from one bird lover to another). *AFA Watchbird* 18(6): 55.

PHILIPPINE COCKATOO HEADING FOR EXTINCTION?

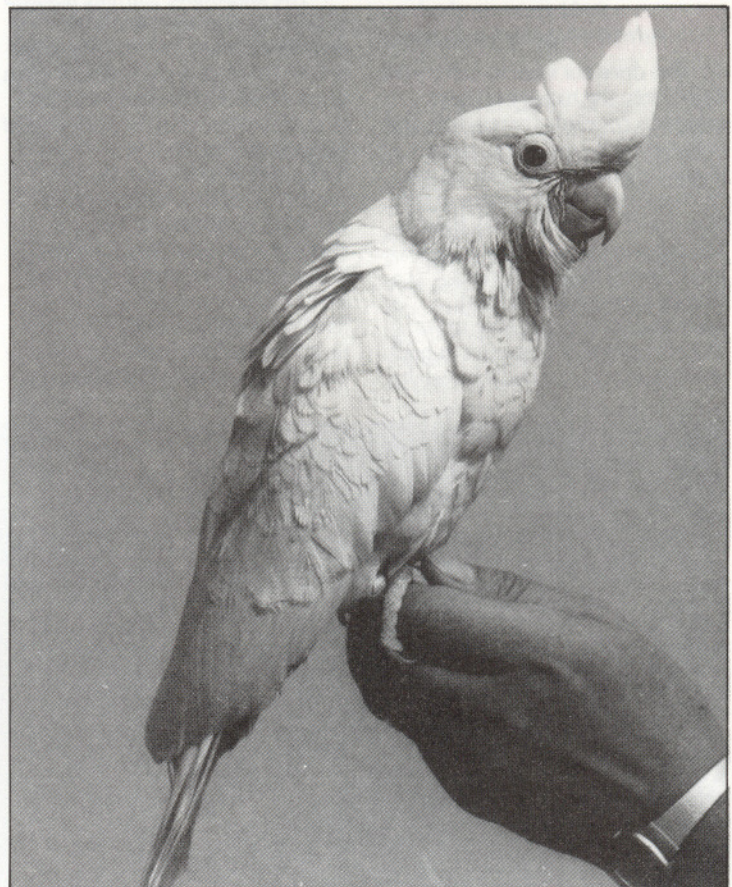
by Rosemary Low

Field work carried out in November and December of last year in the Philippines confirms the worst fears regarding the status of the Red-vented or Philippine Cockatoo (*Cacatua haematuropygia*). Its decline has been so rapid that Roland Wirth (of the Zoological Society for the Conservation of Species and Populations) informed me in February "...EVEN THE SHORT TERM SURVIVAL OF THE SPECIES IS IN QUESTION."

Deforestation in the Philippine Islands has been among the most

extensive in the tropics, in recent years. This was the original cause of the species' decline. Now it is trapping which threatens its existence. Roland Wirth states: "The few remnant populations are now mostly located in areas not immediately threatened by massive destruction (though logging remains a problem to some extent). However, Frank Lambert, who looked for the cockatoo on behalf of IUCN in November/December 1991 clearly confirms Blas Tabaranza's view that trapping for the bird trade is now the main threat.

"Every single nest located by Frank was already guarded by a



Captive-bred Phillipine Red-vented cockatoo. Photo: Rosemary Low.

trapper to remove nestlings. In fact, due to the rarity of the species the trappers now also usually remove one of the adults (which they did not do formerly) by placing a sack in front of the nest entrance during the night. Some of the trapped birds go to Japan illegally on freight and fishing boats, others are traded in Manila, and some have come to Europe in recent years, before the EC banned importation of this species.

"With an estimated population of just 1,000 to 4,000 birds (and the high chick mortality after removal from the nest) even fairly small scale trade can now wipe out the species. There is also the fear that we now have an ageing breeding

population, as nearly all chicks seem to have been removed for the last one or two decades."

The wild population is now critically endangered. Alas, the captive population has not fared well. Attempting to establish this species has been beset by problems because of the species' susceptibility to aspergillosis and psittacine beak and feather disease. Losses with females have been especially high. (It has been stated that aspergillus spores have been found in nests in the wild.)

Large consignments of Red-vented Cockatoos did not reach Europe where this species has always been rare in collections. I believe it is being bred in few

collections. This is surely a species for which a STUDBOOK IS URGENTLY NEEDED. It is extremely important that single birds are identified and paired up, where possible. Fortunately, this species is very easy to sex as the iris is black in males and red-brown in adult females.

Inevitably, in Europe and the USA there must be Red-vented Cockatoos kept as pets, perhaps by people who are not even aware of the name of the species in their possession. Aviculturists could help to get these birds into breeding situations by offering to exchange those which are not tame for hand-reared young of another species. Understandably, many people are

reluctant to part with their pet birds—but it is vitally important that as many wild-caught birds as possible should be identified now, to strengthen the small gene pool. None of these birds will have been recently imported thus their long-term survival and breeding prospects should be good.

If it is possible to pair up some of these genetically precious Red-vented Cockatoos, it goes without saying that they should be in the hands of aviculturists or zoos who are interested in the preservation of the species. This means obtaining parent-reared young, if possible, and ensuring that they remain in the hands of breeders.

POSITION STATEMENT ON THE WILD LIVE BIRD TRADE

INTERNATIONAL COUNCIL FOR BIRD PRESERVATION

Background

As the world's leading bird conservation organisation, ICBP recognises and subscribes to the principles of the World Conservation Strategy. A cornerstone of this strategy is the concept of sustainable development, which recognises the potential benefit to be derived from natural resources for the welfare of people, but also emphasises the importance of keeping any utilisation within prudent limits.

Birds have been traded as an economic resource for centuries. They have been caught and sold for pets, trapped for food, adorned the ceremonial dress of indigenous peoples and transported thousands of miles to be placed on show in zoos where they provide a valuable scientific, recreational and aesthetic resource.

Evidence now suggests that in many instances the trapping of live birds for trade has been and continues to be excessive. In numerous cases, exploitation of wild birds is clearly not sustainable and threatens the survival of populations and species. In the light of this ICBP has adopted the following position on the live bird trade.

Position Statement

ICBP's position on the live wild bird trade recognises both the economic value of birds – especially to developing countries and

indigenous peoples – and the threats to birds stemming from inadequate conservation, welfare and legal controls. This is reflected in the following points which will guide the course pursued by ICBP in its efforts to reduce the threats to birds posed by trade.

1. ICBP advocates a stringent procedure for the control of species that are traded. At present, most species of birds are allowed in trade until it can be proved that harvesting is a threat. Instead, a system should be instituted whereby any species that could possibly be adversely affected by trade is excluded from it unless it can be shown scientifically that the consequences of harvesting are not detrimental to the population and the ecosystem it inhabits. This is a key measure to ensure that the live bird trade is conducted in a sustainable manner.

2. ICBP promote the enforcement of Article IV of CITES. In accordance with this Article of the Convention on international trade of endangered species ICBP wishes to ensure that Scientific Authorities limit the trade in CITES Appendix II species so as to "maintain that species throughout its range at a level consistent with its role in the ecosystems in which it occurs and well above the level at which that species might become eligible for inclusion in Appendix I". If insufficient information exists to make this affirmative finding, trade should not be allowed.

3. ICBP seeks to reduce mortality of birds in transit. Such controls should be vigorously enforced and checks financed by trade interests. In addition, levies should be paid on imported wild birds to decrease the cost differential that currently exists between wild-caught and captive-bred birds. Both of these measures would stimulate the market in captive-bred birds.

4. ICBP will campaign for the better control of illegal trade. Illegal trade is a major threat which undermines all efforts at the promotion of sustainable trade. ICBP will pursue a policy that promotes the effective enforcement of national and international trade controls.

Very few countries or trade interests are actively pursuing a policy that is aimed at securing the sustainable utilisation of birds harvested for trade. Consequently, many conservation organisations are now lobbying for total bans on the import of birds into developed consumer countries such as the U.S. and the U.K. Also, many supply nations – frustrated by the depletion of their wildlife from over-exploitation and illegal trade – have instituted wildlife export bans. Considering the emerging lobby for a total ban on the live bird trade, both dealers and trading nations should undertake to pursue the objectives of ICBP and demonstrate that utilisation is *sustainable*.

Within this framework it is vital to consider the following points before passing judgement on any specific case in the trading of wild birds:



The Moluccan Cockatoo faces an uncertain future in aviculture, due principally to capture for the wild bird trade. Photo: Rosemary Low

1. The conservation of biodiversity. Many species – especially those which are in great demand, naturally scarce or which occupy only restricted ranges – have become rare, endangered or even extinct as a consequence of over-exploitation.

2. Welfare considerations. A high level of mortality and suffering is caused to wild birds during trapping, holding, transport, quarantine and captivity. This aspect of trade is unacceptable for all species and is particularly worrying with regard to CITES-listed species. The forceful implementation of transportation and transit regulations is essential; the excessive mortality of these birds undermines sustainable utilisation.

3. Illegal trade. Illegal trade frustrates attempts at rationalised utilisation and could soon result in

the extinction of many species. Governments, decision-makers, and law enforcement agencies often attach a low priority to crimes committed in relation to wildlife trade law.

BANNING THE TRADE IN WILD BIRDS: THE RSPB VIEW

by Mike Everett R.S.P.B.

Last year, the Royal Society for the Protection of Birds, the Royal Society for the Prevention of Cruelty to Animals and the Environmental Investigation Agency launched a major campaign calling for a ban on the trade in wild birds in the European Community. The campaign has had a lot of publicity, and has gained the general support of the World Parrot Trust and similar organisations, but is still

causing concern to some aviculturists.

There is no attempt here to outlaw aviculture. The main thrust of the campaign is directed at bringing an end to the trade in wild-caught birds and towards persuading aviculturists that virtually all their needs should be met from captive stocks. As such, it has already attracted wide support; it is perhaps pertinent to mention here that similar moves in the USA have now persuaded the pet trade there to support legislation which will phase out the importation of wild birds.

Recent investigations by the three organisations, carried out in Africa, South America and South-east Asia, have shown that the problems of cruelty and of widespread abuse (and downright flouting) of existing laws are even worse than originally believed. Corruption is rife in some quarters and the enforcement of existing

legislation either non-existent or wholly ineffective. Above all, perhaps, the studies have revealed the full conservation implications of an uncontrolled trade which has little or nothing to do with the sustainable exploitation of a natural resource, nor, in reality, with providing a livelihood for local people. Instead, it has directly threatened the survival of over 40 bird species – 30 of them, all faced with extinction, are parrots. The trade has been directly responsible for the effective extinction of two parrots already – Spix's Macaw in Brazil and the Red Lory in Indonesia. Some of the statistics of the trade reveal an appalling situation. The EC, for instance, is the largest consumer of wild-caught birds in the world; some three million birds are imported annually and, such is the mortality rate after capture, these probably represent only *half* the numbers originally trapped.

The RSPB believes that a ban in the EC will make a positive and very substantial contribution to the future of many threatened species. Nevertheless, the Society has always recognised that there may be exceptional circumstances in which limited importations could be allowed, under rigorous control. The three kinds of situation where a ban might be relaxed are:

where it can clearly be shown that there are positive conservation benefits for the species or populations concerned;

where very limited numbers are imported for an aviculturist with considerable experience of similar species, to establish a captive bred stock when stock is not available from captive sources elsewhere;

and where limited numbers are imported for an aviculturist who can show that this is necessary to maintain the viability of a captive-bred stock, where this can only be achieved by using wild-caught birds.

No. 6 IN OUR SERIES

"If I could keep only one pair of parrots..."

by Jan Roger van Oosten
(Conservation Chairman,
International Loriinae Society)

What a question to ask an aviculturist! After going over all the pros and cons I finally cut the field down to only two families; the fig parrots and the Loriinae. Now the selection became even tougher, because I maintain species from both families and they are co-favorites with me. After considering everything I finally decided that I would choose *Vini ultramarine*, the Ultramarine Lory, a beautiful species from French Polynesia, found only in the Marquesas Islands, in the South Pacific.

This magnificent lory has plumage of various shades of blue (my favorite colour) mixed with white, which shimmers in the daylight. It is small, about 7 in (18 cm). If available, they could and should be maintained in a planted aviary and that would make for a truly lovely display.

Lories are such wonderful subjects to observe. They are always doing something and in many ways they are more "lovebirds" than lovebirds. They will play for hours with anything you give them from a piece of fruit to a plastic ball or a wooden "tree" hung

from the top of their cage. In addition their colours are vibrant and have all the colours of the rainbow. They are easy to care for, accepting nectar and fruit. Lories are steady parents and while on the nest will come out to see who has arrived and if they know the person, back they go to their duties. With all these attributes who could ask for anything more!

The other reason I would love to maintain the Ultramarine Lory is that it has become rare in its island home. Its decline has been caused by deforestation, by introduced animals such as rats and cats, and by man. At the 1st International LORIINAE Conference I had the opportunity to meet and speak with Roland and Julia Seitre who spent several years in French Polynesia researching the fauna and flora of the area. Based on what I learned from them the Ultramarine Lory does have a future. That future will however, rest in the hands of man who must make and carry out the recommendations and the decisions that will save the species. It may sound easy but it is not and it will cost money.

It has been suggested that these birds should be captive bred; however, at this point in time I do not see any justification. Based on the recommendations made by the



Jan van Oosten with the award – a model of an Ultramarine Lory – with which he was presented by the ILS in 1991.

Seitres it would be better to trap birds and place them on small islets that are free from rats and cats and let them build up their population there only. Then would it be desirable to set up a captive breeding programme for the species. Such a programme should include a breeding group on one of their native islands and should also be used to educate the Marquesians of the value of conserving their fauna and flora. If any birds were ever sent outside the islands, they should be shared between zoological institutions and a few selected breeders.

All individuals would be maintained in a studbook. In no circumstances should all the birds be given to one institution/individual because of the possible chance of a disease killing the entire group. Although many consider this

species difficult to breed, I believe that the opposite is true. These birds require a spacious area and it should be planted. I base this on many years of observation of the Tahiti Blue Lory at the San Diego Zoo. A proper diet and a proper facility would make reproduction much easier. Once the species has been well established in captivity the next step can begin.

I believe that captive-bred lories could be returned to the wild with a high rate of success. It is well known that in areas where human populations have expanded the limits of a city, lories and lorikeets seem to thrive and increase. This is mainly due to the planting of flowers and trees from which the birds obtain their nourishment. The Ultramarine Lory may be a symbol of what aviculturists can do. But until we try, we will never know.

BOOK REVIEW

The Lexicon of Parrots must surely be the most ambitious publication on parrots this century for it aims to illustrate every species and sub-species – all with colour photographs. When complete it will therefore be the most valuable parrot identification guide in existence. To be issued in six or seven parts, each will consist of 92 pages. To date, the first part, including binder and slip case, and the second part, are available. The format is loose-leaf.

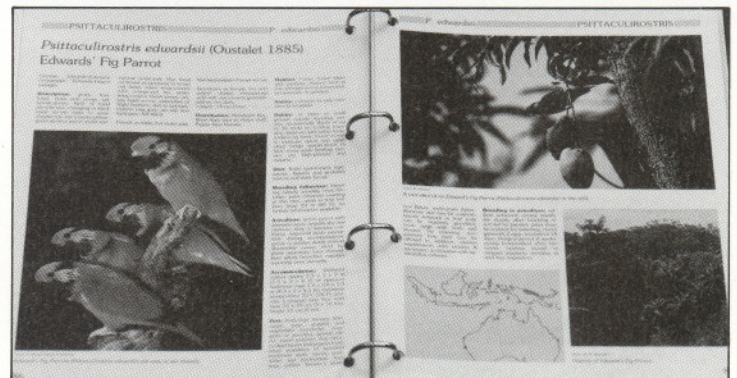
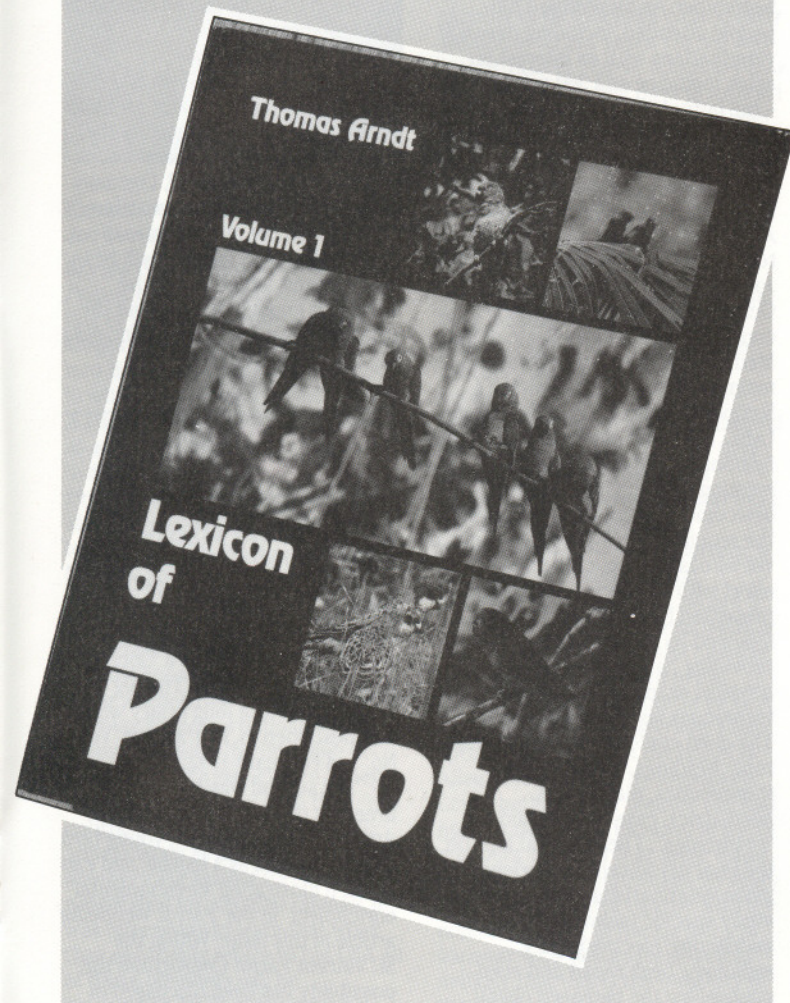
The author is Thomas Arndt, well-known German avicultural author and editor of the excellent magazine *Papageien*. His concise text provides information for each species under the headings of Description, Distribution, Habitat, Status, Habits, Natural diet, Breeding behaviour, Aviculture, Accommodation, Diet and Breeding in aviculture. Description and Distribution for every sub-species is also given.

Each entry varies in length from one to four pages; the number of illustrations varies accordingly. Most of the photographs are excellent; some entries include illustrations of habitat which will be of great interest to many readers.

This publication is a veritable treasure trove of parrot photographs which will provide hours of enjoyment, especially to those interested in the rarer species and sub-species which are seldom depicted in books by photographers. Thomas Arndt is to be congratulated on tracking down many of these. Never before, for example, have I seen a photograph of the Tres Marias Parrotlet (*Forpus cyanopygius insularis*). Illustrations of some common species are notable, such as that of a pair of Dusky Lorries at their nest in Papua/New Guinea. The distribution map for each species is another useful feature.

The overall cost of this publication will be at least £140 – but as the parts are issued at intervals, this will be acceptable to many. The high quality of the paper (an expensive item) ensures first class reproduction of the many photographs.

The Lexicon is also available in German. It can be obtained from Verlag Arndt und Müller, An der Warnau 33, 3036 Bomlitz, Germany, or, in the UK, through the Parrot Society (108b Fenlake Road, Bedford MK42 0EU). – R.L.



LETTERS TO THE EDITOR

Members write . . .

From:–
Mrs Luciana Parazzi Basile
P.O. Box 95644
Mombasa
Kenya

5th May 1992

Dear Sirs,
Enclosed please find my cheque for renewal of subscriptions, together with reorder form for "Who's A Lucky Boy, Then?".

I just wanted to bring to your attention that here in Kenya, a lot of African Grey parrots are brought in illegally from Zaire, Congo and Uganda. The majority of these parrots are extremely young, they are brought into the country under terrible conditions, i.e. squashed in transport lorries etc., and many do not survive. The KSPCA (Kenya Society for the Protection and Care of Animals) does do a lot to try and save such parrots, but there are many unscrupulous vets and others who purchase and deal with these

young birds.

I was wondering whether your organisation could in some way assist in trying to curb such an awful trade, or advise which ways we could go about it. The worst hit areas in Kenya are, I think, Nairobi the capital city, Mombasa and the towns bordering with Uganda and Tanzania.

I thank you and look forward to receiving your comments.

Yours faithfully,
Luciana P Basile



INTERNATIONAL NEWS ROUND-UP

ASSOCIATION OF AVIAN VETERINARIANS ANNUAL CONFERENCE 1991

Report by Andrew Greenwood, M.A., Vet. M.B., MRCVS, International Zoo Veterinary Group.

The 1991 Annual Conference of AAV was held outside Chicago in September. An incredible 1200 people attended, including over 600 veterinarians with an interest in avian medicine and 300 aviculturists – the latter having a separate seminar on the final day. About 20 veterinarians from outside North America were present, including Australians, Europeans and Latin Americans. Besides the usual city tours and visits, which included the John G. Shedd Aquarium and Oceanarium, the programme consisted of a one day Basic Avian Medicine Symposium, a three day main conference, a Technician's Symposium and a day of Practical Labs. The Basic Medicine Symposium, which starts the meeting off every year, is aimed at newcomers to the field and covers the requirements of the small animal vet who is interested in making an effort with the birds which might be presented to the clinic. This was followed by an evening session providing hands-on experience in physical examination and basic techniques such as tube-feeding. The main conference was split into topic headings, including therapeutics, diagnostics, paediatrics, case reports and 'syndromes'. The practical labs on the final day allowed experienced avian veterinarians to practise and study specific techniques such as endoscopy, electrosurgery, radiology, beak repair and even counselling the bereaved client!

Much of the ground covered at the conference has been covered before, or consisted of an up-date of ongoing work, and there was considerable complaint from European delegates, who tend perhaps to take a more academic approach to the subject, that the benefits for the experienced avian vet are diminishing annually. The Association seems to be taking its evangelical role, to teach avian medicine to as wide a range of general practitioners as possible, very seriously but at the expense of deepening the scientific basis of the discipline. The new President, Don Harris, has promised to try to redress the balance. Nevertheless there were some fascinating papers of lasting value amongst what some christened "ephemeral avian phenomenology". Particularly promising is the work into producing new diagnostic tests and, perhaps, vaccines for polyomavirus

and beak-and-feather disease using DNA technology. As usual David Graham's group at Texas A & M University and Branson Ritchie's team at the University of Georgia are leading this work. New diagnostic information was demonstrated using ultrasound and CT scanning techniques together with various laboratory methods which are being transferred from the human and small animal fields. Non-psittacine birds got an occasional look-in, with an interesting study of iron-storage disease in toucans and an outline of ratite medicine.

Despite its obvious shortcomings, AAV still leads the field in avian medicine and probably always will. It is now probably the largest specialist veterinary organisation in the world. Certainly it is a must for anyone seriously interested in the medical care of parrots. The next meeting will be in New Orleans, which should be attraction enough in itself, and the next European AAV Chapter meeting will be next March in Holland.

AWARDS FOR PARADISE PARK

A lack of modesty allows us to report that Paradise Park, home of the World Parrot Trust, has been given two awards by the National Federation of Zoos.

The first of these is a 'Good Husbandry' award for 'The Big Flight', a 150 foot long aviary which was described in 'PsittaScene' Vol. 4 No. 1 of February 1992.

The second was for the first UK breeding of the St. Vincent Parrot *Amazona guildingii*. This young bird has been sexed as a female, and can be seen illustrating 'environmental enrichment' in the 'Parrot Wellbeing' article in this issue. Within the St. Vincent Parrot Consortium the possibility has been discussed of sending a young male bird, bred in the Government aviaries on St. Vincent, to be paired with the Paradise Park bird.

Alternatively, the young female may be sent home to St. Vincent. We'll keep you posted.

AUSTRALIA

In March Rosemary Low gave a short presentation regarding the Trust to more than 200 people who attended the one-day convention staged by Macquarie Fields and Districts Avicultural Society. She also raffled the Trust's Hyacinthine T-shirts and some of her own books to raise funds. Hopefully, this will result in increased membership in Australia where the membership total is low.





Major Mitchell's or Leadbeater's Cockatoo. The broad band of yellow in the centre of the Crest shows this to be a female.

COOK ISLANDS, PACIFIC

The status of some of the small, exquisite *Vini Lories*, all of which are found on small Pacific islands, gives cause for grave concern. A number of factors have caused their decline in recent years. On her way to Australia in March, Rosemary Low spent two and a half days in Aitutaki in the Cook Islands, the only island of the group on which the Tahiti Blue Lory (*Vini peruviana*) is found. (It is extinct on Tahiti and now occurs elsewhere probably only on Scilly and Bellingshausen, and on Rangiroa in the Tuamotus). On Aitutaki, which measures only 7km long by 3km, it is apparently widespread although not in large numbers. Being very vocal, however, they are easy to locate. What a joy it is to see this wonderful little lory in the wild! With its dark blue and white plumage, and orange-coral coloured feet and beak, it is surely one of the most unusually coloured of all parrots. It flies quite high and fast and frequents coconut palms, where it feeds on the flowers. It also feeds in banana plantations – unfortunately – as the nectar or pollen of the banana flower is a favourite food. A lady who has been observing this species all her life on the island is Aileen Blake. Asked by Rosemary Low whether in her lifetime she had noted a decline or increase in its numbers, she said that there was a decline, which commenced 20 years ago. This coincided exactly with the commencement of the spraying of bananas with pesticides. It seems unlikely that this is the only lory of the Pacific which has been affected in this way. The Editor would be interested to hear from anyone who has evidence of declines in lory populations on other islands which may have been similarly affected.

Extract from a recent letter from Joe Forshaw:-

In view of the report reproduced in *PsittaScene* describing the miserable fine of £250 imposed on a person illegally importing *Amazona* parrots into Britain, you may be interested in what is happening in this country. A couple of weeks ago, I appeared as an expert witness for the Crown in a case against a 21 year old US citizen apprehended at Sydney airport while attempting to smuggle eggs of Galahs and Major Mitchell's Cockatoos from this country. Despite pleading guilty and co-operating with authorities, the defendant was sentenced to 18 months imprisonment, and the judge warned that this should serve warning to foreign nationals coming to Australia with the intention of interfering with our wildlife – they can expect no mercy from the courts! In two weeks time, I shall appear again as an expert witness in another case against US citizens prosecuted for a similar offence. It was interesting to learn that when they eventually return to the USA all of these offenders will be prosecuted by US authorities for breaches of the Lacey Act, so it seems to me that Britain and Europe have a long way to go to catch up with other countries when dealing with wildlife traffickers.



R. terrisi in captivity Sept. 1991.



Tahiti Blue Lory

Photo: Rosemary Low

MEXICO

Over the past couple of decades (or more) countless parrots have been smuggled across the Mexican border into Texas or California, posing a serious health hazard to parrots and other birds which have legally entered the USA and undergone quarantine. In the past most birds confiscated from smugglers which had entered the USA were sold at public auction. Who knows what happened to those which did not get across the border? Now, however, some will have the chance to be returned to the wild. Parrots confiscated on the Mexican side of the border are being rehabilitated by the Universidad Autonoma de Tamaulipas in Ciudad Victoria (the state capital). It is planned to release them in a "safe habitat" area in Mexico. This project is being supervised by SEDUE, a department of the Mexican Government and by CTSB, a Texas-based conservation organisation. Financial assistance has come from several avicultural societies. An aviary is under construction, hopefully a large one which will ensure that only birds with superior powers of flight will be released.

Looks like a Thickbilled Parrot *Rhynchopsitta pachyrhyncha*? Wrong. It's the even more rare Maroon-fronted Parrot *Rhynchopsitta terrisi*. So far as we know it's the only specimen in captivity, and was brought to Dr. Miguel Angel Gomez-Garza, a veterinarian in Monterrey, Mexico. The bird has a damaged wing and was being kept as a pet. It is not capable of being released back into the wild, and is now housed in an aviary.

Dr. Gomez-Garza estimates that there are no more than 600 Maroon-fronted Parrots left, while other experts believe the numbers could still be between two and three thousand. Either way, this species is in serious trouble, for the reasons discussed in our issue Vol.3 No. 3 of August 1991.

NEW ZEALAND TAKES PART IN INTERNATIONAL BIRD SMUGGLING BUST

A report from New Zealand Customs

Enforcement agencies in New Zealand, Australia and the United States of America joined forces today to smash a major international bird smuggling ring operating in all three countries.

In a concerted and simultaneous operation, approximately 100 special agents of the US Fish and Wildlife Service, 45 New Zealand law enforcement officers and officers from Australian enforcement agencies executed warrants and seized large quantities of records and live wildlife allegedly smuggled across US and New Zealand borders and dealt with by means of false documentation and complex laundering schemes.

The New Zealand side of the operation was spear-headed by a special government Task Force comprising specialist enforcement officers from the Customs Department, the Department of Conservation and the Ministry of Agriculture and Fisheries.

In New Zealand, search warrants were executed at properties in Auckland, the Waikato, the Bay of Plenty, and Taranaki. Many rare birds, mainly parrots protected under the Trade in Endangered Species Act, have been seized and taken to a secure location pending Court action here and in the United States. 2 New Zealanders have been arrested in the United States in connection with the alleged smuggling.

The co-ordinator of the New Zealand side of the operation, Mr Kevin Knowles of the Customs Department, said the scope of the operation – codenamed "Bavin" – was unprecedented in New Zealand's efforts to combat wildlife smuggling, not only because of the extensive inter-agency and international co-ordination required but also in the painstaking compilation of intelligence on the offenders and their modus operandi.

UNITED KINGDOM

The following proposal was adopted at a meeting in March 1992 of the Parrot Group of the National Federation of Zoos:-

PROPOSAL – Anyone convicted of stealing or handling stolen birds after 1st January 1992 will be banned from participation in Joint Management Breeding Groups and from being eligible to enter their birds in any stud book.

DEFINITION OF STEALING

1. Birds, taken from aviaries without the owners consent.
2. Birds taken from their country of origin without the necessary consents from the authorities of that country and therefore not having the correct paperwork.

A quote from world-famous photographer David Bailey: "I don't particularly like children. I prefer parrots. Parrots are more intelligent than most babies I know." (*Daily Express*, April 10 1992).

David Bailey has kept parrots for many years – and continues to do so.

UNITED STATES

Reprinted from **AFA in brief**

CITES Update

AFA attended the recent CITES Meeting of the Parties as an NGO (Non-Governmental Observer). The meeting was held March 2-12 in Kyoto, Japan. Among the actions taken at this meeting, both the Goffin's cockatoo and the red-vented cockatoo were moved from Appendix II to Appendix I, ending international trade in these species. There were also proposals to move both the blue-streaked lory and the Blue-fronted Amazon from Appendix II to Appendix I, but neither of these proposals passed. Argentina, however, announced a temporary export quota of no Blue-fronted Amazons until field studies currently in progress are completed. The trade moratorium proposal presented by the United States was soundly rejected. Interestingly enough, the trade moratorium proposal was opposed not only by exporting countries but also by major conservation groups such as IUCN (International Union for the Conservation of Nature), World Wildlife Fund and TRAFFIC, the worldwide trade-monitoring organization. The conservation groups felt that counting on captive propagation to meet the demands of trade would not always be in the best interests of wild populations,

as this would in many cases destroy the economic incentive to preserve habitat and thus wild populations. Recommendations were also made regarding the tracking of shipping mortalities, though more restrictive shipping rules were not adopted. The next meeting, the Ninth Meeting of the Parties, will be held in the United States (possibly Florida) in the fall of 1994.

Legislative Update - Federal

Both HR2541, the *Exotic Bird Conservation Act of 1991* and HR2540, the *Wild Bird Protection Act of 1991* are dead. These are the competing bills introduced last year, HR2541 by the Cooperative Working Group and HR2540 by Defenders of Wildlife and HSUS. The end of these two bills does not, however, mean all is quiet at the federal level.

US Fish and Wildlife Service is preparing a new bill for introduction. At press time this new bill is still in the Office of Management and Budget, and AFA is awaiting an official copy of the bill and notification of when hearings will occur. AFA has reason to believe this new proposal will be far less oriented toward aviculture than was last year's HR2541, among other differences the new proposal will not provide access to breeding stock. AFA continues to watch this situation and will provide more details when available.

Green-cheeked Amazon Update

AFA is now seeking applicants to participate in a green-cheeked Amazon breeding consortium. The application form is available from Project Coordinator Ron Holtz, who can be reached at (602) 982-2125. This program is designed and will operate like the AFA Red Siskin Consortium. Participating breeders will receive AFA-owned birds and offspring will be evenly divided between the participant and the Consortium. The population will be managed as a whole to ensure maximum genetic diversity for the longest possible period of time.

Computer-age advances continue to benefit birds owners. A Colorado-based company have instigated a computer bulletin board which provides information to USA residents for a subscription of \$35 per year. It offers a wide range of subjects: avian medicine, behaviour, nutrition, hand-rearing and incubation, free listing of lost and stolen birds, and even information on conservation. More details can be obtained from The Bird Info Network, P.O. Box 632, Arvada, Co 80001.

AVIAN RESEARCH FUND SEMINAR, CALIFORNIA

Our thanks to Edla Emberg, one of our members in the U.S.A., who kindly attended this conference on behalf of the World Parrot Trust. She organised a sales and information table, talked to many people about the work of the trust, and gained several new members. Total sum raised was \$542.00.

ASSOCIATION OF ILLUSTRATORS PARROT EXHIBITION: LONDON: JULY 28TH TO AUGUST 7TH 1992

Don't miss this special event! Keir Wickenham, a WPT member, will be raising funds for the Trust at an event called "The Big Squawk" – an exhibition of parrot illustrations, models, mobiles and information.

There will be an auction of paintings on the last day and prizes presented by a representative of the World Parrot Trust. The Exhibition is at the Association of Illustrators Gallery, 1 Colville Place, London W1P 1HN.

THANKYOU

Many members responded immediately to our request for help in distributing the Parrot Welfare Leaflet "Who's A Lucky Boy, Then?". We are very grateful for your support and enthusiasm. We have already distributed about 20,000 and are still completing further orders.

THE WINNER OF THE HOLIDAY FOR TWO IN ST. LUCIA was Mr. R. Hill of Swindon, Wiltshire

Other Prize Winners of Gift Vouchers to a Homeware Store and Supermarket were: W. Welsh, Buckingham; D. Jeffery, Guernsey; J. Ruse, Sidcup; E. Painter, Bourton-on-Trent; P. Robinson, Hemel Hempstead; S. Gallivan London; R. Parsons, Sunderland; F. Gammond, Mansfield; S. Riley, Southampton; F. Morgan, Exeter; S. Wolfe, Scunthorpe; R. Berts, Wigan; G. Cox, Jersey; A. Jones Dyfed; G. Hogg, Blackpool; H. Clark, Reading; F. Smith, Charlton; W. Welsh, N. Marston; N. Griffin, Westbury; P. Reed, Guernsey; G. Brockwell, Sutton; J. Strickland, Liphook; R. Parker, Penzance; C. Baweman, Kidlington.

ATTENTION PARROT

WORLD PARROT TRUST LETTER TO DEPARTMENT OF THE ENVIRONMENT



Trust members may be interested to see the following letter sent recently to the DOE

Ms. Susan Carter
Deputy Head
Wildlife Division
Department of the Environment
Room 907
Tollgate House
Houlton St.
Bristol BS2 9DJ

6 May 1992

Dear Ms. Carter,

Re: Proposed Revision of EC Controls on the Wildlife Trade

This is in reply to your letter of 30 March 1992 asking for our views on this matter. We would like to make the following comments:-

1. The World Parrot Trust supports the strengthening of controls on endangered species of parrot. The provisions of the proposed Articles are onerous, but we anticipate that exemptions will be granted comparatively freely to assist the development of responsible zoological and avicultural breeding programmes. Where the primary objective of an applicant is commercial gain we anticipate that exemptions will not be granted.

2. The Trust takes the view that the preservation of parrot species and the welfare of individual birds are paramount considerations. Thereafter, the Trust is committed to the survival and wellbeing of psittacine aviculture. To facilitate these latter objectives, the Trust urges that the movement of Annex A and Annex B parrots between approved zoological and avicultural

institutions should not be obstructed. Such movements are essential to successful long term parrot conservation.

3. The Trust holds no brief for organisations or individuals who wish to use parrots as trading merchandise. We would like to bring to your attention a proposal we made in October 1989 in the first edition of our "PsittaScene" newsletter. This was that shipments of parrots be limited to 'ten per shipper, per species, per year.' We went on to say that this would perhaps be a means of maintaining aviculture while preventing birds being used as a trade commodity. We are anxious to see responsible aviculture separated, in the minds of officials and regulatory bodies, from commercial traders who have no regard for the conservation and welfare of birds. Five copies of this issue of 'PsittaScene' are enclosed - page 11, column 3 refers.

4. The Trust hopes that the cost of regulation will be kept as low as possible so far as private aviculturists are concerned.

Finally, I can confirm that the World Parrot Trust will publish this letter in its newsletter which will be available to the media, and that we agree that the Department may make our response available to Parliament and the public.

Yours sincerely,

Michael Reynolds
Hon. Director

Everyone is flocking to the
American Federation of Aviculture
17th Annual Convention
2 - 6 August 1992
Miami Beach, Florida



Miami Beach's Fountainebleau Hotel will be the place every aviculturist will want to be on 2 - 6 August 1992. We will have talks on every topic from canaries, budgies, cockatiels to doves, waterfowl and hookbills of every variety. Under the palm trees, you'll be able to network with America's finest aviculturists and participate in "hands on" demonstrations designed to give you first-hand experience at handfeeding and avian anatomy, with experts as your guide.

With the Florida Keys, Everglades and Miami Metrozoo nearby, it will not only be a "learning" experience but the vacation of a lifetime. With "perch space" limited, you'll need to make your reservations early. For additional information, telephone the AFA Business Office (602) 484-0931 or write AFA, P.O. Box 56218, Phoenix, AZ 85079-6218.

Parrot Studbook Keepers

Once again we publish a list of Studbook Keepers. All readers holding these species would do well to register their birds with the relevant studbook keeper.

The development of these vital studbooks is being seriously damaged by the non-participation of leading aviculturists. If they are as conservation-minded as they pretend, they will register their birds right away.

BLUE-EYED COCKATOO *R*
PALM COCKATOO *R*

*Dr. Roger Wilkinson, North of England
Zoological Society, Chester Zoo,
Caughall Road, Upton-by-Chester, CH2
1LH.*

GREEN-CHEEKED AMAZON *R*
LILACINE AMAZON

*Mark Pilgrim, North of England
Zoological Society, Chester Zoo,
Caughall Road, Upton-by-Chester, CH2
1LH.*

MOLUCCAN COCKATOO *R*

*Rob Colley, Pencynor Wildlife Park,
Cilfrew, Neath, Glam., S. Wales.*

GOFFIN'S COCKATOO *R*

SCARLET MACAW *R*

BUFFON'S MACAW *R*

RED FRONTED MACAW *R*

*David Woolcock, Paradise Park, Hayle,
Cornwall TR27 4HY.*

THICK BILLED PARROT *R*

*David Jeggo, Jersey Wildlife
Preservation Trust, Les Augres Manor,
Trinity, Jersey, Channel Islands.*

HYACINTH MACAW *R*

*Colin Bath, Paignton Zoological &
Botanical Gardens, Totnes Road,
Paignton, Devon.*

GOLDEN CONURE *I*

*Alan Lieberman, San Diego Zoo, PO
Box 551, San Diego, California, 92112-
0551 USA.*

GOLDEN CONURE *R*

RED-VENTED COCKATOO *R*

BLUE-STREAKED LORY *R*

*c/o The Parrot Society, 108b, Fenlake
Road, Bedford MK42 0EU.*

R = UK REGIONAL STUDBOOK

I = INTERNATIONAL STUDBOOK

RAFFLE

Special thanks to BILL STEWART of CLUB ST. LUCIA, in the Caribbean, who very generously donated a holiday for the winners of our U.K. Raffle. Bill's club offers very exclusive accommodation of a high standard, and we will be happy to send details to anyone who is interested in taking a holiday in the sun, with every prospect of seeing the St. Lucia Amazon Parrot.

AIMS OF THE WORLD PARROT TRUST

The objective of the trust is to promote the survival of all parrot species and the welfare of individual birds.

- 1 By educating the general public worldwide about the threat to parrot survival, and seeking their interest, concern and support.
- 2 By action to protect and preserve the natural habitats of parrots worldwide.
- 3 By gathering and disseminating information on the status of parrot populations in the wild and in captivity.
- 4 By advocating effective controls on the international trade in wild-caught parrots, and its replacement by captive-bred birds.
- 5 By encouraging co-operation in the breeding of parrots by aviculturists and zoological institutions, and better liaison between the captive breeding community and conservation bodies, with the aim of creating self-sustaining populations of endangered species.
- 6 By promoting high standards in the keeping of parrots as pets.
- 7 By encouraging research projects, i.e.: the veterinary care of parrots, and the preservation of genetic diversity.
- 8 By any other means that may be appropriate.

WORLD PARROT TRUST A Brief Progress Report

This charity was launched in October 1989 to work for the survival and welfare of the world's 320 species of parrot, of which 100 species are endangered. It is the only international organisation devoted exclusively to the parrot family. In its first 24 months it has raised over £120,000, and supported the following important parrot-related projects around the world.:

Australia: Red-tailed Black Cockatoo. Research to assist the survival of an endangered population of this spectacular Cockatoo in Victoria. A four year programme to which we contribute \$8,000.

Brazil: Spix's Macaw. Helping with the cost of an expedition to investigate the population status of this most endangered of all macaws. Only one remains in the wild. Our contribution: £2,000.



Brazil: Hyacinth Macaw. Field research into the breeding biology of this species, carried out by Dr. Charles Munn. A contribution of \$6,000. Also a donation of \$600 towards work carried out by a team of Danish biologists. Further contributions in hand.

Caribbean: St. Lucia and Dominica. Providing posters and badges for an educational campaign on St. Lucia: £2,500. Followed by our largest project so far, the purchase and conversion of 'conservation buses', the Jacquot Express, and the 'Sisseron Express'. These are very successful in promoting the preservation of the remaining forest where the endangered parrots live. Cost to the World Parrot Trust: approx £30,000.

Central America: Endangered Macaws. We supported the 1991 Honduras Workshop on Macaw Conservation and Management with a donation of \$600.

Indonesia: Endangered Cockatoos. We made a small contribution towards a British expedition to study and report on the Moluccan Cockatoo and other species, declining rapidly due to deforestation and trapping for the pet trade. \$500.

Mauritius: Echo Parakeet. Undoubtedly the world's rarest parrot. Only about 12 or 15 birds left in the wild. Captive breeding and other conservation measures being pursued by Carl Jones, known for his success with the Mauritius Kestrel and Pink Pigeon. The trust has provided general financial support, plus the cost of a four-wheel-drive vehicle (approx. £12,000, of which £2,500 was kindly donated by The Parrot Society). Total contributed to date: £20,000.

Mexico: Maroon-fronted Parrot. This is Mexico's most endangered parrot: perhaps no more than 600 still exist in a small part of the Sierra Madre. The Trust recently visited this area to assess the situation, and conservation measures are planned.

We hope you will agree that the above summary indicates a charity that is active and full of initiative and concern for its objectives. We urgently need the support of everybody who keeps parrots as pets or in aviaries, or who simply cares about their survival and well-being.

Michael Reynolds



YES I WANT TO BE A PARROT CONSERVATIONIST

Helping the **SURVIVAL** of all parrot species, and the **WELFARE** of every individual parrot.

Name Mr/Mrs/Ms _____
Address _____
Postcode _____

SUBSCRIPTION RATES (please tick)

- UK and Europe Single £15 UK and Europe Family £20 Fellow £250 (\$500) Overseas Airmail £25 (\$50) Surface Mail £18 (\$36)
- Additional donation £ _____

If you can afford to give more than the basic subscription rate your money will help us fight harder to save the parrots.

I enclose cheque/P.O. for £ _____ payable to The World Parrot Trust
OR Please charge my Access/Visa Ac/No.

Card expiry date _____ Amount £ _____ Date _____

Signature _____
OR better still, please sign this Banker's Order

BANKERS ORDER (UK only)

To: The Manager _____ Bank
Address _____

Postcode _____ Sortcode _____

Please pay The World Parrot Trust, the sum of £ _____
every month/year, starting on _____ (date), and
debit my account no. _____

Signed _____

Pay to The World Parrot Trust, A/C No. 91144022
Midland Bank plc, Exmouth, Devon EX8 1HF.
Please send to The World Parrot Trust, **NOT** to your bank.
The World Parrot Trust, Glanmor House, Hayle, Cornwall TR27 4HY, U.K.

The World Parrot Trust
Glanmor House, Hayle
Cornwall TR27 4HY, U.K.
Regd. UK Charity No. 800944
Tel: (0736) 753365
Fax: (0736) 756438

Psitta
scene