



*By Courtesy of Dr. S. Szinai*

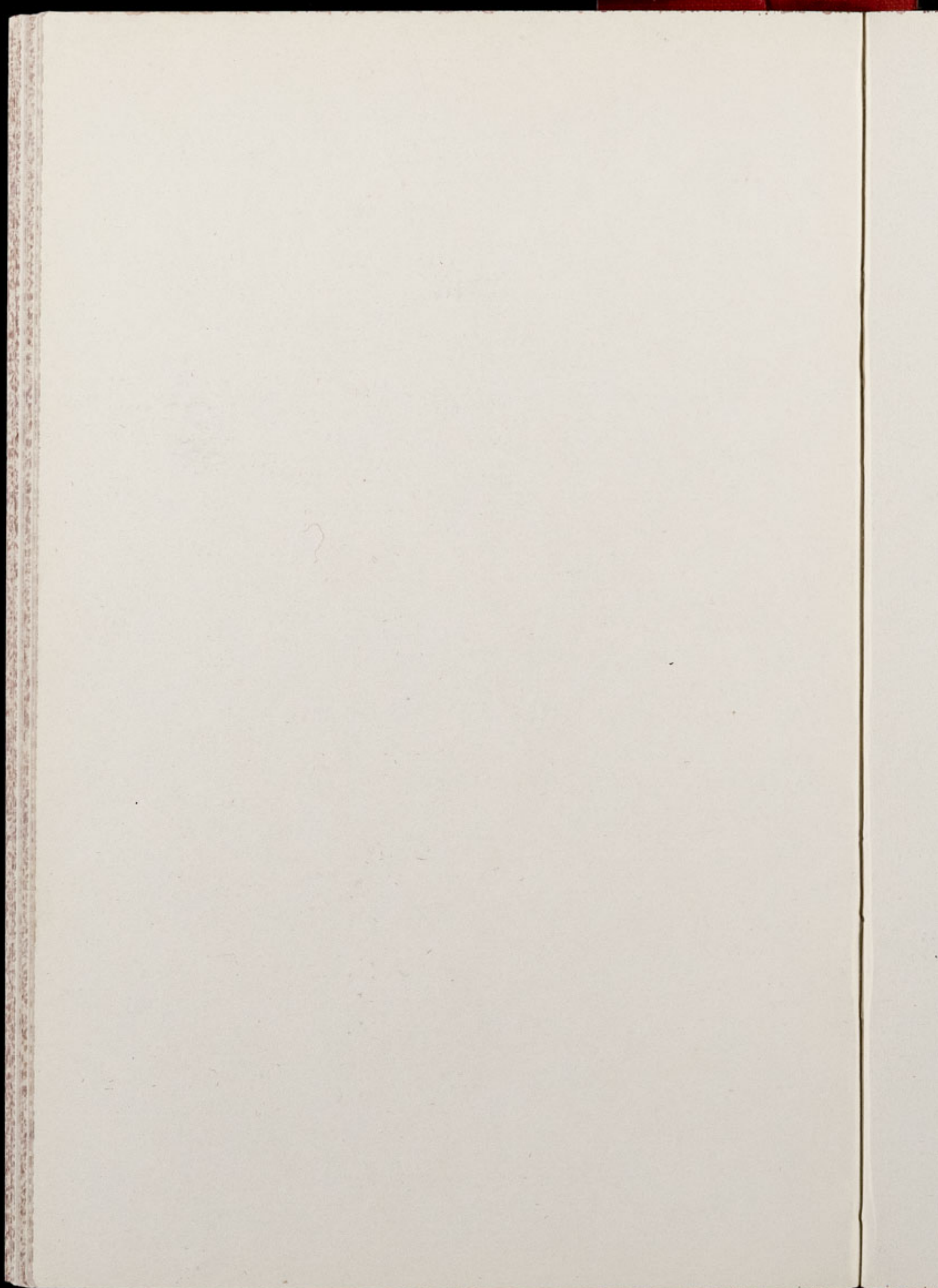
# **Chester Zoo News**

## **AND GUIDE**

**THE NORTH OF ENGLAND ZOOLOGICAL SOCIETY  
ZOOLOGICAL GARDENS, UPTON - BY - CHESTER**

December, 1965

Price 1/-



## Editorial

This is the fourth year in succession that the "*Chester Zoo News*" has been published and we would like to wish all readers the compliments of the season.

The Zoo is very quiet at this time of the year but our attendance figures are keeping pace with those of the record year of 1964.

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*COVER: This months cover shows our herd of Ankole Cattle.*

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## PRESENTATIONS

A Japanese Ground Squirrel has been taken into the collection in the Small Mammal House.

A pair of Pekin Robins have been released in the new Temperate Bird House. The Pekin Robin is one of the most popular insectivorous birds, sings well and has bright coloured plumage. They are found in South East Asia from the Himalayas to Southern China.

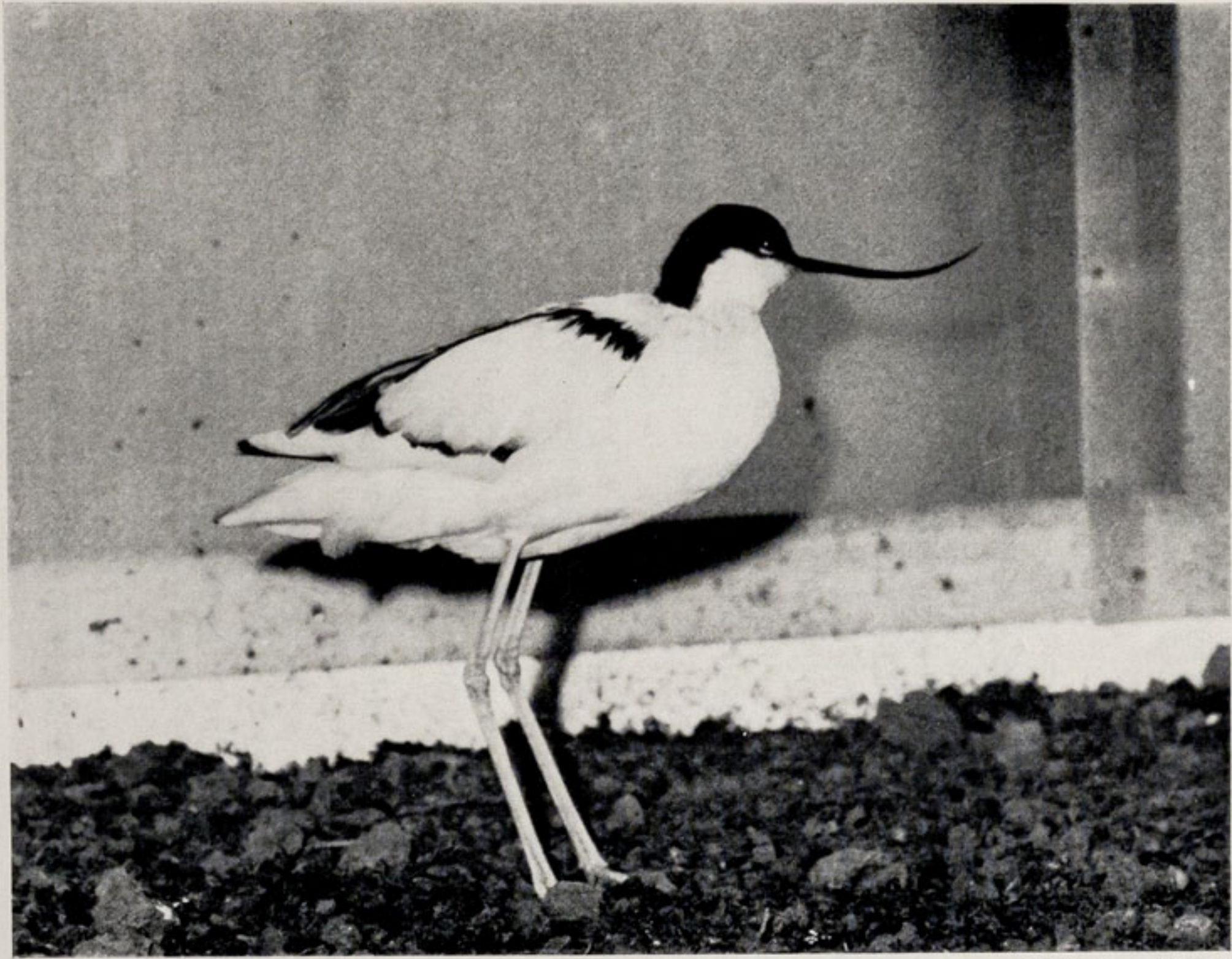
A pair of Garden Dormice have been added to those already in the Nocturnal House. Garden Dormice are far larger than the Common Dormice found in this country and inhabit Central and Southern Europe. They are usually to be found in deciduous forests, gardens and parks and hibernate during the winter in holes in the ground or hollow trees. Four to six young ones are born at the beginning of the summer and are blind and naked at birth.

An Avocet was presented to the Zoo and is housed in the new Temperate Bird House where it joined the other twenty species of birds already at liberty. The Avocet is a most striking wader having pure black and white plumage, long grey legs and a long upward curving beak. They inhabit mostly coastal waters and estuaries from Europe to South Africa and Asia. In this country the Avocet was extinct for a hundred years and then bred in Suffolk during 1947. A good number now breed in Suffolk and are strictly protected in a nature reserve.

The Avocet feeds on small water organisms found in shallow water of estuaries or tidal coasts. They feed with a side to side movement of their heads, skimming food from the surface of the water or mud.

Our Avocet has settled well in its new home and spends a considerable amount of time wading in the shallow stream which runs the full length of the house.

A pair of Peruvian Cocks-of-the-Rock were received in exchange



AVOCET

*K. W. Green, A.R.P.S.*

for some Parakeets bred at the Zoo during 1965. These birds are housed in an aviary in the Temperate Bird House. The male bird is bright scarlet in colour with dark tail and wings but the female is dull being brownish tinged with red. The characteristic feature of all species of Cocks-of-the-Rock is the crest on the head which is always erect. This is far more developed in the males than in the females.

### BIRTHS

The most notable birth of the month was that of a Hippopotamus, the first to be born at the Zoo. The baby was born on the side of the pool but was led down to the water by its mother soon afterwards. The mother 'Myra' has been at the Zoo since September, 1961 and she is taking great care of the baby. The Male 'Generino' who came to the Zoo in June, 1963 was separated in case he attacked the young one. The baby Hippo has not yet been given a name, as we have been unable to ascertain its sex. It is a miniature replica of the parents and we estimate weighs in the region of 60-90 lbs. A full-grown Hippopotamus of seven to eight years old can weigh two tons and very large specimens have been known to weigh three tons.

Three Acouchies were born in the Small Mammal House. This brings the total number born during 1965 to nine.

The second Rufous-bellied Wallaby to be born at the Zoo began showing itself from its mother's pouch and can be seen in the photograph on page 7. The Rufous-bellied is one of the smaller species of Wallaby and is found in South East Australia and Tasmania. They are to be seen in the animal enclosure (No. 67 on the plan), which is next to the Waterbus Kiosk.

### ASIATIC GROUND SQUIRRELS

(*Eutamias sibiricus*)

These charming little Squirrels have been brought over to this country in considerable numbers, especially over the last year, and are commonly sold in pet shops. It is hoped that the following

information will be useful to squirrel owners as literature on this subject is very scarce. At the Zoo we have eight of these squirrels on show in the Small Mammal House, all of which have been presented by members of the public.

Asiatic Squirrels are sold under a variety of names including Siberian Chipmunk, Borunduki, Korean Squirrel, Pigmy Squirrel, Japanese Squirrel and many others. The name differences are probably due to the Squirrels having such a wide distribution area, being found in North Russia, eastwards through Siberia and the far east, Mongolia, Northern China and Northern Japan. Some variation in size and colouration occurs in squirrels from distant areas but all are typical of the Chipmunk type of squirrel. These squirrels are found in forest areas and it is obvious from the number being brought over to this country that they are plentiful in their natural habitat. Although a forest living species they are in common with the closely related American Chipmunk principally ground living animals but they can and will climb trees in search of food or to avoid enemies.

Little research into the feeding habits of the Asiatic Squirrels has been carried out but their diet is thought to resemble that of the American Chipmunk. This consists of seeds and fruit, tender buds and a few insects.

In common with other squirrels the Asiatic Squirrel goes into hibernation during the winter. The hibernation is not however complete as this species does not burn stored fat during dormancy. Instead they become torpid and wake from time to time to feed on seeds, etc., which have been collected during the previous autumn. When kept at a warm temperature, in captivity, the Asiatic Squirrel in common with the American Chipmunk sometimes goes into this torpid state during the winter. Many people have thought that their pets were unwell when in fact they were merely hibernating, not from need but from some inborn sense which tells them this is the thing to do.

Many enquiries have been received at the Zoo regarding the size of cage and diet required by these Asiatic Ground Squirrels. In the Zoo we give the animals as much room as possible and the

Ground Squirrels are housed in a spacious glass fronted compartment of the Small Mammal House. Their enclosure is decorated with natural branches and is provided with hollow logs and sleeping boxes. The temperature in the Mammal House rarely falls below 55-60°F. and this seems an ideal temperature for keeping this type of animal. They can be kept at a colder temperature or in an outside enclosure, but must be provided with a suitable place for hibernation. Even so, the chances of the animal dying during the winter are increased as in the wild state the squirrel can choose its own hibernation place.

Housing is not too difficult; of course the larger the better, but Asiatic Squirrels have been bred in a cage three feet by two feet by eighteen inches high. Cages should be provided with climbing branches and a sleeping box or hollow log. Construction can be all wire, wood sides, top and base with wire front, or wood sides, top and base with glass front. To facilitate cleaning out a sliding tray is useful and can be filled with sawdust or wood shavings. Twilweld wire mesh is most often used; the gauge required is one inch by half an inch as an Asiatic Squirrel will squeeze through anything wider. They also have sharp teeth and care should be taken; if a wooden cage is constructed, it is probably safer to reinforce the corners and edges with wire mesh or strips of tin. A wooden sided cage has some advantages over an all-mesh cage in that it keeps out draughts and provides the animal with more sense of security.

The diet of the Asiatic Ground Squirrel at the Zoo is as varied as possible consisting of fruit, green vegetables, potatoes, carrots, nuts, sunflower seeds, brown bread and an occasional mealworm. The fruit, vegetables and bread are cut into small pieces and mixed with the seeds and nuts. Quaker oats, Canary Seeds, Poultry Corn, (and many other things) are eaten readily by these Squirrels but a good variety of food will keep them in the best of health. A fresh drink of water should be provided each day; a heavy dish is best, as it cannot be knocked over.

When first brought into this country Asiatic Ground Squirrels are generally very shy and distrustful of human beings but some individuals become very tame. Taming is best done with the use of food. One should try to avoid any sudden movement and offer the



RUFOUS-BELLIED WALLABY WITH YOUNG

*Jack Smith.*

# GUIDE TO ZOOLOGICAL GARDENS

## ANIMAL FEEDING TIMES

LIONS—3 p.m. except Fridays

SEA LIONS—2-40, 3-40, 4-40 p.m.

BEARS—3-15 p.m.

POLAR BEARS—4-0 p.m.

1. MAIN ENTRANCE
2. Bird Enclosure
3. Wapiti Paddock
4. Lesser Pandas
5. Aviaries
6. Milk Bar
7. CORONATION HALL
8. CLOAKROOM, TOILETS AND FIRST AID
9. CAFETERIA
10. Shelter
11. Picnic Lawn
12. Bears
13. Animal Enclosure
14. NORTH ENTRANCE
15. AQUARIUM
16. PUSH CHAIRS AND WHEEL CHAIRS
17. Animal Enclosure
18. Animal Enclosure
19. RAINBOW CAFE AND SHOP
20. Aviaries and Picnic Lawn
21. †TOILETS
22. Peccaries
23. Waterbus Halt
24. Birds of Prey Aviary
25. Birds of Prey Aviary
26. Owls
27. †Animal Enclosure
28. Wolverines
29. Racoons
30. Coypus
31. Beavers
32. Giraffe House
33. Camel House

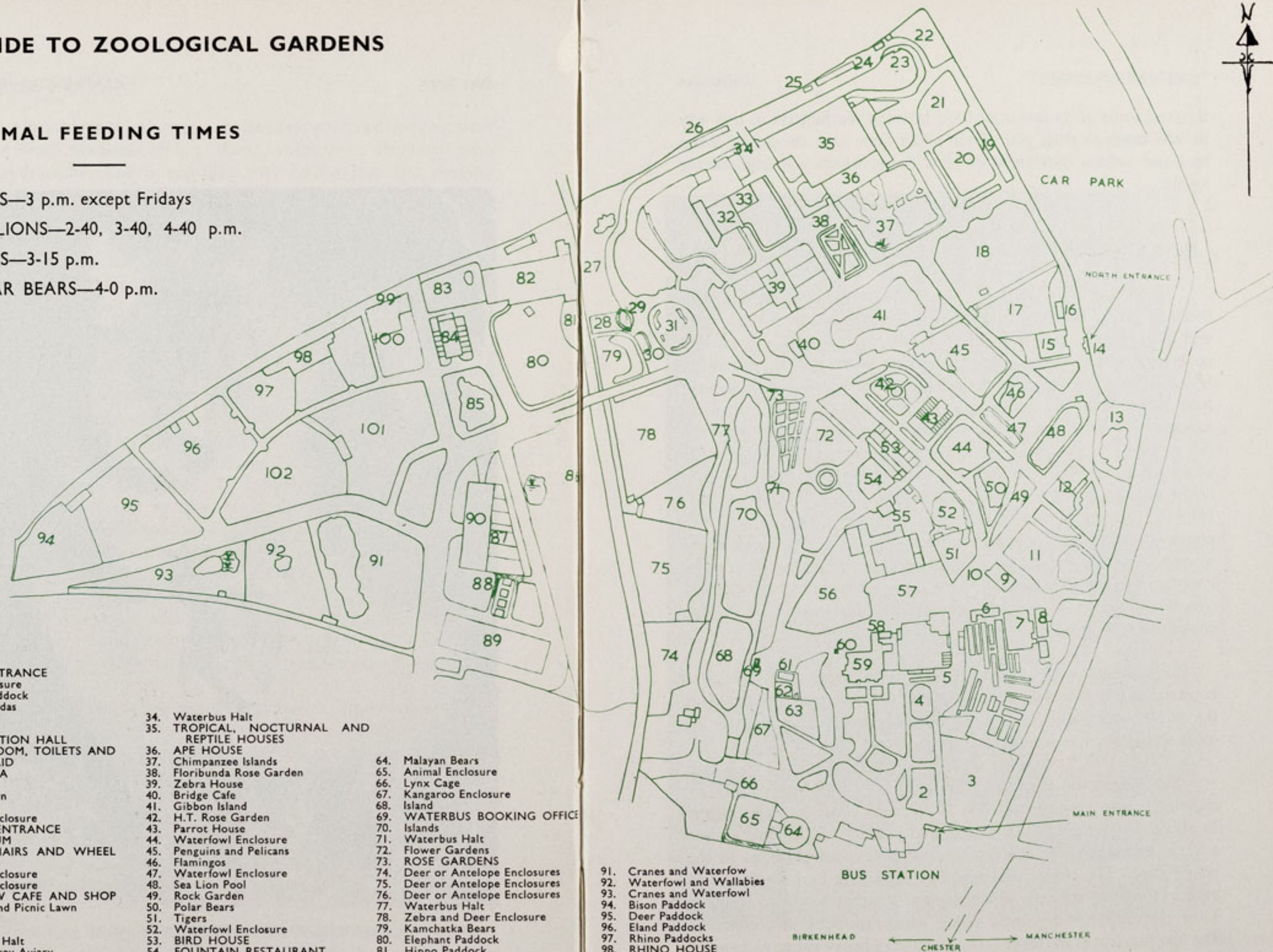
34. Waterbus Halt
35. TROPICAL, NOCTURNAL AND REPTILE HOUSES
36. APE HOUSE
37. Chimpanzee Islands
38. Floribunda Rose Garden
39. Zebra House
40. Bridge Cafe
41. Gibbon Island
42. H.T. Rose Garden
43. Parrot House
44. Waterfowl Enclosure
45. Penguins and Pelicans
46. Flamingos
47. Waterfowl Enclosure
48. Sea Lion Pool
49. Rock Garden
50. Polar Bears
51. Tigers
52. Waterfowl Enclosure
53. BIRD HOUSE
54. FOUNTAIN RESTAURANT
55. TOILETS
56. Lions
57. NEW ZOO SHOP
58. TOILETS
59. OAKFIELD RESTAURANT
60. G.P.O. Telephone Kiosk
61. Animal Enclosure
62. Jackals
63. Cheetahs

64. Malayan Bears
65. Animal Enclosure
66. Lynx Cage
67. Kangaroo Enclosure
68. Island
69. WATERBUS BOOKING OFFICE
70. Islands
71. Waterbus Halt
72. Flower Gardens
73. ROSE GARDENS
74. Deer or Antelope Enclosures
75. Deer or Antelope Enclosures
76. Deer or Antelope Enclosures
77. Waterbus Halt
78. Zebra and Deer Enclosure
79. Kamchatka Bears
80. Elephant Paddock
81. Hippo Paddock
82. PACHYDERM HOUSE
83. Tapir Paddock
84. Small Mammal House
85. Waterfowl Enclosure
86. Ankole Cattle
87. Stork Enclosures
88. Monkey Enclosures
89. †Cat House
90. MONKEY HOUSE

91. Cranes and Waterfowl
92. Waterfowl and Wallabies
93. Cranes and Waterfowl
94. Bison Paddock
95. Deer Paddock
96. Eland Paddock
97. Rhino Paddocks
98. RHINO HOUSE
99. TOILETS
100. MPILA SNACK BAR
101. Antelope Enclosure
102. Antelope Enclosure

†—Under Construction.

Animals may be moved from time to time.



Squirrel some of its favourite food between the fingers; in this way he will begin to trust you. Even when tame care should be taken to avoid sudden movement or loud noise, which will frighten the animal.

### NEW ENCLOSURES FOR ANTELOPES AND GAZELLES

Nearly two years ago a range of enclosures was constructed at the rear of the Monkey House, to accommodate the Storks, Ibis, and Cassowaries. These enclosures were surrounded with plastic-covered link netting, supported by rustic poles and a cedarwood house was erected in each enclosure. In recent times these enclosures have been used more and more at Chester Zoo to house our many species of Duikers and smaller Gazelles, and have proved ideal for this purpose. It was therefore, decided to construct a similar range of enclosures for Gazelles and to use the original enclosures to house our ever increasing collection of Storks, Ibis, and Cassowaries. Half the original Ankole Cattle field has been taken up with the construction of these new enclosures. Every effort has been made to make them as natural as possible, even to the extent of leaving a reed covered pond in the largest enclosure. They are all of sufficient size to remain grass covered with the animals installed and will enable them to graze during summer.

In common with general practice at Chester Zoo, we have constructed a flower bed between the main wire netting surround and the public walkway; this acts as a barrier, and is of course far more attractive, but serves the same purpose.

The largest of these new enclosures is forty five yards by eighteen yards and the smallest is eighteen yards by eight yards. In all there are thirteen enclosures and visitors will be able to see a very representative collection of Antelopes and Gazelles in the near future. The fences are eight feet high with two single strand pieces of wire at the very top, bringing the total height to ten feet. They are supported by rustic poles, which are sunk into concrete. The first two feet of the fence is constructed of heavy gauge galvanized weld-mesh and this is sunk into concrete. The next six feet is of green plastic-covered link netting. This netting blends extremely



HIPPOPOTAMUS "MYRA" WITH BABY

*Mr. & Mrs. E. Sorby.*

well into the background and has been used extensively at Chester Zoo. Attractively designed cedarwood houses have also been incorporated in these enclosures. When the animals are indoors they can be seen by the public through the large glass windows along the front of each house. The roof is constructed of two layers of translucent S-lon sheeting, to act as an insulator, as well as admitting light.

The first animal to be moved into the new enclosures was a Sitatunga. He was previously housed in the Zebra House and has settled down very well. The Sitatunga is a great favourite with his new keepers, being quite tame and docile at nearly all times. He is, however, quite a sizeable animal and could give a good account of himself, with his long pointed horns. Sitatungas are to be found in the swampy areas of West and Central Africa. In the wild state they frequently spend the day partially submerged in water, only coming out to graze at night. They are well adapted to their semi-aquatic environment, having very large hoofs which splay out to stop them sinking into the mud and rotting vegetation. Our Sitatunga is very active during the day but does like water and if possible will dive straight in and become almost submerged for some time.

In the next paddock to the Sitatunga is one of the rare Arabian Gazelles. This animal is a male called Rezim and has undergone a full year's quarantine at Birkenhead. Although only small, being about half the size of the Sitatunga, he is a very plucky specimen. He charges towards his keeper, his head lowered and tries to butt her; if she wants to leave the enclosure, she has to hold him by the horns.

Two of the maintenance staff found out how strong Arabian Gazelles are when they ventured into the enclosure to change a padlock the other day. Rezim lowered his head and butted them, and chased them out of the enclosure. They would not return alone and the keeper had to go in with them afterwards. The Arabian Gazelle has settled very well and although the Sitatunga is in the next enclosure the two do not bother with each other at all. We think that the sunshine we have been having recently will be of great benefit, especially to Rezim as under the Ministry of Agriculture regulations, he has had to be kept inside at our quarantine station for the past year.



SOUTH AMERICAN TAPIR

*Mr. & Mrs. E. Sorby.*

We have another four Gazelles at our Birkenhead Quarantine Station, one male and three females. These like Rezim will also have to undergo a full years quarantine and will then be moved to Chester Zoo.

Three species of Duikers and a pair of Bushback have recently been transferred from the rear of the Monkey House to these new enclosures and have settled down well in their new quarters. Other animals will be moved into these enclosures from time to time and will be featured in subsequent editions of "*Chester Zoo News*".

### UNDER-FLOOR HEATING FOR TAPIRS

The South American and Malayan Tapirs at Chester Zoo have now been provided with their own under-floor heating system. This was installed in their enclosures principally so that they have a dry area on which to lie after their cages have been swilled out first thing in the morning.

This under-floor heating is most successful and we find that after swilling down in the morning the area of the den dries out in a matter of minutes. The Tapirs obviously find this to their liking and only lie on this area of the floor. In common with normal practice in housing animals at Chester Zoo, both species of Tapirs have the run of a very large grass-covered paddock. They are also able to go for a swim in a deep pool; this they do even on very cold days during winter and we have seen them break the ice on some mornings. Now they will be able to come into their inside quarters and have a heated bed to warm them up.

The Tapirs are a great favourite with their keepers; the South American are especially tame; the Malayan, however, are not to be trusted. Their diet consists of quantities of hay, vegetables and fruit. They are also given Yogurt, which is especially conducive to their well being.

The Malayan Tapir (*Tapirus indicus*) is far larger than the closely related South American Tapir (*Tapirus terrestris*) and in colour is black with white back and flanks when adult. Malayan Tapirs have become rare over much of their range and are seldom seen in Zoological Gardens. They are nocturnal and are to be found in Southern Burma, Siam, Malaya and Sumatra. The young are black with rows of white stripes and spots which disappear

after about a year. South American Tapir adults are a brownish colour all over. The young are dark with white spots on top of the head and rows of stripes or spots along the side of the body. These spots and stripes gradually become less obvious and are lost when the animal is about two years old. South American Tapirs are found from Venezuela and the Guianas, through Brazil to Paraguay and Northern Argentina.

### ZEBRAS TRANSFERRED TO THEIR WINTER QUARTERS

At this time every year our herd of Common Zebras which now numbers ten are transferred to warmer quarters for winter at the rear of the Giraffe House. During the summer they are able to roam on a large grass-covered paddock and although they have shelter, this is not sufficient for winter. They would also over-graze their paddock if kept outside throughout the winter.

The breeding record of these Common Zebras has been extremely good this year. Four youngsters were born but unfortunately three of these were males. The breeding of Zebras in captivity is particularly important now that the Ministry of Agriculture prohibits their importation into this country. We have also bred two of the larger Grevy's Zebras which are even more valuable than the Common Zebras.

The Common Zebra is found in East Africa in Tanganyika and neighbouring Northern Uganda. They are still fairly common in some places, especially in nature reserves but the increasing needs of agriculture are encroaching on their natural environment. They are fairly hardy despite their tropical origins and at the Zoo are fed on the same diet as a thoroughbred horse:—best quality hay, some oats, bran and vegetables, especially during the winter.

### GARDEN NOTES

Winter is with us once again and we have to look back on a summer which has been disappointing, in that it has been so very wet and cold. Many plants in the garden have not been at their best because of the weather, although these conditions did suit some things very well, notably Begonias and Fuchsias. After such a bad summer, we enjoyed a very good October and this has continued into November so far. Due to this very fine October we were able to get

the beds and borders cleared, prepared and planted with the spring bedding plants without any delay. All the usual plants have again been used. The area in front of the Fountain Restaurant has been planted with Polyanthus of various colours; some 20,000 plants have been used in this area. We have kept the Polyanthus here because many of our visitors came to see them in the spring and expect now to see them in this area; also they show up to best advantage when massed in this way.

Much of the work in the gardens is routine at this time of the year, *i.e.*, the cleaning and forking of shrubberies and mulching of Rose beds. A certain amount of pruning is done, nurseries cleared and ploughed or dug as the case may be. We have quite a number of trees and shrubs which have to be moved to fresh places in the nursery, so that they do not become too well established and will lift better when we require them in the Zoo.

Work in the glasshouses is also of a more or less routine nature. Renovation and repairs have to be carried out before the borders are filled with next year's bedding. All the houses will be washed and cleaned ready for the busy time ahead during the spring.

We have not much landscape work in sight at the present time but no doubt there will be some before spring. We are renewing one Rose bed in the H.T. garden, the last to be done since the initial planting some fifteen years ago. This entails taking out all the old soil to a depth of two feet and starting again with new soil; this bed will then be planted with the variety 'Kings Ransom'.

The three cornered bed by the Brown Bear enclosures which we have used for bedding plants, is being remade and designed and will be planted with different Heathers — varieties that flower in the spring and summer will predominate.

The corner by the new shop which was not completed when the rest of the area was developed will be made into a bed with trees at the back and shrubs with some flowers at the front.

The tall Banana (*Musa paradisiaca*) in the Tropical House, this year reached the apex of the roof. In fact it has now thrown a truss of fruit although we were hoping it would not do so until next year, as we will lose that growth after fruiting. Fortunately there are many new growths on the way, some already up to the roof and these should reach the apex next year to take the place of the tree which is now fruiting.

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