

SPRING 1988

Chester **ZOO** **Life**

This issue:

- European Zoos—what can we learn?
- '87 Photographic Competition results
- The last of the wild horses
- Père David's Deer—news from China

Chez Nous

WELCOME to 1988 and to the first edition of *Chester Zoo Life*. This will—like its predecessor *Chez Nous*—be a quarterly magazine, but with extra pages and features. Amongst the new features, we hope to have a correspondence page from members and friends. Obviously there will be the occasional letter of complaint and criticism, and we will publish these—within reason. What we really want to do is to give members the opportunity of communicating their experiences of wildlife, other zoos, and so forth, and of answering each other's questions. Letters about the history of Chester Zoo will be particularly welcomed. Letters for the summer issue should reach the Editor by 1st May.

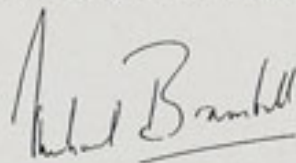
I would like to pay particular tribute to Bella Neate and Penny Rudd—particularly to Penny—who got *Chez Nous* going and kept up a very gruelling high standard. Bella left us some years ago now, but Penny will still be very much involved in the editorial work for *Chester Zoo Life*, especially the Junior Members' Section, which will retain its title of *Ju News*. The name *Chez Nous* has been dropped, as not everyone understood the light-hearted pun—based on excruciating French mis-pronunciation—that was behind it! It will be retained as the heading for this column.

It is too soon to be able to announce the financial result for 1987, but I can tell you that, during the year, 129,480 more visitors came to the zoo than in 1986—a figure only exceeded once in the history of the zoo, in 1959. The final total for 1987 was 862,471.

Nevertheless, we are a long way short of those heady days in the 1960s, when there was a third as many more children about to be brought for a day out to the zoo, and we had gates of over a million for several years on end. Suffice it to say that our gates in 1987 represent the same proportion of the children in the general population now as our peakgate in 1967 did then!

Nineteen eighty-eight, with its early Easter, is going to have a hard job to keep up with 1987. During 1988, we plan to build the Chimpanzee House (on the site of part of the rose garden); to finish the too-many jobs going on at present; and to start implementing the long-term planning that has been going on. We plan several promotional exercises to help us to achieve these aims. Do not be surprised if, when you come to the Zoo this summer, you find yourself being asked to buy a brick to help us with our building programme.

May I thank you for your support in 1987, and wish you all, dear readers—and the Zoo—a happy and prosperous 1988!



Members' Meetings

Wednesday, 16th March, 1988

Members' Evening Meeting

Members are invited to attend this meeting at the zoo, when His Grace The Duke of Westminster, President of the Society, will make presentations on behalf of the council and members to Professor King and Lady Tollemache—who are both Honorary Vice-Presidents.

Programme

- 7.30–8.00 p.m.
Reception, with light buffet
 - 8.00 p.m.
Presentation
 - 8.30 p.m.
Talk by Dr. Brambell—*More About Mammals*
 - 9.30 p.m.
Coffee
- (Entry through Time Office)*

Prior booking with Mrs. Allsopp in the membership office is essential for catering numbers.

Cost: £3.50

Saturday, 16th April, 1988

"The Rainforest Canopy"—Andrew Mitchell, 2.30 p.m., Lecture Hall.

Andrew Mitchell was Scientific Co-ordinator for "Operation Drake" from 1978 to 1980, and has pioneered the use of aerial walkways to study the rain forests. He is now a freelance TV producer, having worked on *The Amateur Naturalist*, *The Living Isles* and *The Living Planet* series.

Saturday, 14th May, 1988

Annual General Meeting—2.30 p.m., Lecture Hall.

Full autumn programme will be announced in the next issue of *Chester Zoo Life*.

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Cover Picture

Our front cover features Natasha, a 15-month-old Siberian tigress, who came to Chester Zoo in January, from Edinburgh Zoo. It is hoped that she will mate with ten-year-old Omu, the resident male tiger.

Chester Zoo Life is edited by Pat Cade

THE PRZEWALSKI HORSE

The wild horse saved from extinction

THE Przewalski Horse was originally brought to the notice of the zoological world by N. M. Przewalski in 1881. But the first description was probably by a Scottish doctor, John Bell, who was in the service of Peter the Great, and who observed the horse on a journey to China in 1720.

Recorded sightings have all taken place in the vicinity of the Takhin-Shara-Nuru—Yellow Horse Mountain—situated in the Gobi Desert of Eastern Mongolia. The Przewalski is now the only true wild horse left, and its nearest relative is the long-extinct tarpan

The last confirmed recording in the wild was in 1958, when it was estimated that there were 40 animals left. This was later followed by an unconfirmed sighting in 1965 of ten animals. Although there is a possibility of some animals surviving, it is more probable that army pressures and food requirements of wandering tribes have pushed the truly wild horse into extinction. It now exists only in collections recorded in the International Przewalski Stud Book, kept by Dr. Lisi Volf, at Prague Zoo. The horse is dun-coloured, though shades are variable. It is compact in build, standing 12–13 hands at the shoulder—a hand being four inches.

There is a dark stripe down the side and, often, zebra markings on the lower legs. The mane is short and, unlike the domestic horse, moults annually. Depending on the climate, the winter coat can be long and somewhat shaggy, while the summer coat is short and fine.

This is the first of a series of articles on rare or endangered species, contributed by the Zoo's Senior Curator, Peter Wait



We can trace the present captive population to animals from Askania Nova Park in Russia, which were sent to zoos in Paris, Washington, Berlin, London and the Animal Breeding Institute at Hallé University towards the end of the last century. By the 1920s there were only a few descendants from this stock, but Hellabrunn Zoo succeeded in getting specimens from collections in the U.S.A., England and Germany, and formed the nucleus of a new breeding group.

Another line descended from Hallé University, where original stock had been crossed with the domestic horse on a research project and, though many of their descendants are spread around the world, it is the former line that is now favoured as breeding stock.

Numbers have increased since the humble beginning. By 1960 the world population was 56; by 1970 it was 160; and by 1980 there were 400. Today the captive population is rising at about ten per cent a year, and stands at over 600.

Our four horses arrived at Chester early in 1983. We have two elderly females, "Luna" and "Luisa", both bred at Prague Zoo. They are full sisters, born in 1960 and 1963. Luna—the elder—must qualify as one of the oldest surviving horses. "Roswitha" was born at Whippsnade in 1982, and is a granddaughter of Luna. The male, "Bartak", was born at Marwell, also in 1982. A foal was born in February 1986 to Roswitha but, sadly, did not survive. We are hoping to be more successful with this species in 1988.

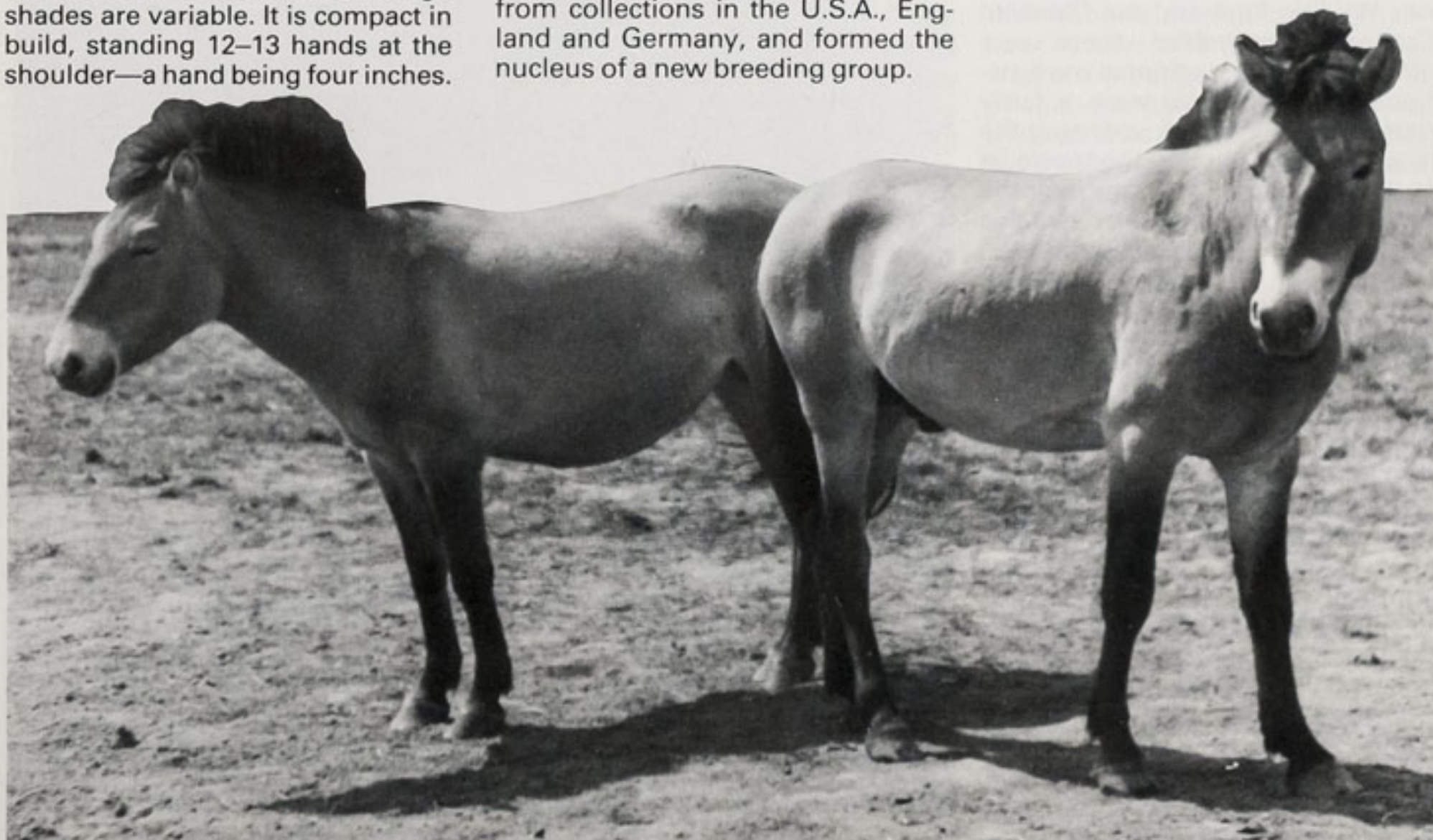


Photo by Kenneth Green

ZOOS VIEWED

A non-zoologist takes the second Federation Study Tour
by Chris Vere

MARSHALLED together by the indefatigable Ken Sims at Heathrow, for onward despatch to Frankfurt, the group taking the Federation's second study tour were pleased to be met in West Germany by driver Dave Smith, veteran of last year's jaunt that went as far as East Germany, and our guide and mentor, Dr. Fritz Jantschke, one of the editorial team of the German-Swiss animal magazine *Tier*—and a zoo expert too!

The group—whose numbers seemed to fluctuate every day—could well be described as "multi-disciplinary"—for we were certainly not all "sharp end" directors or curators! Derek Elliot is Paignton Zoo's architect; I am a marketing man; and my colleague from Chester, Alan Du Cros, combines being Financial Controller with Deputy Director. I suspect that amongst all our colleagues—representing Twycross, Southport, Colchester, Belfast, Banham, the Welsh Mountain Zoo at Colwyn Bay, Birdworld, The Falconry Centre, Pencynor Wildlife Park and the Chestnut Centre in Derbyshire—there were almost all of the traditional zoo functions and skills. We were a fairly representative group, spanning the larger and the smaller; the specialist and the general; the municipal; the private enterprise; and the charitable trusts.

Ken had planned to take us to seven collections on the trip, but we had a bonus—adding the Opel Zoo on the outskirts of Frankfurt. First stop was Wilhelma in Stuttgart, bathed in October sunshine; then to Basle and Zurich, in Switzerland; an over-the-Alps tour via Liechtenstein to Innsbrück for the Alpenzoo; then swinging back into Germany for Munich, Nürnberg and Frankfurt. Nine days—eight zoos—that is the bones of the trip. "But what," my curious colleagues back in Chester asked, "did you learn from the trip—apart from the certain fact that it is cheaper to buy your Kodak film in the zoo's shops here than abroad?"

Old-fashioned stories nearly always ended with a *moral*. Here, gentle readers, are mine from this trip—and, with them, some of the questions that we should be asking ourselves.

Local Support

There is no doubt that the zoos we saw were considered a most important part of the local and regional scene, and derive very considerable support from regional and local sources.

A close link between a zoological collection and a major city is (with few notable exceptions) not the English way. Possibly Scotland and Ulster are closer to the Continental idea. We found virtually everywhere that zoos had major funding from

"their" city or state and close and proud identification of the collection with the area. In Basle, the zoo had the familiar diminutive "zöoli"—"our little zoo"; Nürnberg was run by the city itself; Innsbrück realised the importance of *their* zoo in tourism; Frankfurt and Munich had strong links; and Zurich received major aid from the state.

State Support

These close links have eased the massive problems that most U.K. zoos face in funding development, for in most cases capital funds did not have to be found from trading or loans.

Zurich is 25 per cent state funded. Millions of DMs have been spent at Munich—for example—in providing the magnificent Olympic-style free-flight aviary, including help with running costs. There were allocations of 28-million DMs for the next project.



This young chimp in Zurich Zoo is using a stick in the artificial "termite" nest. His reward is a mouthful of honey

Nürnberg had state funding for their dolphinarium. In Innsbrück, Alpenzoo had generous help from its bank for the new elk enclosure and had just opened a new aquarium—again with generous external funds.

With some honourable exceptions, we do not enjoy support on anything like these scales, and so we are not able to update and improve our exhibits as quickly or as substantially as we would wish.

As a result of these enlightened policies, the majority of zoos that we visited had impressive modern exhibits as the centrepieces of their collections, and were continuing to build. We are slipping behind.

Magnificent Buildings

Consider what has already been built: Zurich's superb Ape House (tiles and stainless steel, where we are lucky to have concrete), with its lecture-theatre-style presentation and the magnificent central gorilla exhibit; the enormous monkey exhibit at Stuttgart that is three storeys high and needs a suspended cradle system to keep it clean; and Basle's impressive aquarium. Then consider the £5-million new birdhouse and aquarium being built at Zurich—which we saw in its concrete skeleton; Dolphinarium extension plans at Nürnberg; and the recently-opened aquarium at Innsbrück. The sheer quality of the new projects is breathtaking—and this left the inevitable feeling that we were being outpaced by our Continental colleagues. In Chester's case, our major new exhibit—the Chimpanzee House—would seem very small beer on the scale of the projects that we saw, and yet, for us, it is the most important single item in a five-year plan. We are being outspent tenfold or even 20-fold by zoos whose size (in area and visitor numbers) is comparable with our own.

Developing Trading Skills

Perhaps because funding was not so pressing a need, the zoos' trading endeavours did not seem so well developed as ours, and their efforts to sell via kiosks and shops did not seem so important.



Zurich's superb Ape House

Most let their shops, kiosks and even their restaurants as concessions. Obviously October is in the quieter season, but we did not see retail shopping anything like so well developed as I expected and, with notable exceptions in the bookshops of Basle and Munich, there seemed less interpretational material, and much less in the way of souvenirs. Zurich had a shop inside a redundant container, manned by volunteers, and reporting to the Curator of Reptiles. There were some quality gifts and some useful material, but they were only open because it was a children's holiday week, and the site was not on a main visitor route.

Visitor Facilities

Stuttgart had a splendid new restaurant, and the facilities at Munich and Basle were first-class, but elsewhere it is possible that relatively less had been spent on visitor facilities. But everywhere we went standards of cuisine and service were undeniably high, and served to remind us to keep our own standards up.

Only at Nürnberg (of the major zoos) did I find direct fund-raising efforts in evidence, with a tombola stall near the main entrance—something that I suspect would not be appreciated at Chester!

Information Standards

Stuttgart had some splendid panels related to their collection of animals as seen by artists and writers through the centuries. Zurich had superb displays at their Ape House, showing the descent of primates, and had looped videos playing in the Elephant House, showing the early days of their baby Asian elephant, Komali—born in July, 1984. Even at Opel Zoo, where the budgets were small, the imaginative panels and displays are a lesson to us all, and at Munich there were large and impressive panels throughout the grounds. But these were the high-spots—and often more information was presented in a very formal way, and more could have been done to relate special points of the collections to visitors. But the U.K. has a long way to go too!

Litter Lesson

The virtual absence of litter is an enormous lesson to us all.

Would that the U.K. citizens' belief that they have an absolute right to litter wherever they please were replaced by the discipline of Austria, Switzerland and Germany!

Unforgettable Moments

Animals and humans in the zoos presented inevitable surprises, and I still relish the fun with which the Director at Alpenzoo—Dr. Helmut Pechlaner—capitalised on the alpine slopes to show us his prowess at sliding on the hand-rails (bannister-style). At Nürnberg, I puzzled at the large collection of paper bags full of food by the main gate. "Too much for litter," I thought—until the pfennig dropped and I realised that it was food brought for the use of the zoo. I will not forget the baby elephants at Opel Zoo and I enjoyed spending my last German currency buying carrots to feed them. And, at 1DM per bundle, at least I recognised that I was helping a zoo that—unlike all the others that we had visited—needed to raise its own funds.

Showers for Orangs

I marvelled at the orangs at Stuttgart who turned on their own showers in the tiled and stainless steel bath area of their modern Ape House, and was fascinated at the chimps at Zurich who were "tool making" to get honey from artificial "termite hills" that had been created for their interest and amusement. Entrepreneurial credits go to Alpenzoo, where ten kilos of horsechestnuts would gain free admission for a child, and to Munich, where they had let a "concession" for the breeding of trout in the moats of their bear exhibit—with the public rushing to pay 50 pfennigs to feed them. For the most unusual—the bat caves in the small mammal and nocturnal house at Frankfurt, and the mirror in the ape house that invited the visitor to look at the "world's most dangerous animal".

Excellent Hospitality

Hospitality was universally excellent. Would we, I wonder, find senior staff or directors who would accompany a foreign visit so readily—or indeed find foreign language speakers who could cope so well as hosts? We must thank all our guides and hosts for their time and interest and, within this, Dr. Fritz Jantchke for hosting us

so well at his Opel Zoo, and the offices of *Tier*, where there was an informal buffet for us all. But my hospitality prize must go to Austria—for, not only were the travellers greeted at the gate of the Alpenzoo with a morning glass of schnapps to refresh us for the mountain slopes of the zoo, but, having reached the summit, there was a refreshing glass of wine, too. What style! And two bemused ladies—not part of our group—were offered a glass of wine too!

Moral Lesson

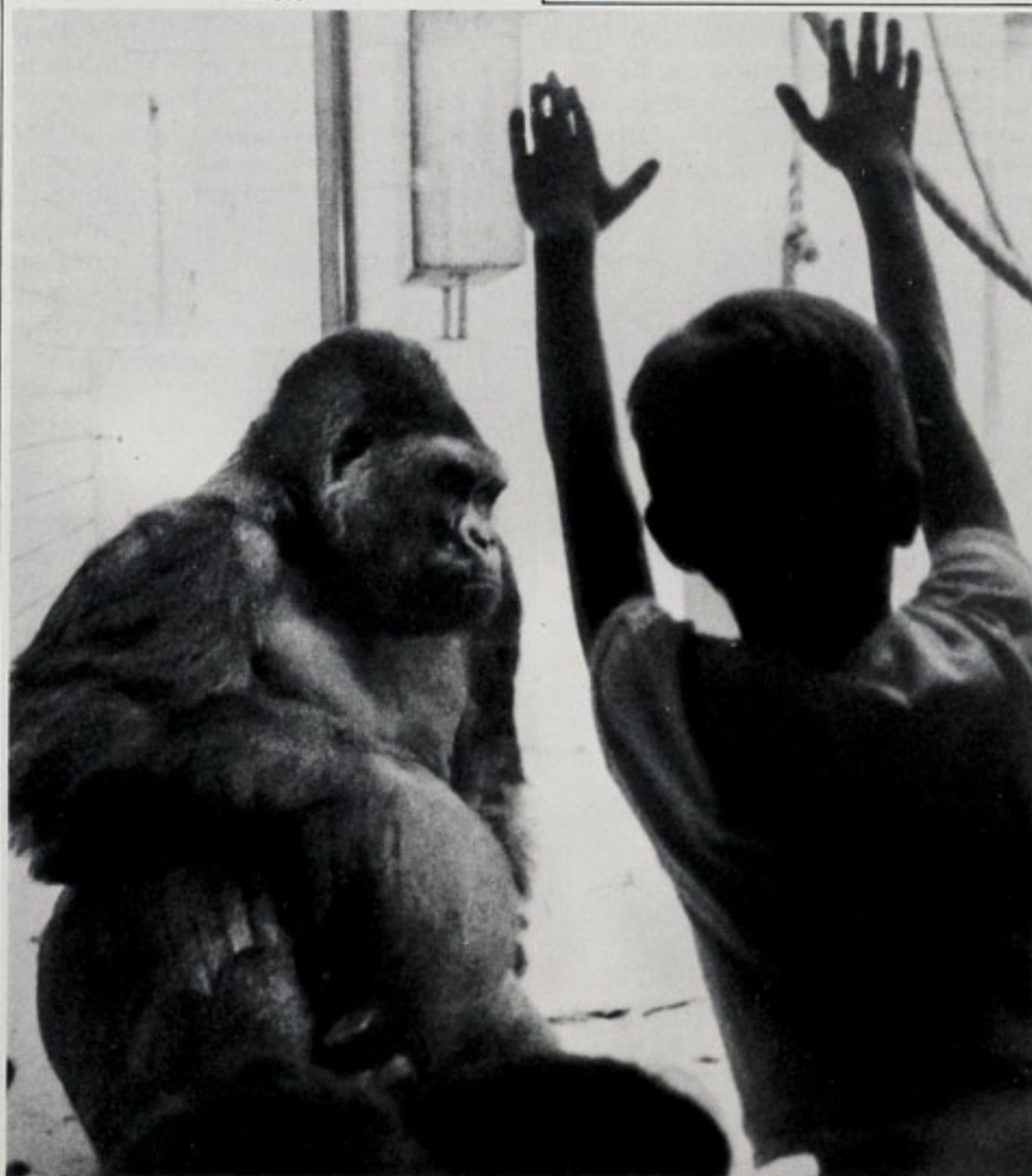
Overall then, we were immensely impressed by the sheer professionalism of the zoos we saw, and the resources they commanded. The moral for us all is that we need to sell our zoos to our community so that we benefit as substantially as they do.

Animal-wise, I am sure that our contributions are no less meritorious than many we saw. But the abiding lesson from the Continental zoos that we saw is that there is substantially greater local involvement, and that this has brought much greater resources. We must achieve a similar status. And we will all benefit by having a representative group from all our zoos on the next study tour—probably in the U.S.A. There is much to gain by joining together.

Finally, our thanks again to Dave, Fritz, and especially Ken, whose homeward journey was made no easier by the news of the devastation of the freak storms.



The Gorilla House at Stuttgart Zoo



PÈRE DAVID'S DEER—NEWS FROM CHINA



Photo courtesy WWF Hong Kong and David Melville.

By Michael Brambell

The Père David's Deer photographed in China's Milu Reserve

WE have received through the World Wildlife Fund, Hong Kong, photographs of the group of Père David's Deer which were sent out from Britain in July, 1986.

They are at Da Feng, which is in the vast flatland area 100 miles or so north-east of the Yangtze River.

So much silt is being carried by the great Chinese rivers of the Hwang Ho and Yangtze Kiang that the coastline in this area is advancing at the rate of about 150 metres a year.

The Milu Reserve ("Milu" is the Chinese name for Père David's Deer) is close to the Yaching Reserve for Manchurian Cranes. The area consists of woodland grown as a 20-year cash-crop, grassland where the grass is harvested as fuel for brick kilns, and marshland, with the reeds being cut for thatching and the open water being used for fish farming. Chinese Water Deer are common.

During 1987, six calves were born (three females, three not yet known, some to females from Chester) and,

although one of the animals has died (unfortunately, one from Chester Zoo), it looks as if the group is now settling in well, having increased from the original 39 to 44 animals.

Acclimatised Well

"The deer have acclimatised well and have maintained good condition on the natural food available in the summer," writes Dr. Chris Thouless and Professor Linn Chong-qi, who are monitoring the programme.

The question which remains—and will do so for a few years—is how well the herd will be able to cope with the local winters? Until it is known that they can survive on what is naturally available, they will be given supplementary winter feed.

As it becomes clear that the animals are able to thrive under less and less protected conditions, they will be released to the larger part of the reserve which totals over 1,000 hectares.

So many people have been involved in this project that it is impossible to be sure all are properly acknowledged. The deer came from Whipnade, Chester, Marwell, Longleat and Glasgow zoos; the return is being co-ordinated at this end by the Zoological Society of London and the World Wildlife Fund.

In China, the Ministry of Forestry and the World Wildlife Fund are co-operating with Jiangsu provincial government, and the International Union for the Conservation of Nature has also been involved.

As the years go by, the parts played by many of the essential links in the historical chain of these animals will become blurred and forgotten, much as we have forgotten the parts played by those zoos which had the deer before the 11th Duke of Bedford gathered the "original" 18 at Woburn in the 1890s.

Nevertheless, there are now deer which are as good as back in the wild in China and which were born at Chester Zoo.



This slide of a kookaburra about to enjoy its lunch was a prize-winner for Erick Fricker of Manchester



A special commendation went to Robert Waite, of Henley-on-Thames, for his otter print



Teenager Keith Williams of Buckley, Clwyd, won first prize in the "People in the Zoo" category for this picture of his Mum with an elephant!

1987 PHOTOGRAPHIC COMPETITION

FOLLOWING the success of the "Members and Staff Only" photographic competition in the zoo in 1986, it was decided to extend the competition to all zoo visitors in 1987.

The result was about 500 entries from 125 individual entrants—a huge administration job for Council member Jean Dixon, who organised it all.

There were five different categories, with a prize for the best print and best slide in each of the categories. Judges were Ken Evans, Chief Photographer of the *Chester Chronicle* series, and George Green, Picture Editor of the *Wrexham Leader* series. After the judging, when the anonymous numbers were being linked to names, we discovered that, from 500 entries, two of the first prize-winners were husband and wife!

Mrs. Norma Fricker, of Dingle Drive, Droylsden, Manchester, won first prize in the Mammals section for her slide of an orang utan, and her husband, Erick, won first prize in the Birds section, for his slide of a kookaburra. Erick also received two com-

mendations from the judges for slides of a common iguana and a royal python.

Said Erick: "Norma's congratulations letter arrived by first post one morning and, although I was pleased for her, I must admit that I felt slightly peeved—after all, she had borrowed my camera! However, my letter arrived by the second post on the same day, so my pride was saved."

Other prize-winners in the competition were: Miss Clare Snead of Wavertree; Mr. S. P. Goddard of Barnsley, South Yorkshire; Mr. Arthur Bowden of Hanford, Stoke-on-Trent; Dr. J. Carter of Clitheroe; Mr. Keith Williams of Buckley, Clwyd; and Teresa Appleton of Carlisle. In the special staff section, the winners were Wayne McLeod, for his lovely slide of the zoo's first flamingo chick still in the nest; Louise Peat for her portrait of one of the goats in her care in the Children's Farm; and Derrick Thompson.

Our thanks to Kodak, Color 3 and Fishwicks for donating the prizes.



Black and white cannot do justice to this slide of a tulip bed, which won first prize in Gardens section for Dr. J. Carter of Clitheroe



Norma Fricker's slide of an orang utan won her a Color 3 processing voucher



Young Subis, a hand-reared orang utan, was swinging on the monkey-yard gate when Clare Snead of Wavertree caught this prize-winning picture

WAKING UP TO THE SETTLER'S CLOCK!

*Kookaburra sits in the old gum tree,
Merry merry king of the bushes he.
Laugh kookaburra, laugh kookaburra,
Gay your life must be!*

ONLY the English could teach their schoolchildren a rhyme about a bird found thousands of miles away on another continent. The Australian kookaburra must be one of the most popular denizens of our Bird House. Perhaps it is relevant in this year of the Australian bi-centennial celebrations that we take a closer look at this interesting bird, also known as the Laughing Kingfisher or Settler's Clock.

With all these different names, the classification may seem confusing. It is, in fact, a kingfisher, but it does not eat fish. Many Australian animals do not conform to the norm but, to be fair, some species of kingfisher found in other parts of the world do not eat fish. Kookaburras thrive on a diet of insects, lizards and small mammals. Judging by our observations in the zoo, they must lead a particularly indolent life, as even when hungry they rarely pursue their prey with any vigour. In fact, they bring to mind our idea of the laid-back Australian life-style!

The most memorable feature of the kookaburra is its voice—which is a harsh laughing cry. No wonder it was called "Settler's Clock" by the new Australians. Imagine being woken at five in the morning by a shrieking kookaburra — far noisier than anything in the "old country".

If you stand anywhere near the aviary at feeding-time, you are certain to hear their laughing call. It is in fact a territorial call. Pairs become especially vocal during breeding seasons. Keepers are used to hordes of visitors in front of the aviary, laughing their heads off! The kookaburras do not seem to respond, but we wonder what they think of the noisy humans! What food makes the kookaburra laugh loudest? A nice fat mouse, of course! They are supplied dead, but the kookaburra does not seem to realise that, and picks the mouse up by its head, banging it time and again

against a handy branch, before swallowing it with a big gulp. Other items of diet include locusts and lean meat, with vitamin powder added, but these are only second-best to any self-respecting kookaburra.

Despite their tropical and semi-tropical origins, kookaburras are fairly hardy birds, although they do not like extremely low temperatures or excessively damp conditions—but

Mike Coupe and Barry Rowley mark the Australian birthday celebrations with this piece on the Australian bird that is always good for a laugh!

who does? Over the last 20 years, we have hatched 28 kookaburra chicks at the zoo. Not all have been reared to maturity, especially in the early years, but if you meet a kookaburra in any other U.K. zoo, there is a good chance that it is one of ours.

In the wild, kookaburras lay their eggs (two or three, or occasionally four) in holes at the base of a tree-trunk, rotting log or old termite mound. To induce our first kookaburras to breed, we provided them with a selection of such logs. They nested, incubated the white egg for 23 days, and hatched what could only be called politely rather reptilian-looking youngsters. We had difficulties rearing these babies, despite liberal supplies of their favourite young mice, plus mealworms and locusts liberally dusted with vitamin powder.

One problem seemed to be that the babies were swallowing quantities of sand from the aviary floor. Eventually, the kookaburras themselves provided the answer to this problem. Quite by accident, another bird's nest-box was left in the aviary, with the top off. Keepers were amazed to find that the kookaburra had laid two eggs in this box, positioned six feet off the ground! We never looked back from that day on, always providing them with an artificial nest-box. The result was a record nine young from two pairs during 1986.

The kookaburras have certainly adapted to the change of season from "Down Under" and, no matter what the weather, always lay their first eggs on 9th, 10th or 11th April.

When you next visit the zoo, please come along and take a closer look at our kookaburras; generally good-natured and full of character, they will certainly have a last laugh on you!

G'Day!



Photo by K. W. Green

Our new mobile earns top marks

by Brenda Norgain

HAVE you seen the large, oldish mobile down by the Rainbow Lawn? What is it? What's it for?

Visitors have obviously been curious to know what is going on. I hope this short account will help to satisfy both real interest and curiosity.

This 80-foot-long mobile has been loaned to the zoo by Cheshire Education Committee for use in the zoo's educational work.

Our policy of teaching while out and about in the zoo, looking at the animals selected for a particular topic, has proved successful — despite rain, hail, snow and—on a few days—a hot tiring sun! However, it has been apparent for some time that we need to offer *some* indoor accommodation for aspects which cannot satisfactorily be studied "in front of the animals".

This mobile has opened up two really valuable possibilities and one exciting development.

The building has been rearranged to form three major areas.

One main section has allowed us to develop our "Touch Centre". This is for booked school parties and gives a valuable opportunity to study and touch skulls, horns, antlers, skins, shells, etc.—some of them loaned to us by H.M. Customs. This experience fits well into many topics—not least our teaching on conservation.

Although the touch session has to take place indoors with our own education staff, the total teaching programme gives a lot of support to the school teachers as they take their own groups around the zoo. The full programme links together what has been and touched and the study of the real live animals in the zoo.

Another section has been designated



SUBIS CLICKS WITH PRESS

YOUNG Subis, the orang utan, was probably the most popular animal with press photographers last year. This lovely shot was taken by a *Sunday Express* photographer.

as a "Bookable Workroom". Here school parties have a chance to meet and be given final instructions, come together for immediate follow-on (discussions, written work, artwork, etc.), and have progress monitored by their own teachers. It has already been tried out by a few schools and there is no doubt it was useful to them. Bookings will become heavy.

We have been concerned about our four/five-year-old educational parties. They cannot cope with long walks and their concentration spans are limited. Some valid activities to break up the walking round were needed.

The third main section has been designated for school parties of this age group, again on a "book in advance" basis. This "Noah's Ark" room contains a variety of skilfully



Part of the Touch Centre

Photo by Nichola Grant

chosen and specially designed activities, carefully linked to observations which take place out and about in the zoo grounds.

Those of our teaching staff with a great deal of primary school experience really put their professional expertise to splendid use devising this room. It is designed in such a way that teachers will work with their own groups. It really is special and almost unique to Chester Zoo.

Sincere Thanks

Our real thanks must go to zoo estates staff, who organised heating installations and did the moving of unnecessary room partitions, in the middle of a heavy winter programme. Also, our sincere thanks go to volunteers and education staff who, often on Saturdays and Sundays, have painted the interior, repaired damage and made the Ark, the puppet show and many of the items to be used in the four/five-year-old room. A real team effort!

These rooms will all be fully ready for the coming summer season.

There is no doubt that all these rooms will bring extra interest and enjoyment to a school party and make the visit even more worthwhile.

For our part, we have enjoyed planning and setting it up. We have so many more ideas . . . another 80-foot mobile would allow us to . . . ah!—we'll have to wait and see!

MEET OUR LITTLE KID SISTERS!



THESE twin goats were born in the Children's Farm last summer, but remained nameless while *Marcher Sound* radio station held a "naming competition".

Winning entry suggested the names of Gem and Mini—Gemini being the star sign for the twins!

The youngsters are seen here at just a few hours old, in the arms of keeper Louise Peat.

RECORD YEAR FOR ADOPTA SCHEME

THE income raised by adoptions has increased each year in the four years since the scheme began.

Nineteen eighty-seven broke all the records, with a total of £38,000.

Adoptions Secretary Maureen Allsopp says that December was particularly encouraging. "The idea of adoptions for Christmas presents really caught on," she said. "We took £3,732 in December alone."

ZOO REVIEW

YODHA THE WARRIOR ARRIVES

THANKS to the special breeding programme at Whipsnade Zoo, Chester Zoo now has one of the rarest rhinos in the world—the Great Indian.

Rama arrived early in December but, within a few days, he was to be rechristened. The Indian population in Chester politely pointed out to us that Rama was the name of one of their gods, and that calling an animal by the same name might be considered an insult. They suggested the name Yodha, which means "strong warrior".

The operation in moving the 18-month-old animal north from Whipsnade went very well. The giant travelling crane was swung deftly over the wall of the rhino paddock, and Yodha went straight into the warmth of his new quarters.

Moving a rhino that weighs in at over a ton takes some real skills, but the Chester team had already had some recent experience when we sent six-year-old Jasper, our black rhino, to Whipsnade earlier in the year.



"Granada Reports" films
Yodha's arrival

Photo by John Frost



Yodha settles in his new home

Members' Concessionary Tickets

Price Increase
from 1st January, 1988—£1.75

Annual Members may purchase up to 20 tickets annually for family and friends (sold in blocks of five). These tickets must be purchased in advance of your visit and can only be obtained from the membership office—they are not on sale at the entrance gates.

Please enclose cheque (made payable to Chester Zoo) with your postal application. A stamped addressed envelope for ticket return would be greatly appreciated by the Society.

Maureen Allsopp
Membership Secretary





Kirsty's first day at Chester

Picture courtesy of Daily Mirror

COULD THIS BE THE START OF SOMETHING BIG?

THE arrival of a new elephant involves mammoth preparations! When 20-year-old Kirsty, a female Asian elephant, arrived at Chester Zoo early in December, it necessitated taking out a section of the wall to bring her in through the back of the elephant house.

Kirsty came from Glasgow Zoo to join Judy, Sheba, Bierma, Lena and — most importantly — Jubilee, in Chester's elephant house. Jubilee is one of only three Asian bull elephants in British zoos, and the only one to be born and reared in the U.K. Last September, Chester Zoo hosted a conference of the country's top elephant experts, to devise a breeding programme to give all female elephants access to a bull.

Kirsty is the first young female to benefit from the decisions made at that conference and, hopefully, she and Jubilee will become parents in two or three years' time.

Her arrival at Chester had to be handled very carefully, as no one was sure how she would react. Kirsty was taken in through the back of the house, while the other five elephants were out on the island. When they came bounding in, with trunks outstretched in greeting, she became rather apprehensive, and retreated to a corner, with her back to the others. However, gentle Sheba continued to offer the trunk of friendship, and Kirsty's timidity was soon overtaken by curiosity. Now she and Sheba have formed a close affinity, and are always together. Kirsty and Jubilee have so far only met with a barrier between them but, hopefully, it will not be too long before they get together.

Welcome . . .



to Mrs. Sue Clews, new supervisor in the Jubilee Cafeteria

ZOO V.I.P. JUST FOR THE DAY



FIVE-YEAR-OLD Craig Worthington's prize for winning a painting competition was a V.I.P. day out at Chester Zoo.

Craig, whose home is in Warrington, brought his Mum and Dad and baby brother David with him. He is pictured above, helping out at feeding-time in the Children's Farm.

New Estate Engineer



WELCOME to Stephen O'Brien, who joined the zoo as its new Estate Engineer on 4th January. Steve is 36, married with two children, and lives in Ness, Wirral.

He previously worked for British Nuclear Fuels in the Projects Department. His responsibilities at the zoo are to rationalise the maintenance programme and monitor new buildings. His first major project is the rebuilding of the zoo's chimp house, due to start in the spring, for completion by September.

Steve takes over from Fred Carson, but Fred will be remaining at the zoo as Project Engineer for the immediate future.



JUNNEWS



Some like to touch, and some would rather watch! Keith Brown, Senior Reptile Keeper, shows off the King snake

MAKING CONTACT

OVER 130 junior members turned up at our annual contact session! This year, because of the building work going on all over the zoo, we held the meeting in the lecture hall.

It was an exciting afternoon, with lots of different animals to meet. A few members were a bit apprehensive about the python and the King snake, but most became braver as they saw other people survive the experience!

Liveliest animal at the session was undoubtedly Brillo, the coati, who came along with keeper Charlie Mackenzie. Brillo loves leaping from shoulder to shoulder, and managed to make a few people jump with surprise!



Penny Rudd's quail looks quite happy in the arms of nine-year-old Danine Smith



Twelve-year-old Melanie Anderson with wallaby



Adam Norcott of Mossley Hill, Liverpool, with Omo, the white rabbit

Junior Members' Field Trips & Meetings

TRACKS AND SIGNS

Saturday, 19th March, 1988

Wellies essential! Over eights are invited to come along.

Meet outside the Oakfield at 11.00 a.m., finishing around 4.00 p.m.

COLWYN BAY ZOO

Saturday, 23rd April, 1988

When we've visited the zoo we aim to have a walk on the beach. Over eights are invited.

The bus will leave the Staff Car Park at 9.30 a.m., returning around 5.00 p.m.

VISIT TO A TROUT FARM

Saturday, 21st May, 1988

We will be visiting one of the trout farms in North Wales - Over tens should enjoy this trip.

The bus will leave the Staff Car Park at 9.30 a.m., returning around 4.30 p.m.

DAY HELPING A KEEPER

Saturday, 18th June, 1988

Only over 12-year-olds are invited to join us, unfortunately, but it is worth waiting for!

Please meet outside the Oakfield at 11.00 a.m., ending around 4.00 p.m.

JUNIOR MEMBERS' BAZAAR

Sunday, 31st July, 1988

Full details of the bazaar will be issued in *Zoo Life* nearer the time, but please note this day in your diaries. Note also that we have chosen to hold the bazaar on a Sunday this year, as this tends to be a busy day in the zoo. **Everyone welcome.**

PLEASE NOTE

Bookings to be made for all events. Please ring Penny at the zoo not more than two weeks before an event. For those trips which involve either a bus, or provision of food, a charge will have to be made in order for us to cover basic costs.

The list is provisional, and, in exceptional circumstances, we may have to alter the dates and times of some of the trips, so please keep an eye on the listing in *Zoo Life* to keep up-to-date.

A Bashful Puzzle-Maker!

A junior member who insists on remaining anonymous has sent in these puzzles. Perhaps the puzzle should be—"Guess who the puzzler is"! All I am allowed to tell you is that it is a girl, and she is 12 years old.

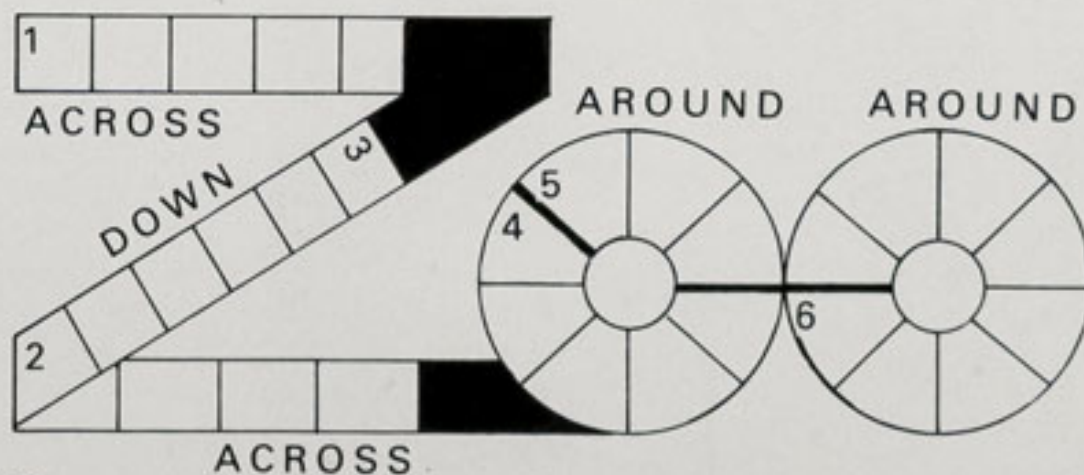
ZOOLOGICAL

T	L	C	H	E	S	T	E	R	Z	W O R D S E A R C H
P	I	L	I	O	N	E	Q	R	O	
R	O	G	I	R	A	F	F	E	O	
A	N	I	E	L	A	H	W	M	A	
I	E	R	C	R	A	Z	G	O	D	
R	S	A	Z	O	A	E	R	N	N	
I	S	C	H	E	S	B	S	K	A	
E	D	O	G	B	Z	R	O	S	P	
Y	E	K	N	O	M	A	C	A	W	
D	O	L	P	H	I	N	T	I	G	

LOOK FOR THESE WORDS! (They can go in any direction)

- | | |
|------------|-----------------|
| 1. Tiger | 7. Seal |
| 2. Lioness | 8. Whale |
| 3. Macaw | 9. Prairie dog |
| 4. Zebra | 10. Panda |
| 5. Giraffe | 11. Monkey |
| 6. Dolphin | 12. Chester Zoo |

ZOO CROSSWORD



CLUES

Across

- Large striped cat
- Red and Roe are of this type

Down

- Small reptile

Around

- Animal with a hump on its back
- A dingo is the Australian form of this
- Latin term of this animal can be *Loxodonta africana* or *Elephas maximus*

Arrivals Births and Hatchings

FROM 1st NOVEMBER, 1987
TO 31st JANUARY, 1988

Mammals

1.0	Ocelot (<i>Felis pardalis</i>)	Received
2.0	Red Lechwe (<i>Kobus leche</i>)	Bred
0.1	Chimpanzee (<i>Pan troglodytes</i>)	Bred
0.1	Sumatran Orang Utan (<i>Pongo pygmaeus</i>)	Bred
1.0	Celebes Macaque (<i>Macaca niger</i>)	Bred
1.2	Arabian Gazelle (<i>Gazella gazella arabica</i>)	Bred
1.0	Indian Rhinoceros	
	(<i>Rhinoceros unicornis</i>)	Received Whipsnade
0.1	Elephant (<i>Elephas maximus</i>)	Received Glasgow
1.0	Père David's Deer	
	(<i>Elaphurus davidianus</i>)	Received Edinburgh
0.1	Siberian Tiger	
	(<i>Panthera tigris altaica</i>)	Received Edinburgh
2.1	Eland (<i>Taurotragus oryx</i>)	Bred
0.0.1	Rodrigues Fruit Bat (<i>Pteropus rodricensis</i>)	Bred
0.1	Guanaco (<i>Lama guanicoe</i>)	Bred
0.2	Arctic Fox (<i>Alopex lagopus</i>)	Received Bridgemere
0.0.1	Capuchin Monkey (<i>Cebus albifrons</i>)	Bred
0.0.1	Hamadryas Baboon (<i>Papio hamadryas</i>)	Bred

Birds

0.0.2	Diamond Dove (<i>Geopelia cuneata</i>)	Bred
0.0.2	Mountain Witch Dove (<i>Geotrygon versicolor</i>)	Bred
0.0.2	Long-tailed Glossy Starling	
	(<i>Lamprotornis caudatus</i>)	Bred
0.1	White-winged Wood Duck	
	(<i>Cairina scutulata</i>)	Exchanged Martinmere
1.1	Black-necked Swan	
	(<i>Cygnus melanocoryphus</i>)	Received Martinmere
0.1	Ringed Teal	
	(<i>Anas leucophrys</i>)	Received Martinmere
1.0	Snowy Owl (<i>Nyctea scandiaca</i>)	Received
2.2	Yellow-backed Lory	
	(<i>Lorius garrulus flavopalliatu</i> s)	Received
0.1	Brown-eared Pheasant	
	(<i>Crossoptilon mantchuricum</i>)	Received



Snowy Owl

Photo by Ken Green



Arctic Fox

Photo by Ken Green

0.1	Fulvous Tree Duck	
	(<i>Dendrocygna bicolor</i>)	Exchanged
1.0	Red-fronted Macaw (<i>Ara rubrogenys</i>)	Exchanged
0.0.1	Emu (<i>Dromaius novaehollandiae</i>)	Hatched
Reptiles		
13	Bamboo Pit Viper (<i>Trimeresurus albolabris</i>)	Bred
1	Cuban Anole (<i>Anolis equestris equestris</i>)	Bred
3	Red-tailed Racer	
	(<i>Gonyosoma oxycephala</i>)	Received
1.1	American Basilisk (<i>Basiliscus basiliscus</i>)	Received
1.0	Indian Python	
	(<i>Python molorus bivittatus</i>)	Received
0.0.1	Royal Python (<i>Python regius</i>)	Received
0.0.6	Tokay Gecko (<i>Gekko gekko</i>)	Bred

Aquarium

1	Scorpion Fish (<i>Pterios volitans</i>)	Received
1	Panther Fish (<i>Chromileptes altivelis</i>)	Received
4	Heckle Discus (<i>Symphysodon discus</i>)	Received
3	Oscar Cichlid (<i>Astronatus ocellatus</i>)	Received
1	Black Shark	
	(<i>Morulus chrysopehadion</i>)	Presented
?	Boeseman's Rainbow Fish	
	(<i>Melanotaenia boesemani</i>)	Bred
12	Frontosa (<i>Cyphotilapia frontosa</i>)	Bred

Aquarium (arrivals during January 1988)

2	Piranha (<i>Serrasalmus gibbus</i>)	Presented
37	White Axolotl	
	(<i>Amblystoma mexicanum</i>)	Presented
38	Black Axolotl	
	(<i>Amblystoma mexicanum</i>)	Presented
1	Pyjama Tang (<i>Acanthurus lineatus</i>)	Presented
1	Sailfin Tang (<i>Zebrasoma veliferum</i>)	Presented