

M.C. Zoological Park Chhatbir



Annual Report for the year 2017-18



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1. From the desk of Field Director



M.C. Zoological Park, popularly known as Chhatbir Zoo is an important destination in North India for Nature lovers, Tourists, Conservationists and Wildlife enthusiasts. Fulfilling the category of large zoo, the zoo continuously adds new species in its animal collection plan and new facilities for visitors every year.

The ultimate aim of administration is to make the institution Eco friendly, Animals friendly and Visitors friendly. Because of the continuous hard work of dedicated employees and support from Government, Chhatbir zoo is getting popularity day by day, which is acknowledged by the upward growing visitation year by year.

In 2017-18, apart from animal exchange programmes, a world class Walk-in-Aviary has been dedicated to the public, a new feather added in the cap of Chhatbir zoo. Providing plastic free environment, hazzle free ticketing system and congestion free parking facility to the public were other achievements, accomplished by the Zoo administration in this year.

With the continuous support and motivation, the Zoo administration will strive hard to make M.C. Zoological Park attain a remarkable position in the International map of Zoological parks. This Annual report is a testimony to the meticulous steps taken towards that goal by our dedicated team.

Dr. M. Sudhagar., I.F.S.,

***Field Director,
M.C. Zoological Park,
Chhatbir, Punjab.***



2. History of the Zoo:

The first proposal to establish a Zoological Park at Chhatbir was mooted in the year 1973. The State Government then decided to constitute committees at various levels so as to secure the co-operation, assistance, expert advice and provide co-ordination which were vital for the establishment of such an important project. A state level advisory council headed by Shri M. M. Chaudhary, the then Hon'ble Governor of Punjab was formed on 7th January, 1974 to evolve policies, broad strategies and decide about the overall plan of this Zoological Park.

A second important committee of experts under the chairmanship of Sh.G.P.S Sahi was constituted by the Government in November 1974 which included specialists and experts in zoo management, wildlife and forestry. This committee was entrusted with the responsibility of providing expert opinion on the technical aspect of animal management, zoo establishment and planning.

For co-operation between various departments associated with the establishment of Zoological Park, an implementation committee was also constituted in January 1974 under the Chairmanship of Development Commissioner, Punjab. This committee was meant to review the progress of works, discuss problems and bottle-necks encountered in the execution of this project, co-ordinate activities for speedy implementation of decisions and to approach the government for solving various problems and difficulties.

Apart from the above committees, another committee as shown in Annexure 4 was also constituted to provide expert opinion on specific subjects such as landscaping and other technical matters.

After the initial planning and finalization of zoo site, the first and foremost necessity felt was that of preparing a Conceptual Plan for a planned and systematic development of the zoo and to rule out the common shortfalls that were encountered while establishing other zoos in India. Consequently, a technical Committee consisting of the following members was set up for the preparation of Conceptual Plan:

1. Shri C.M. Sethi, I.F.S. Chief Conservator of Forests, Punjab, Chandigarh.
2. Shri N.S. Lamba, Chief Town Planner, Punjab, Chandigarh.
3. Shri Jeet Malhotra, Senior Architect O/o Chief Architect, Punjab.
4. Shri N.D. Bachkheti, Administrator, Lucknow and Kanpur Zoos, Lucknow.
5. Shri Pushap Kumar, Director, Nehru Zoological Garden, Hyderabad.
6. Shri S.K. Kapur, O.S.D.

These members assisted by Shri D.K. Behal, Architect, conceived the final plan on 29th September



1975. This plan was then finally approved by the Apex Committee presided over by His Excellency the Governor of Punjab on 27th November 1975. It was felt that this plan will work as a guide for the execution of all details in future or of any expansion in a particular pocket which may be planned at some later date. This conceptual plan was to enable the zoo experts and the architects at that time to detail out any particular pocket with some margin of flexibility according to the prevailing conditions and the configuration of the ground, yet fitting into the overall Master Layout Plan that was part of that conceptual plan.

3. **Vision of the Zoo:** The zoo has a generalized vision of creation of wildlife and nature related awareness to its visitors.
4. **Mission of the Zoo:** The mission of the zoo has been to educate and motivate the visitors of the zoo for better wildlife conservation values.
5. **Objectives of the Zoo:** M. C. Zoological Park, Chhatbir aims to compliment and strengthen the national efforts in conservation of endangered and rare species of wild fauna. Since its beginning, the park has aimed at the following objectives:
 - To support conservation of endangered and rare species through breeding under captive conditions.
 - To educate, motivate and create awareness in the society about the need for conserving wildlife, biodiversity and natural resources.
 - To provide opportunities for scientific research on wild fauna.

6. About us

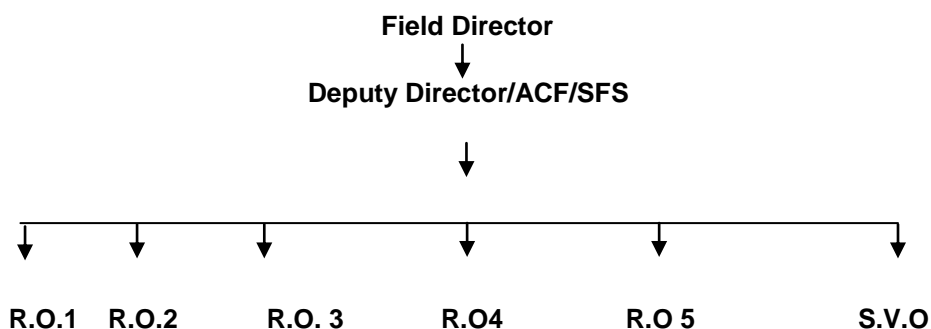
Basic Information about the Zoo		
Sr. No.	Particulars	Information
1.	Name of the Zoo	M.C.Zoological Park, Chhatbir
2.	Year of Establishment	1977
3.	Address of the Zoo	V.P.O Chhat, Tehsil: Derabassi, District : Sahibzada Ajit Singh Nagar PIN: 140601 (PUNJAB)
4.	State	PUNJAB
5.	Telephone Number	-
6.	Fax Number	-
7.	E-mail address	mcpchhatbir@gmail.com
8.	Website	www.chhatbirzoo.gov.in
9.	Distance from nearest	Chandigarh International Airport: 13 km Chandigarh Railway Station: 18 km Mohali Bus Stand: 14 km
10.	Recognition Valid upto (Date)	20.01.2019
11.	Category of zoo	Large
12.	Area (in Hectares)	202 ha.
13.	Number of Visitors (2017-18)	Adult : 502060 Children : 256859



		Total Indian : 758919
		Total Foreigners : Data not counted
		Total Visitors : 758919
14.	Visitors' Facilities Available in Zoo	<ul style="list-style-type: none"> • Battery operated vehicles: Introduced in 2009, the facility to run 16 battery operated vehicles in Chhatbir zoo has been outsourced for catering to the needs of the visitors with hop-on-hop-off system with 13 ferry stations. • Online Ticket Booking facility: since Oct. 2016. • Clean Drinking water facility: At 6 different locations across the zoo. • Toilets: At 7 different locations across the zoo. • Visitor shelters: 12 of which 8 have been recently renovated. • Canteens/Eateries: There are 3 canteens, and an ice-cream parlor • Guide map near the main gate • Directional signs and display boards wherever suitable
15.	Weekly Closure Day of the Zoo	Monday
Management Personnel of the zoo		
16	Name with designation of the Officer in-charge	Dr. M.Sudhagar IFS, Field Director
	Name of the Veterinary Officer	Dr. Ashish Kumar
	Name of the Curator	-
	Name of the Biologist	-
	Name of the Education Officer	Mr. Harpal Singh(Additional charge)
	Name of the Compounder/Lab Assistant	Mr. Bajinder Kumar Vet. Inspector Mr. Ramdev Vet. Comp. Mr. John Denial Lab. Tech. Ms. Baljt Kaur Lab. Tech.
Owner / Operator of the Zoo		
17.	Name of the Operator	Dr. Kuldip Kumar IFS
18.	Address of the Operator	PCCF (Wildlife) cum Chief Wildlife Warden, Forest Complex, Sector-68, Sahibzada Ajit Singh Nagar, Punjab.
19.	Contact details/Phone No. Of Operator	0172-2298000
20.	E-mail address of Operator	cwlwpunjab@gmail.com



7. Organizational Chart



R.O.1 : Range Officer –I (Construction and maintenance Range)

R.O.2 : Range Officer –II (Animal Management Range)

R.O.3 : Range Officer –III (Landscaping Range)

R.O.4 : Range Officer –IV (store and Procurement Range)

R.O.5 : Range Officer –V (Visitor Management and security Range)

S.V.O- (Senior Veterinary Officer)

8. Human Resources

Manpower of the Zoo*

STATEMENT SHOWING CADRE WORKING AND VACANCY POSITION OF DEPARTMENT OF FOREST

SR. NO.	NAME OF POST	F.D (Zoo) as on 31/03/18				
		Name of Employee	Cadre	Working	Vacant Posts	Remarks
1	2	3	4	5	6	7
1	IFS (senior duty post)	Dr. M.Sudhagar, IFS	1	1		
2	Senior veterinary Officer (Zoo)	Dr. Ashish Kumar	1	1		
3	EACF		2	0	2	
4	Suprintendent	Sh. Gurmeet Singh	1	1		
5	Senior Assistant	Sh. Surinder Kumar	2	1	1	
6	Clerk/Jr.Assistant	1.Sh. Avtar Singh 2.Sh. Amritpal Singh	7	2	5	
7	Technical Assistant		2	0	2	
8	Junior Engineer	Sh. Balwinder Singh	1	1		



9	Forest Ranger	1.Sh. Ravinder Singh 2.Sh. Rakesh Chander	4	2	2	
10	Dy.Ranger	1.Sh. Bhalinder Singh 2.Sh. Makhan Singh	6	2	4	
11	Forester	1.Sh. Karnail Singh 2.Sh. Harpal Singh 3.Sh. Gurmeet Singh 4.Sh. Pritpal Singh	4	4	-	
12	Forest Guard	1.Sh. Charanjit 2.Sh. Dhanwinder Singh 3.Miss Kulwinder kaur 4.Sh. Rupinder Singh 5.Sh. Kulwinder Singh 6.Sh. Shivjot Singh 7.Sh. Anil Kumar 8.Sh. Malkeet Singh 9.Sh. Gagandeep Singh 10.Sh. Mohan Singh	10	10	-	
13	Veternery Compounder	1.Sh. Bajinder Kumar 2.Sh. Ramdev ji 3.Sh. Surinder Singh	3	3		
14	Veternery Attendent		3	0	3	
15	PRO Forest & Wildlife		1	0	1	
16	Drivers	1.Sh. Labh Singh 2.Sh. Amrik Singh 3.Sh. Subhash Chander 4.Sh. Baljit Singh	4	4	^	
17	Zoo Scurity supervisor		2	0	2	
18	Zoo Lab Technician	1.Sh. John Daniel 2.Smt. Baljit Kaur	2	2	-	
19	Head Cook	Sh. Prem Dutt	2	0	2	
20	Cook		2	0	2	
21	Multipurpose Worker	1.Sh. Bala Ram 2.Sh. Malkeet Singh 3.Sh. Gurmail Singh S/o Sh. Chet Singh 4.Sh. Balraj Singh 5.Smt. Raghunathi 6.Sh. Iqbal Singh 7.Sh. Amarjit Singh S/o Sh. Prem Singh 8.Sh. Avtar Singh 9.Sh. Seo Ram S/o Sh. Surjan Singh 10.Sh. Jaggar Singh 11.Sh. Dalbir Singh 12.Sh. Gurcharan Singh	30	46		



		13.Sh. Jamil 14.Sh. Des Raj 15.Sh. Ram Singh 16.Sh. Harbans Singh 17.Sh. Guljaar Singh 18.Sh. Maghi Ram 19.Sh. Manga Singh 20.Sh. Sunil Kumar 21.Sh. Pritam Singh 22.Sh. Balwant Singh S/o Sh. Gurbaksh Singh 23.Sh. Gurnam Singh 24.Sh. Sardool Singh 25.Sh. Darshan Singh 26.Sh. Ghanshyam 27.Sh. Ajaib Singh 28.Sh. Suresh Kumar 29.Sh. Surinder Singh S/o Sh. Jagga Singh 30.Sh. Gурpal Singh 31.Sh. Darbara Singh 32.Sh. Surinder Singh S/o Sh. Mehma Singh 33.Sh. Surinder Singh S/o Sh. Babu Ram 34.Sh. Labh Singh 35.Sh. Parkash Singh 36.Sh. Sukhbir Singh 37.Sh. Amarjeet Singh 38.Sh. Ranjeet Singh 39.Sh. Sushil Kumar 40.Sh. Raj Kumar 41.Sh. Surinder Singh S/o Sh. BakhShish Singh 42.Sh. Balwant Singh S/o Sh. Jagat Singh 43.Sh. Anish Mohammad 44.Sh. Surjit 45.Sh. Prem Singh 46.Smt. Shakuntla 47.Sh. Bahadur 48.Sh. Mangat Ram				
		Sh. Anish Mohammad Sh. Surjit Singh Sh. Prem Singh Smt. Shakuntla Sh. Bahadur Sh. Mangat Ram				
22	Peon	Smt. Surinder Kaur Smt. Devi Suri Devi	3	2	1	



23	Zoo Keeper	1.Smt. Deepa Sharma 2.Sh. Makhan Singh 3.Sh. Sudhir Kumar 4.Sh. Dharampal Singh 5.Sh. J.P Nath 6.Sh. Charanjit Singh 7.Sh. Hounsla Parshad 8.Sh. Sonu Singh 9.Sh. Prithi Singh 10.Sh. Mewa Singh 11.Sh. Bant Singh 12.Sh. Mukhtiyar Singh 13.Sh. Khushaal Singh 14.Sh. Bittu 15.Sh. Moti Ram 16.Sh. Karan Singh 17.Sh. Rehmtulla	27	17	10	
24	Head Zoo Keeper		4	0	4	
25	Sanitary Inspector	Sh. Ravinderpal Singh	2	1	1	
26	Head Hygiene Worker/Hygiene Worker	1.Sh. Gurmail Singh 2.Smt. Sunita 3.Sh. Gurnam Singh 4.Sh. Jasveer Singh 5.Sh. Shiv Charan 6.Smt. Sukhmeet Kaur	23	6	17	
27	Mahavat	Sh. Aujid Thakuria	4	1	3	
28	Mechanic	Sh. Apar Apaar Singh	7	1	6	
Without Cadre						
29	Beldar	1.Sh. Apurba Deka 2.Sh. Sat Narayan 3.Sh. Pitamber	0	3		
Total			160	112		



9. Capacity Building of zoo personnel

Sr.No.	Name and designation of the zoo personnel	Subject matter of Training	Period of Training	Name of the Institution where the Training attended
1.	Harpal Singh, ZEO	Middle level officer training by CZA	10/12/2017 to 14/12/2017	Sanjay Gandhi Biological Park, Patna.
2.	Dr. M Sudhagar IFS, Field Director	Mission 20-20 (Indian Zoos)	18/12/2017 to 21/12/2017	Sh. Chamarajendra Zoological Park, Mysore.

10. Statement of income and expenditure of the Zoo

Expenditure of M.C Zoological Park chhatbir Zoo (2017-18)

Sr. No.	Name of Scheme	Actual Expenditure in 2017-18
1	Non Plan	87196642
2	Plan Scheme(Ft.21)	15686467
3	Pun Campa	22238319
4	Punjab Zoos Development Society	23472161
	Total	149688219

Revenue of Punjab Zoos Development Society, M.C. Zoological Park. (2017-18)

Sr. No.	Head	Sub head	Revenue of all wildlife division in 2017-18
1	2	3	4
1	Membership fee	-	
2	Funds obtained through national and international sources	i) Donation	33500
		ii) Endowments	
		iii) Bequests,	
		iv) Gifts.	
		v) Contributions	73700
		vi) Adoptions(Animal Adoption Scheme).	1204438.9
3	Grants &/or Grant -in-aid, recurring and non-recurring grants from following sources.	i) Central Govt.	
		ii) State Govt.	
		iii) Local Bodies/Corp. etc.	200000
4	Other Sources	1) Sale of entry tickets.	38044520.38
		2) Interest from PZDS Saving bank account including FFD	2602236
		3) Tax Refund (F.Y 2014-15) by Income Tax Department.	0
5		4) Misc.	146042
		Total	42304437.28



11. Daily feed Schedule of animals

FEED CHART CHHATBIR ZOO		
Monkeys All Species		
S.No	Particulars	Qty. of Feed in K.G.
1	Banana	2 no.
2	Papaya	0.2
3	Sweet Lime/Orange	0.5
4	Onion	0.02
5	Garlic	0.01
6	Carrot	0.05
7	Cucumber	0.05
8	Roasted G.Nut	0.05
9	Roasted B.Gram	0.05
10	Palak	0.05
11	Apple	0.25
12	Turnip	0.05
13	Bread	0.05
14	Potato	0.05
15	Cabbage	0.05
16	Peas Green	0.05
Tiger/ Lion		
1	Buff.Meat for sub adult . tiger	5 to 8
2	Buff.Meat for full grown	10
Hippo		
1	Green Fodder	100
2	Mix Crushed for animal	3
2	Mix Crushed for animal	3
3	Moong	0.5
4	Patato	1



5	Gur	0.5
6	Banana	5 no.
7	Papaya	0.5
8	Sweet Carrot	0.8
9	Bread	0.8
10	Cabbage	1
Sloth Bear		
1	Roti of Maize Crushed	0.25
2	Milk	0.25
3	Bread	0.4
4	Apple	0.3
5	Banana	3 no.
6	Papaya	0.3
7	Sweet Carrot	0.1
8	Khichri	1
Himalyan Black Bear		
1	Roti of Maize Crushed	0.25
2	Milk	0.5
3	Bread	0.2
4	Apple	0.3
5	Banana	3 no.
6	Papaya	0.3
7	Sweet Carrot	0.1
8	Khichri	1
Chinkara		
S.No.	Particulars	Qty. of Feed
1	Black Gram	0.25
2	Gur	0.1
3	Green fodder	5



Emu		
1	Black Gram	0.3
2	Onion	0.1
3	Garlic	0.04
4	Palak	0.2
5	Egg (Boild)	2 no.
6	Banana	20 no.
7	Papaya	2
8	Cabbage	0.2
9	Apple	0.6
10	Peas Green	0.4
11	Mixed Crushed for birds	0.4
Elephant		
1	Mix Crushed Roti	2
2	Gur	1
3	Black Gram	2
4	Banana	6 no.
5	Papaya	0.6
6	Green Fodder	250
Elephant (baby)		
1	Mix crushed roti	1
2	Gur	0.5
3	Black Gram	1
4	Banana	3 no.
5	Papaya	0.3
6	Green Fodder	50
Leopard/ Jaguar		
1	Buff.Meat	4
Civet/ Cat all species		
1	Buff.Meat	0.5
2	Egg (Boild)	1no.



3	Banana	1 no.
4	Milk	0.25
5	Papaya	0.1
Hog Deer		
1	Black Gram	0.1
2	Gur	0.1
3	Green Fodder	15
4	Cattle Feed	0.15
Jackal		
1	Buff.Meat	3
Chimpanzee		
1	Sugar	0.1
2	Banana	10 no.
3	Apple	0.75
4	Palak	0.2
5	Carrot	0.25
6	Egg (Boild)	1no.
7	Onion	0.1
8	Milk	0.5
9	Bread	0.2
10	Cucumbar	0.25
11	Cabbage	0.2
Birds		
White peacock/ Normal Peacock		
S.No.	Particulars	Qty. of Feed
1	Mix Sabat Dana	0.1
2	Palak	0.05
3	Garlic	0.05



4	Carrot	0.01
5	Apple	0.01
6	Peas Green	0.05
7	Cabbage	0.05
8	cucumber	0.01
Sarus Crane		
1	Mix Sabat Dana	0.2
2	Fish	0.2
3	Paddy	0.2
Pheasants all species		
1	Mix Crushed for Birds	0.1
2	Palak	0.05
3	Garlic	0.01
4	Onion	0.025
5	Banana	1no.
6	Peas Green	0.05
7	Papaya	0.1
8	Cabbage	0.05
Kaliz pheasant		
1	Mix Crushed for Birds	0.1
2	Palak	0.05
3	Wheat	0.05
4	Soyabean Crushed	0.05
5	Cabbage	0.05
Porcupine		
1	Carrot	0.1
2	Potato	0.1
3	G.Nut	0.1



4	Palak	0.2
5	Onion	0.025
6	Bread	0.1
7	Apple	0.1
8	Turnip	0.1
9	Sweet Carrot	0.1
10	Peas Green	0.1
11	Cucumber	0.1
12	Cabbage	0.2
Stork all species		
1	Fish	0.3
Common Crane		
1	Mix Sabat Dana	0.5
2	Palak	0.05
3	Cabbage	0.05
Duck all species		
1	Mix Crushed for Birds	0.2
2	Palak	0.05
3	Cabbage	0.05
Barking Deer		
S.No.	Particulars	Qty. of Feed
1	Black Gram	0.1
2	Gur	0.1
3	Green Fodder	15
4	Cattle Feed	0.15
Chousinga		
1	Black Gram	0.1
2	Gur	0.1
3	Green Fodder	15



4	Cattle Feed	0.15
Black buck		
1	Black Gram	0.1
2	Gur	0.1
3	Green Fodder	15
4	Cattle Feed	0.15
Dove/ Pegions		
1	Mix Crushed for Birds	0.05
2	Palak	0.01
3	Cabbage	0.01
Sambar/ Blue bull		
1	Black Gram	0.2
2	Gur	0.2
3	Green Fodder	25
4	Cattle Feed	0.3
Parrots		
1	Apple	0.01
2	Carrot	0.01
3	G.Nut	0.01
4	Green Chilly	0.01
5	Paddy	0.01
6	Peas Green	0.01
7	Cucumber	0.01
Budgrigars/ Love birds		
S.No.	Particulars	Qty. of Feed
1	Kangani	0.015
2	Bajra	0.005
3	Apple	0.002
4	Palak	0.005



5	Carrot	0.002
6	Cabbage	0.05
7	Cucumber	0.002
Kokatto		
1	Banana	1no.
2	G.Nut	0.1
3	Apple	0.1
4	Palak	0.1
5	Carrot	0.1
6	Cabbage	0.1
7	Cucumber	0.1
Owl/Shikara/Eagles		
1	Buff.Meat or live day old chicken	0.2
Partridge/Quales		
1	Mix Crushed for Birds	0.1
2	Palak	0.05
3	Cabbage	0.05
Munia/Finches		
1	Kangnai	0.015
2	Bajra	0.005
3	Palak	0.005
4	Cabbage	0.005
Zebra		
1	Wheat Daliya	1
2	Choker	1
3	Black Gram	0.5
4	Grass	5
Bison/ Gaur		



1	Black Gram	0.5
2	Wheat Straw	2
3	Green Fodder	10
4	G.Cake	0.25
5	Rice Bran	0.25
6	Choker	2
Affrican cape Buffellow		
1	Black Gram	0.5
2	Gur	0.5
3	Green Fodder	50
4	Cattle Feed	0.5
Goral		
1	Black Gram	0.3
2	Gur	0.1
3	Green Fodder	5
4	Maize Crushed	0.25
Swamp Dear		
1	Black Gram	0.1
2	Gur	0.1
3	Green Fodder	15
4	Cattle Feed	0.15
Crocodile/ Gharial/Rosy pelican		
S.No.	Particulars	Qty. of Feed
1	Fish	2
Indian Otter		
1	Fish	1
Tortoise all species		
1	Sattu	0.2
2	Banana	2 no.



3	Papaya	0.2
4	Palak	0.1
5	Carrot	0.1
6	Cabbage	0.1
7	Cucumbe	0.1
Extra Diet/Remarks		
2	Ice for Beer	100
4	Water Mellon (apx)~	On Vet's recommendation
5	Chicken/mutton on	On Vet's recommendation
	in case of sick, oldage	On Vet's recommendation
Preprations		
	Mix crushed for Birds	Wheat 20% Maize 20% Jawar 20% Black gram 20% Rice Kani 20%
	Sabat dana For Birds	Wheat 25% Barley 25% Paddy 20% Bajra 25%
	Mix crushed for Mammals	Black gram 50% Maize 25% Barley 25%

12. Vaccination Schedule of animals

Sr. No.	Species	Disease vaccinated for	Name of the Vaccine and dosage/quantity used	Periodicity	Remarks
1	Lions	Rabies	Nobivac-Rabies/(1ML S/c)	Yearly	
2	Tigers	Rabies	Nobivac-Rabies/(1ML S/c)	Yearly	
3	Leopards	Rabies	Nobivac-Rabies/(1ML S/c)	Yearly	



13. De-worming Schedule of animals

Sr.No.	Species	Drug used	Month
1	Lion	Ivermectin	Aug-Sep 2017
2	Tiger	Ivermectin	Aug-Sep 2017
3	Leopard	Ivermectin	Aug-Sep 2017
4	Jaguar	Ivermectin	Aug-Sep 2017
5	Hyena	Fenbendazole	Aug-Sep 2017
6	Jackal	Fenbendazole	Aug-Sep 2017
7	Cats	Fenbendazole	Aug-Sep 2017
8	Hippo	Albendazole/Ivermectin	Aug-Sep 2017
9	Porcupine	Fenbendazole	Aug-Sep 2017
10	Owl/Fruit Bat	Syp. Albomar	Aug-Sep 2017
11	Elephant	Albendazole	Aug-Sep 2017
12	Deers	Albendazole/Fenbendazole	Aug-Sep 2017
13	Bears	Albendazole/Ivermectin	Aug-Sep 2017
14	Wild Boar	Ivermectin	Aug-Sep 2017
15	Primates	Ivermectin	Aug-Sep 2017
16	Birds	Syp. Albomar	Aug-Sep 2017
17	Bison	Fenbendazole	Aug-Sep 2017
18	Reptiles	Syp. Albomar	Aug-Sep 2017

Sr.No.	Species	Drug used	Month
1	Lion	Fenbendazole	Feb-Mar 2018
2	Tiger	Fenbendazole	Feb-Mar 2018
3	Leopard	Fenbendazole	Feb-Mar 2018
4	Jaguar	Fenbendazole	Feb-Mar 2018
5	Hyena	Fenbendazole	Feb-Mar 2018
6	Jackal	Fenbendazole	Feb-Mar 2018
7	Wolf	Fenbendazole	Feb-Mar 2018
8	Cats	Praziquantel/Pyrantel Pamoate/ Fenbendazole	Feb-Mar 2018
9	Hippo	Fenbendazole	Feb-Mar 2018
10	Porcupine	Praziquantel/Pyrantel Pamoate/Fenbendazole	Feb-Mar 2018
11	Owl/Fruit Bat	Syp. Piperazine	Feb-Mar 2018
12	Elephant	Fenbendazole	Feb-Mar 2018
13	Deers	Albendazole/Praziquantel/Pyrantel Pamoate/ Fenbendazole	Feb-Mar 2018
14	Bears	Fenbendazole	Feb-Mar 2018
15	Wild Boar	Fenbendazole	Feb-Mar 2018
16	Primates	Fenbendazole	Feb-Mar 2018



17	Birds	Syp. Piperazine	Feb-Mar 2018
18	Bison	Fenbendazole	Feb-Mar 2018
19	Reptiles	Syp. Albomar	Feb-Mar 2018

14. Disinfection Schedule of Animal Complexes for 2017-18

S.No	Name of Complex	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar
1	Monkey Complex-I	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
2	Monkey Complex-II	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
3	Tiger Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
4	Hippo Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
5	Emu Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
6	Elephant Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
7	Lion Safari Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
8	Leopard Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
9	Cat Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
10	Bear Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
11	Bird Aviary	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●



12	Pheasantry	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
13	Small Deer Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
14	Off Display Area	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
15	Deer Safari Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
16	Small Bird Aviary	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
17	Zebra Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
18	Swamp Deer Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●
19	Blue Bull Complex	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●	● ● ●

●
●
●

DAILY DISINFECTION PROTOCOL

WEEKLY DISINFECTION PROTOCOL

FORTNIGHTLY DISINFECTION PROTOCOL

PARAMETERS	
PROTOCOL SHOWING WITH ● MARK	
PHYSICAL REMOVAL OF ORGANIC MATTER	
PRESSURE CLEANING WITH PLAIN WATER	
EFFICACY OF FLY-CATCHER & MOUSE-TRAP	
CLEANING OF WATERING BOWLS	
REMOVAL OF EXCRETA FROM OPEN ENCLOSURE IN A COVERED CONTAINER AND DISPOSED	
CLEANING OF FOOT-DIPS AND THEIR MATS	
DISINFECTANT USED IN FOOT-DIP (ALTERNATELY) A) 1% KMNO4 B) 1% khorsaline	
DRYING WITH FANS / EXHAUST	
PROTOCOL SHOWING WITH ● MARK	
HOT WATER SCRUBBING	
WASHING WITH PLAIN HOT WATER AND RINSE	



DISINFECTANT USED FOR CLEANING (5% SOLUTION) A)CAUSTIC SODA B) BLEACHING POWDER (NOT FOR ANIMAL'S FLOOR WASH)
--

PROTOCOL SHOWING WITH ● MARK

FLAME-GUN USE ON THE FLOOR AND WALLS OF RETIRING CELLS OF ANIMALS

Daily disinfection schedule

1. Collect all feed wastage of carnivores in the polythene disposal bag and kept in red colour bin
2. Collect all the excreta of carnivores in the polythene disposal bag and kept in the blue colour bin
3. Collect all the excreta of carnivores from the open enclosure and spread the lime powder on the soil at site.
4. Washing the floor and walls of the animal housing area with pressure pump and sweeping and wipe properly
4. Collect all the bins from the animal's houses and incinerate all the feed wastage and excreta everyday
5. Burn all the excreta and other feed wastage in incinerator or burried in the pits under the layer of lime powder
6. same procedure has been done with the feed wastage of Gharial and crocodiles also
7. All the fodder wastage and dung of herbivores also has been removed from the surrounding of animal's enclosures including the Elephants and its disposal 1 km away from the animal enclosure area and further disposal through vermicomposed or the pit composed

Weekly disinfection schedule

1. Wet the surface of floor and walls with hot boiled water
2. Spread the solution of 5% dilution with KMNO₄ / Bleaching powder/ caustic soda flakes alternatively
3. Scrapping the surface of floor and walls with iron brush
4. Rinsed the surface with hot boiled water completely
5. Dry surface with wiper or floor duster effectively

Fortnightly disinfection schedule

Flame burning of floor and walls of feeding cell on every alternate week

15. Development Works carried out in the zoo during the year (2017-2018)

Walk in Aviary

The walk-through aviary for indigenous and exotic birds is a unique exhibit of its kind in the country. There are total five theme based exhibits in the aviary. The walk-through aviary has various landscape elements to enhance the beauty of the exhibits and water bodies with meandering water channel having wooden boardwalks, paved walkways along with different kinds of galleries & railings as per the themes. Every exhibit has a separate entry and exit point linked with other exhibit by an interpretative gallery.



Entry and Exit points:

To represent the birds and their habitat in the Walk in Aviary, a grand and thematic entry and exit points has been created.



In addition to the existing landscape, hundreds of selected plants have been planted to provide perches and hiding places for the birds housed.

There are enough feeding points and nest boxes for use of the birds selectively. The inmates of the aviary are a mixture of arboreal, terrestrial and aquatic birds. It is a visitor's delight to view the free flying birds overhead.



Terrestrial concept:

The Terrestrial exhibit has predominantly Terrestrial Birds such as Rose Ringed Parakeet, Alexandrine Parakeet, Cattle Egret, Little Egret, Eurasian Spoonbill, Eurasian Collared Dove, White Ibis, White Breasted Water hen, Common Moorhen, Indian Pond Heron and Night Heron.

Rock & Duck concept:

This section of the Walk-in Aviary consists of aquatic birds including Migratory Ducks such as Spot-Billed Duck, Comb Duck, Black Swan and Lesser Whistling Duck.



Woodland concept:

The Woodland exhibit has a beautiful pair of Sarus Cranes with Jungle Bush Quail, Black Partridge and Common house sparrow. In addition to that a Mini Aviary has been created for the exotic species like Diamond Dove, Grey Cockatiel, Zebra Finches, Budgerigar and Java sparrow.

Japanese design concept:

This exhibit has a beautiful young pair of Sarus Cranes along with Jungle Babbler, Red Jungle Fowl, Tree Pie, Red Wattled Lapwing and Indian Grey Partridge.



Rainforest concept:

Largest among the exhibits, this design has a huge waterfall facility with artificial rain shower system to simulate the environment of the rainforest Ecosystem. It accommodates Painted Stork, Rosy Pelican, Grey Pelican, White Stork, Woolly-Necked Stork and Black Necked Stork.



Externally aided projects

To facilitate the cleanliness and visitors satisfaction at Chhatbir zoo, some important components have been developed like development of Primary loop with re-metaling of primary circulation along with interlocking pavers (for walking) at both sides, construction of new Kiosk near Lion safari entrance and development of eight new visitor shelters at different locations inside zoo. These three components were being developed under ADB funded project by the Punjab Heritage and Tourism Promotion Board (Statuary body under Department of Tourism, Government of Punjab) and handed over to the zoo authority in this year.



16. Education and Awareness programmes / Important Events and happenings during the year International Tiger Day 2017



On 29th July 2016 Chhatbir Zoo celebrated International Tiger day by organizing a campaign on Tiger awareness among zoo visitors. It was specifically organized at the Tiger enclosures of the zoo, So as to give realistic touch of the issue.

International Tiger Day held annually on July 29 to give worldwide attention to the reservation of tigers. It is both an awareness day as a celebration. It was founded at the Saint Petersburg

Tiger Summit in 2010. This was done because at that moment wild tigers were too close to extinction. Many animal welfare organizations pledged to help these wonderful creatures and are still helping to raise funds to reach this goal. The goal of Tiger Day is to promote the protection and expansion of the wild tiger's habitats and to gain support through awareness for tiger conservation.

Therefore, it is high time for the humankind to understand the plight of Tigers in country and do their bit in the noble cause of Tiger conservation. The zoo plays a pivotal role as far as awareness generation of wildlife in the general and Tigers in particular are concerned.



It becomes more relevant in the area of country where Tiger population does not exist in natural areas like Punjab, Haryana, HP etc. So people in this area need to be specifically made aware about the issue and importance of Tiger conservation and thus zoo's role becomes all the more important. So today's celebration of International Tiger day in Chhatbir zoo has played a significant role in creation of awareness about Tiger conservation where school children of various schools apart from common visitors were enlightened about the subject.



Celebration of Wildlife Week 20C17 at Chhatbir Zoo

Prepared by : Harpal Singh Zoo Education Officer

Wildlife Week 2017 has been successfully celebrated at Chhatbir Zoo. Various events and activities were organized to create awareness towards “*Nature and Wildlife*”. Everything were planned in the month of September 2017 to run all the activities and events smoothly. The entry of the visitors was allowed free during Wildlife week 2017 from 3rd October 2017 to 8th October 2017. Proper branding and promotion with banners and news were planned and covered accordingly.



Many schools from surrounding urban and rural area were invited properly through written formal letters. All the Government and private schools were invited. The schedule which were chalked out to celebrate the wildlife week 2017 is given as under.



Schedule of Events for “Wildlife Week Celebrations,2017”

Date	Events	Time		Remarks
3.10.2017 (Tuesday)	Wildlife Awareness Rally	9.30 am to 11 am		Mohali
03.10.2017 (Tuesday)	Zoo Keppers Talk on Tigers	11.30 am to 1.00 pm 2.00 pm to 3.30 pm		Tiger Complex
4.10.2017 (Wednesday)	Essay Writing Competition Middle Category Class 6 th to 8 th	Registration Time (10:00 am to 11:00 am)	Event Time (11:00 am to 1:00 pm)	Only 3 participant students will be allowed in each category from one school. Students will carry their own hard board.
	Essay Writing Competition Senior Category Class 9 th to 10 th	Registration Time (10:00 am to 11:00 am)	Event Time (11:30 am to 1:00 pm)	
	Painting Competition Junior Category Class 1st to 5th	Registration Time (10:00 am to 11:00 am)	Event Time (11:00 am to 1:00 pm)	Only 3 participant student will be allowed in each category from one school. Students will be allowed to use only colors provided by the Zoo management. Students will carry their drawing boards only. Only 3 participant students will be allowed in each category from one school.
	Painting Competition Middle Category Class 6 th to 8 th	Registration Time (10:00 am to 11:00 am)	Event Time (11:30 am to 1:00 pm)	
	Quiz Competition Senior Category Class 9 th to 10 th	Registration Time (10:00 am to 11:00 am)	Event Time (11:30 am to 1:00 pm)	No limit of Students
4.10.2017 (Wednesday)	Reptile expert's Talk and show	11.30 am to 1.00 pm 2.00 pm to 3.30 pm		Reptile house
5.10.2017 (Thursday)	Zoo Keeper's Talk	11.30 am to 1.00 pm 2.00 pm to 3.30 pm		Elephant Complex
6.10.2017 (Friday)	Zoo Keeper's Talk	11.30 am to 1.00 pm 2.00 pm to 3.30 pm		Leopard Complex
7.10.2017 (Saturday)	Zoo Keeper's Talk	11.30 am to 1.00 pm 2.00 pm to 3.30 pm		Bear Complex
7.10.2017 (Saturday)	Photography competition for amateur photographers based on theme	11.30 am to 3.30 pm		Theme 1.People animal interface 2.Animal emotions
7.10.2017 (Saturday)	Outreach Educational Activity (Street Play)	5.30 pm to 6.30. pm		Chandigarh or Mohali or zoo
8.10.2017 (Sunday)	Valedictory function	11.30 am to 1 pm		Shallow lake park

Whole week were celebrated according to the pre-planned programme as per schedule



2nd October 2017

Due to National holiday **“Gandhi Jayanti”** zoo was closed for the visitors. On this day whole staff of the zoo participated voluntarily in the zoo cleanliness drive as a little contribution in the **“Swachh Bharat Mission”**

3rd October 2017

On 3rd October, 2017 Chhatbir Zoo organized wildlife awareness campaign in the shape of a rally at Mohali in the collaboration with The Shamrock Sen. Sec. School Mohali. The rally started from the school area of Sector 69 and covered Sector 68, Punjab Forest Headquarters and back to the school. With the Cooperation of Mohali Local Administration and Police, the rally went successful by raising awareness slogans and Wildlife Conservation messages. Around 200 students, teachers and the official team of Chhatbir Zoo participated in this rally with high spirits. By seeing the young kids and dedicated Wildlife team, the Local people became enthusiastic and showed warm waves to the rally. The Chhatbir Zoo has initiated its public outreach programme of the Wildlife Week -2017 by giving a strong message regarding protection and conservation of Wild animals by involving school students. This even has been covered by various newspapers.



Apart from this, Chhatbir Zoo has organised Zoo Keepers talk today. The Zoo Keeper of the Tiger enclosure interacted with the visitors by sharing the knowledge about the importance of Tiger and its behaviour. The visitors, with all the interest, cleared their doubts about the tiger in the zoo and thanked the zoo keeper. This event also published in leading newspapers.





4th October 2017

wildbuzz

VIKRAM JIT SINGH



ZOOS VERSUS FREEDOM

Asked to paint on the theme of animals in the wild versus zoos, an estimated 80% of the children delivered a colourful, sensitive and love-filled verdict in favour of the latter. Deeply concerned, children discounted the freedom afforded by jungles and felt that wildlife was happier in zoos, better looked after and fed, and shielded from such threats as poaching/hunting, tree felling, contamination and other forms of human exploitation.

Such an unusual reflection of children's thoughts --- contrary to presumptive notions of freedom's supreme allure --- came to the fore during a painting competition organised at Chhatbir zoo on October 4 to celebrate "Wildlife Week". As many as 168 children (classes 1-8) drawn from 29 tricity schools participated.

The budding and creative souls expressed themselves through imagi-

native blurbs in the paintings such as a peacock declaring to a fellow avian: "Such a great life! The zoo is safer than the forest." That same painting had a parallel depiction of a hunter taking aim at a bird in the jungle and the targeted avian declaring wistfully: "I wish I was in the zoo. At least I was safe there."

The children's quixotic world view tilts against the broad emphasis of governmental forest and wildlife policies or even those lobbies wanting zoos closed. Innocent kids may not have adequate exposure to the wilderness and their views are shaped by a predominantly negative media that lacks a sense of the "bigger picture". However, what cannot be trifled is the children's purity of sentiment. They are right also, to an extent: vultures are safer in captivity than freedom granted in a contaminated, killer countryside!

Hopefully, the wilderness will not



Paintings depict animals and birds feeling safe and happy in zoos.

COURTESY : MC ZOOLOGICAL PARK, CHHATBIR

As a part of Wildlife Week Celebration 2017 in Chhatbir Zoo on 4th October 2017 various students from various schools of nearby areas in which total of 226 students from 22 schools participated in events like Painting competition (Junior and middle category), Essay writing competitions (middle and senior category) and Quiz competition. Students shown keen interest in various competitions to make it a successful event. The unique outcome of competition events has been published in a very famous column of **Hindustan Times "Wild Buzz"**



Apart from above the programme named Reptile expert's talk and show was also conducted at Reptile House which also received great response from students and other visitors. Today the total visitation in the Zoo was 5043 visitors which included near about 2600 school students from about 42 different schools apart from more than 2400 common visitors. This event gave a strong courage to the visitors and this event has been covered in various newspapers



5th October 2017

On 5th October 2017 Zoo Keeper's talk held at elephant complex where the Mahouts of Chhatbir zoo were deputed to satisfy the queries of the visitors regarding the Elephants.

Although it was a big festive day "**Karva Chauth**" but 30% more visitors visited on this day. Total presence were 3160 visitor as the average visitation is about 1800 to 2000 visitor per day

6th October 2017

6th October were selected for the Leopard section where the experienced zoo keeper of Chhatbir zoo shared their experience with the visitors. Few local newspaper covered this event. 3160 visitor enjoyed the soothing weather of the zoo on 6th October.



7th October 2017

3 events were scheduled for 7th October one was Zoo Keeper's talk second was photography competition for amateur photographers and third was a street play. Total 46 amateur photographer were register their name for this event.

This photographic competition was based on 2 themes. 1st theme was "**People animal interface**" and 2nd was "**Animal emotions**" Many fantastic pictures were submitted by these photographers which will be used in the future for educational and awareness publication of the zoo.



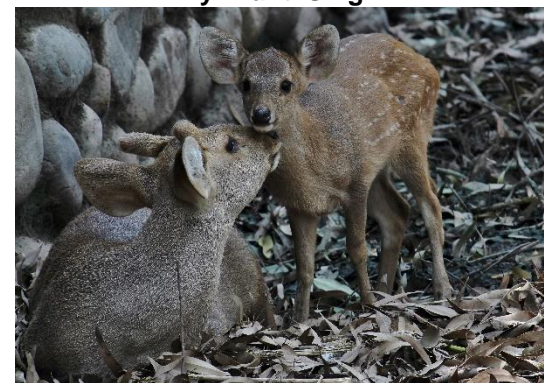
By Ankan Sarwata



By Kranti Singh



By Shaurya Bali



By Manik Kapur

"Hum Zinda Hain" A strong message on Wildlife protection was depicted through a **nukkad naatak** (street play) by **Alankrit theatre group** on 7th October 2017 at Chhatbir Zoo. It said that the ecological balance should be maintained by conserving wildlife and their habitat. The Visitors were memorized by the wonderful performance by the students volunteers who are also keen wildlife's.

The Bear complex's zoo keeper engages for zoo keeper's talk on 7th October 2017. Total 2941 visitors visited on this day. All the events and activities of the zoo were positively published in the leading newspapers.



A street play in progress during the National Wildlife Week. /pgrn/rgg

Street play, photography competition held to mark National Wildlife Week

EXPRESSNEWS SERVICE
CHANDIGARH, OCTOBER 7

THE SIXTH day of National Wildlife Week being held at the Mahendra Chaudhary Zoological Park in Zirakpur witnessed several activities ranging from zookeeper talk to photography competition for amateurs and nukkad naat on Saturday. An interaction show on bears was also arranged in which zookeeper Dharampal shared his experience of 30-years on how he takes care of the reeds and maintenance of bears. At present, the zoo has two species of bears- Asiatic Black Bears and Sloth bears.

Around 46 amateur photographers took part in the photography competition based on two

themes 'around wild treasures' and 'Explore the wild emotion'

A message on the importance of protecting the wildlife was spread through a street play performed by Alankrit theater

group. The theme of the play was 'Jai karni usadhi' (as you sow, so shall you reap) in which the artists highlighted how human beings are destroying wildlife and disrupting ecological balance through deforesting, poaching animals for their horns, skins and other parts to earn money. The play revolves around the story of a lion whose cubs are killed by humans. When lions gather at a meeting, they get to know other animals too suffered due to the cruel deeds of humans. In the end, human beings are made to realize by these jungle dwellers how important they are for life in Earth. The play ends with a social message that ecological balance should be maintained by conserving wildlife.



8th October 2017

The newly acquired animals were released on 8th October in their respective enclosures for the display of the visitors. The Chakur partridges and Royal snakes acquired from



Jammu Zoo in the animal exchange were released by Worthy Principal Chief Conservator of Forests (Wildlife)

The valedictory function of Wildlife Week celebration 2017 was conducted on 08.10.2016 Worthy Principal Chief Conservator of Forests (wildlife), Punjab was the Chief Guest of valedictory day who came along-with Ms. Nidhi Srivastava, IFS, Conservator of Forests (Wildlife), Parks and Protected Areas Circle, Punjab. On this occasion tiny tots of Genius world school presented a play with a great message on **“Save Wildlife Save Mother Earth”**.

Genius word School also show an exhibition on **“Best out of waste”** in this exhibition the students and teachers exhibit the beautiful creatures created from the house waste items which can be used as decoration.

After that a message on conservation of Nature and our social duties towards environment has been given by the worthy Chief Wildlife on this day. He explained about the efforts of the department done for the environmental protection and Wildlife conservation. He also express his thoughts regarding global environmental



Kuldeep Kumar, Principal Chief Conservator of Forests, looks at the art work on display; and (below) a pair of Royal Indian Snake in an enclosure at Chhat Bir Zoo on Sunday. PHOTOS: NITIN MITTAL

CHANDIGARH Tribune Mon, 09 October 2017
epaper.tribuneindia.com//c/227557



threats and congratulate to the Zoo Authorities for their successful celebrations of wildlife week 2017. He specially mentioned about the article **“Wild buzz”** published in the newspaper.



Contribution to create nature awareness of Chhatbir zoo and other protected areas of the state were explained by the Zoo Controller and Conservator of Forest (Wildlife) Ms. Nidhi Srivastva in her speech.

After that the Vote of Thanks were presented by the Field Director Chhatbir Zoo Dr. M.Sudhagar IFS. He threw a light on the contribution of all the NGOs, Institutes, Volunteers and staff of the zoo who make Wildlife Week Celebrations successful.

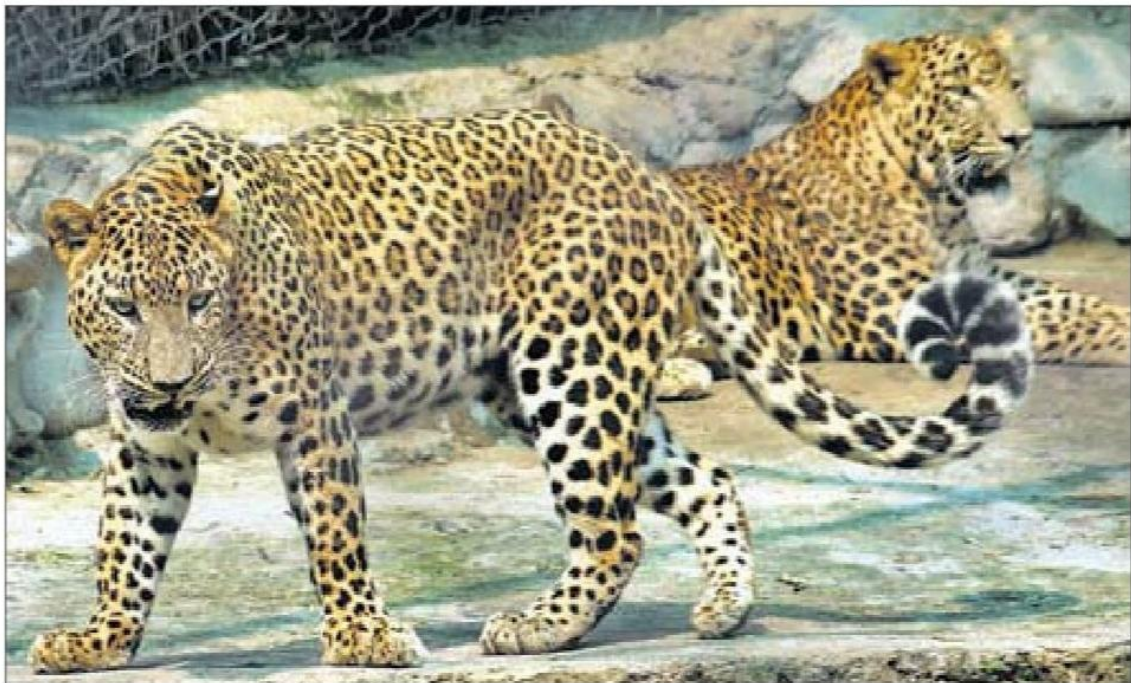


The Volunteers, Coordinators, Leading adopters and winners of the various competitive events were awarded with trophies and certificates. The participation certificates were distributed to all the students who participated in these competitions.





HOT SPOTS



■ A pair of leopards at the Chhatbir zoo on Tuesday. Entry to the zoo is free during the Wildlife Week celebrations that will culminate on Sunday. The authorities have lined up a number of activities during the week. >>MORE ON P5

SUSHIL PRAJAPATI/HT



WILDLIFE WEEK

Chhatbir Zoo adds three new species to its family

Shub Karman Dhaliwal

■ Shubkarman.dhaliwal@htlive.com

MOHALI: Ahead of the National Wildlife Week, Mahendra Chaudhary Zoological Park — popular as Chhatbir Zoo — has welcomed seven new members belonging to three species — Indian wolf, Royal snake and Chukar partridge.

With this, the total number of species at the zoo has reached 103. According to the inventory that took place in June this year, the zoo has 1,250 birds and animals.

Acclimatising to the new environment right now, the new entrants will be released in their enclosures for public viewing by October 8, during the weeklong celebrations that begin on Tuesday.

EXCHANGE PROGRAMME

The zoo authorities have brought in three wolves in exchange of swamp deers in an exchange programme with the Jaipur zoo.

“At present, no one is allowed to enter their enclosure or even meet them apart from the zookeeper. However, we will unveil them during the wildlife week celebrations,” said M Sudhagar, field director of the zoo.

Among other exchanges is a new reptile: Royal snake, which has two to three distinct patterns during different life stages. It is found in deserts and semi-arid regions



■ A representative image of Indian wolf. Still acclimatising to the new environment, the seven animals and birds will be released in their enclosures for public viewing by October 8.

of North-West India — from Kutch in Gujarat to non-Himalayan parts of Jammu and Kashmir. The zoo has acquired two of these snakes in an exchange programme with the J&K zoo.

Also, adding to its tally of birds, the zoo has brought two Chukar Partridges in exchange of a painted stork from J&K. The bird has well-marked black and white bars on the flanks and black band running from the forehead across the eye. The bird is around 32-35cm long with a light brown back, grey breast and buff belly.

The other recent entries in the zoo are grey pelicans, star tortoise, ostrich, otters and mouse deer.

In an outreach programme, the zoo officials will hold an awareness rally for schoolchildren in Mohali on Tuesday morning. Also, zookeepers will hold an

THE NEW ENTRANTS

Indian wolf: A sub species of grey wolf, it is found in the Indian subcontinent. They are smaller, more slightly built, and have shorter fur.

Royal snake: The reptile bears two or three distinct forms during the three life stages; found in desert and semi-arid regions in North-West India.

Chukar partridge: A gamebird, it belongs to the pheasant family. Around 32-35cm long, the rotund bird has a light brown back and grey breast

interactive session with schoolchildren visiting the park.



CELEBRATING WILDLIFE AT CHHATBIR



Emu

CHANDIGARH: Wildlife week celebrations began on Tuesday at Mahendra Zoological Park, also known as Chhatbir Zoo, where visitors observed a wide variety of fauna. The entry to the zoo during the week-long celebrations is free for all.

Under wildlife week, which will last till October 8, the zoo authorities will also introduce three new species namely Indian wolf, chakur partridge and royal snake into their new enclosures. On Wednesday (October 4), the zoo authorities will host drawing, quiz, painting and essay-writing competitions for the school students visiting the zoo. The visitors will be provided with the insights on various reptiles present in the zoo.

Subsequently, from October 5-6, the zoo will hold a talk with zookeepers, who will provide information on over 100 species. On October 7, the zoo authorities plan to hold a theme-based photography session along with a street play in Mohali or Chandigarh. The celebrations will conclude on October 8 with a valedictory function.

HTC

PHOTOS: SUSHIL PRAJAPATI



Rat snakes

Star tortoise

Monitor lizard

Rock python

ਛੱਤਬੀੜ 'ਚ ਮਨਾਇਆ ਜੰਗਲੀ ਜੀਵ ਸੁਰੱਖਿਆ ਹਫ਼ਤਾ

ਤਰਨਪ੍ਰੀਤ ਸਿੰਘ, ਜੀਰਕਪੁਰ

ਛੱਤਬੀੜ ਚਿੜੀਆਖਰ ਵਿਖੇ 3 ਅਕਤੂਬਰ ਤੋਂ 8 ਅਕਤੂਬਰ ਤਕ ਮਨਾਏ ਗਏ ਜੰਗਲੀ ਜੀਵ ਸੁਰੱਖਿਆ ਹਫ਼ਤੇ ਦੇ ਆਖਰੀ ਦਿਨ ਸਮਾਪਤੀ ਸਮਾਰੋਹ ਕਰਵਾਇਆ ਗਿਆ। ਸਮਾਰੋਹ ਦੌਰਾਨ ਪ੍ਰਧਾਨ ਮੁੱਖ ਵਣ ਪਾਲ (ਜੰਗਲੀ ਜੀਵ) ਪੰਜਾਬ ਡਾਕਟਰ ਫੁਲਦੀਪ ਮੁਖਰ ਆਈਓਐੱਸ ਨੇ ਮੁੱਖ ਮਹਿਮਾਨ ਵਜੋਂ ਅਤੇ ਵਣ ਪਾਲ (ਜੰਗਲੀ ਜੀਵ) ਤੇ ਚਿੜੀਆਖਰ ਦੀ ਕੰਟਰੋਲਰ ਨਿੱਧੀ ਸ਼ੀਵਾਸਤਵਾ ਆਈਓਐੱਸ ਨੇ ਵਿਸ਼ੇਸ਼ ਮਹਿਮਾਨ ਵਜੋਂ ਸ਼ਿਰਕਤ ਕੀਤੀ। ਸਮਾਰੋਹ ਦੌਰਾਨ ਮੁੱਖ ਮਹਿਮਾਨ ਵੱਲੋਂ ਇਸ ਹਫ਼ਤੇ ਦੌਰਾਨ ਕਰਵਾਏ ਗਏ ਵੱਖ-ਵੱਖ ਮੁਕਾਬਲਿਆਂ ਵਿੱਚ ਹਿੱਸਾ ਲੈਣ ਵਾਲੇ ਵਿਦਿਆਰਥੀਆਂ ਨੂੰ ਇਨਾਮ ਤਕਸੀਮ ਕੀਤੇ ਗਏ।

ਚਿੜੀਆਖਰ ਦੇ ਫ਼ੀਲਡ ਡਾਇਰੈਕਟਰ ਐੱਮ ਸੁਦਾਗਰ ਵੱਲੋਂ ਇਸ ਹਫ਼ਤੇ ਦੌਰਾਨ ਤਨਦੇਹੀ ਨਾਲ ਮਿਹਨਤ ਕਰਨ ਵਾਲੇ ਵਲੰਟੀਅਰਾਂ, ਸਕੂਲੀ ਵਿਦਿਆਰਥੀਆਂ ਅਤੇ ਅਧਿਆਪਕਾਂ ਨੂੰ ਵੀ ਵਿਸ਼ੇਸ਼ ਤੌਰ 'ਤੇ ਸਨਮਾਨਿਤ ਕੀਤਾ ਗਿਆ। ਜੂ ਐਂਜੂਕੇਸ਼ਨ ਅਡਸਰ ਹਰਪਾਲ ਸਿੰਘ ਨੇ ਦੱਸਿਆ ਕਿ ਇਸ ਹਫ਼ਤੇ ਦੇ ਪਹਿਲੇ ਦਿਨ 3 ਅਕਤੂਬਰ



ਮੁਕਾਬਲਿਆਂ ਵਿੱਚ ਭਾਗ ਲੈਣ ਵਾਲੇ ਵਿਦਿਆਰਥੀਆਂ ਨੂੰ ਇਨਾਮ ਤਕਸੀਮ ਕਰਨ ਮੌਕੇ।

ਨੂੰ ਮੋਹਾਲੀ ਵਿਖੇ ਸ਼ੈਮਰੋਕ ਸਕੂਲ ਦੇ ਵਿਦਿਆਰਥੀਆਂ ਵੱਲੋਂ ਵਾਈਲਡ ਲਾਈਫ ਅਵੇਅਰਨੈਸ ਹੋਲੀ ਕੱਢੀ ਗਈ ਸੀ ਅਤੇ ਬਾਅਦ ਵਿੱਚ ਚਿੜੀਆਖਰ ਵਿਖੇ ਸ਼ੇਰਾਂ ਦੇ ਜੀਵਨ ਤੇ ਜੂ ਕੀਪਰ ਟਾਕ ਕਰਵਾਈ ਗਈ। 4 ਅਕਤੂਬਰ ਨੂੰ ਸਕੂਲੀ ਵਿਦਿਆਰਥੀਆਂ ਦੀਆਂ ਵੱਖ-ਵੱਖ ਸ਼੍ਰੇਣੀਆਂ ਜੂਨੀਅਰ

ਕੈਟਾਗਿਰੀ, ਮਿਡਲ ਕੈਟਾਗਿਰੀ ਅਤੇ ਸੀਨੀਅਰ ਕੈਟਾਗਿਰੀ ਦੇ ਲੱਖ ਮੁਕਾਬਲੇ ਅਤੇ ਪੇਂਟਿੰਗ ਮੁਕਾਬਲੇ ਗਏ ਸਨ। ਇਸੇ ਦਿਨ ਹੀ ਰੈਪਟਾਈਲ ਹਾਊਸ ਵਿਖੇ ਜਾਨਵਰਾਂ ਦੇ ਮਾਹਿਰਾਂ ਵੱਲੋਂ ਰੋਗਾਂ ਵਾਲੇ ਜੰਤੂਆਂ ਸਬੰਧੀ ਸੈਲਾਨੀਆਂ ਨੂੰ ਜਾਣੂ ਕਰਵਾਇਆ ਗਿਆ। 5 ਅਕਤੂਬਰ ਨੂੰ ਜੂ

ਕੀਪਰ ਟਾਕ ਦੌਰਾਨ ਐਲੀਫੈਂਟ ਕੰਪਲੈਕਸ ਵਿਖੇ ਹਾਥੀ ਦੇ ਜੀਵਨ ਬਾਰੇ ਮਾਹਿਰਾਂ ਵੱਲੋਂ ਸੈਲਾਨੀਆਂ ਨੂੰ ਵਿਸਥਾਰ ਪੂਰਵਕ ਜਾਣਕਾਰੀ ਦਿੱਤੀ ਗਈ। 6 ਅਕਤੂਬਰ ਨੂੰ ਲੈਪਡ ਅਤੇ 7 ਅਕਤੂਬਰ ਨੂੰ ਰਿਫ਼ਾ ਦੇ ਜੀਵਨ ਸਬੰਧੀ ਜੂ ਕੀਪਰ ਟਾਕ ਰਾਹੀਂ ਜਾਣਕਾਰੀ ਦਿੱਤੀ ਗਈ। ਇਸੇ ਦੌਰਾਨ ਫ਼ੋਟੋਗ੍ਰਾਫੀ ਮੁਕਾਬਲੇ

ਸੈਲਾਨੀਆਂ ਨੇ ਲਿਆ ਬੜੇ ਉਤਸ਼ਾਹ ਨਾਲ ਹਿੱਸਾ, ਭਾਗ ਲੈਣ ਵਾਲੇ ਜੇਤੂਆਂ ਨੂੰ ਇਨਾਮ ਵੰਡੇ

ਵੀ ਕਰਵਾਏ ਗਏ ਅਤੇ ਜੰਗਲੀ ਜੀਵਨ 'ਤੇ ਆਧਾਰਤ ਇੱਕ ਨੁਕੜ ਨਾਟਕ 'ਹਮ ਜਿੰਦਾ ਹੈ' ਵੀ ਕਰਵਾਇਆ ਗਿਆ। ਇਸ ਤੋਂ ਇਲਾਵਾ ਇਸ ਹਫ਼ਤੇ ਚਿੜੀਆਖਰ ਵਿੱਚ ਮੌਜੂਦ ਜਾਨਵਰਾਂ ਨੂੰ ਗੈਦ ਲੈਣ ਲਈ ਵੀ ਸੈਲਾਨੀਆਂ ਨੇ ਕਾਫ਼ੀ ਦਿਲਚਸਪੀ ਦਿਖਾਈ। ਸਮਾਪਤੀ ਸਮਾਰੋਹ ਵਿੱਚ ਸੈਲਾਨੀਆਂ ਨੇ ਵੀ ਕਾਫ਼ੀ ਵਧ-ਚੜ੍ਹ ਕੇ ਹਿੱਸਾ ਲਿਆ ਅਤੇ ਆਪਣੇ ਵਿਚਾਰ ਸਾਂਝੇ ਕੀਤੇ।

ਸਮੂਹ ਸੈਲਾਨੀਆਂ ਵਿੱਚ ਕਾਫ਼ੀ ਉਤਸ਼ਾਹ ਨਜ਼ਰ ਆ ਰਿਹਾ ਸੀ। ਇਸ ਹਫ਼ਤੇ ਦੌਰਾਨ ਆਉਣ ਵਾਲੇ ਸਾਰੇ ਸੈਲਾਨੀਆਂ ਦਾ ਚਿੜੀਆਖਰ ਵਿੱਚ ਦਾਖਲਾ ਮੁਫ਼ਤ ਰੱਖਿਆ ਗਿਆ ਸੀ। ਉਨ੍ਹਾਂ ਦੱਸਿਆ ਕਿ ਇਸ ਹਫ਼ਤੇ ਦੌਰਾਨ ਕਰੀਬ 15 ਹਜ਼ਾਰ ਤੋਂ ਵੱਧ ਸੈਲਾਨੀਆਂ ਨੇ ਚਿੜੀਆਖਰ ਦੀ ਪ੍ਰਬੰਧਕਾਰੀ ਦਾ ਅਨੰਦ ਮਾਣਿਆ ਅਤੇ ਜੂ ਕੀਪਰ ਟਾਕ ਰਾਹੀਂ ਮਾਹਿਰਾਂ ਤੋਂ ਉਨ੍ਹਾਂ ਆਪਣੇ ਮਨਪਸੰਦ ਜਾਨਵਰਾਂ ਬਾਰੇ ਕਾਫ਼ੀ ਅਹਿਮ ਅਤੇ ਰੌਚਿਕ ਜਾਣਕਾਰੀਆਂ ਹਾਸਿਲ ਕੀਤੀਆਂ।



World Sparrow Day 2018



17. Seasonal special arrangements for upkeep of animals

Summer care arrangements

M.C. Zoological Park Chhatbir is primarily established with the objective of conservation of rare fauna, education and awareness on wildlife to general public and research on the wildlife behavior and disease management. The Chhatbir zoo have trained and dedicated manpower for the management of zoo animals. Every year special seasonal care and support is provided to the animals for their better up-keep. Zoo management tries its best to provide hygienic and comfortable environment to keep them stress free. The summer care arrangements done by the Chhatbir zoo as given below.

Environmental Care:

Carnivores: Desert coolers and air circulator fans have been provided in the night shelters of all the Tigers, Leopards, Lions, Bears and other feline/canine. Animal management cell is all time vigilant to make sure that the houses and night shelters remain cool and dry. All the windows have been covered with mesh/jali to keep mosquito free environment. The few areas of houses and enclosures also have been shaded with 75% density agro-net which helps to decrease the surrounding temperature. Tankers and tractors are always in standby mode to ensure the uninterrupted supply of water everywhere in the zoo in case of emergency.

Herbivores: Creation of temporary shelter/hut made from kanna (Sacram munja) and wooden logs and bamboo etc. for safety against heat stroke and hard sunlight in all the enclosures of herbivores animals. Muddy shallow pool duly filled with water have been made in elephant enclosure, Manipur deer enclosure, Swamp deer enclosure and Deer safari for volleying and mud bath of animals. Concrete water pool are also being kept full of water round the clock. The few patches in the enclosures also have been covered with agro-net of 75% density for better cool effect.

Birds: All the cages of birds have been covered with agro-net of 75% density and jute mat tightly to save birds from hot air and hard sunlight to save them from heat stroke. The sprinkler showers have been provided to peasantry and small aviary to make the birds more happy and comfy.

Dietary Care:

Ice cube (100 kg) to each bear every day during whole of the summer season.

Water-melon are being provided to all the monkeys, bears and elephants.

Glucon-D powder mixed in the drinking water of all the carnivores and omnivores animals.

Banana fruit has been replaced with papaya during summers.

Cabbage leaves has been replaced with spinach leaves for animals and birds during summers.

Reddish has been replaced with cucumber for animals and birds during summers.





Winter care arrangements

M.C. Zoological Park Chhatbir is primarily established with the objective of conservation of rare fauna, education and awareness on wildlife to general public and research on the wildlife behavior and disease management. There is a small lake where hundreds of migratory birds visit every winter. The Chhatbir zoo having trained and dedicated manpower. Every year special seasonal care and support has been provided to the animals for their better up-keep. Zoo management tries its best to provide hygiene and comfortable environment to keep them stress free. The winter care arrangements done by the Chhatbir zoo as given below

Environmental Care:

Carnivores: Room heaters and heat convectors have been provided in the night shelters of all the Tigers, Leopards, Lions and other small cats. All the windows and openings have been covered with polythene sheets or fiber sheets.

Herbivores: Creation of temporary shelter/hut made from kanna (secrem-munjja) Thach and wooden logs and bamboo etc. with the help of binding wire and ropes with the facility of water proof arrangements (black tarp fixed in the roof) in all the enclosures of herbivores animals. Paddy straw and wheat husk bedding have been provided to all the herbivores animals for cozy flooring.

Birds: All the cages of birds have been covered with fiber cloths, jute mat and polythene sheets tightly to save them from wind chill and winter rain. Paddy straw, wheat husk and rice bran bedding have been provided to all the birds for warm nesting.

Reptiles: Reptile house has been equipped with oil fin heaters which are very good for reptiles as these heaters are not effecting the natural humidity of the enclosures. Apart that all the cells of reptiles have been provided wheat husk and dry leaf foliage which gives coziness to the reptiles. Special aquarium water heaters with water circulation system are also been provided to Turtles and Tortoises.

Dietary Care:

Honey 100 gm to each bear every day during harsh winters

Sugarcane 1 kg to each bear every day in winter season

Jiggery (Gur) 100 gm to each deer every day during harsh winters

Jiggery (Gur) 20 gm to each monkey every day during harsh winters

Sugarcane 100 gm to each monkey every day in winter season

Sugarcane 100 kg to each elephant every day in winter season

Alsee seeds and nutrition supplements to small birds





18. Research Work/Conservation Breeding Programmes carried out in the Zoo

In-situ - Ex- situ linkage

Re- introduction of gharials in beas river system

VISIT TO ECO CENTRE – DEORI, GHARIAL REARING CENTRE, MORENA; MADHYA PRADESH

On dated 25 October 2017 a team of Chhatbir zoo visited Eco Centre cum Gharial rearing Centre. The team is headed by Dr. M.Sudhagar IFS, Field Director Chhatbir zoo with following team Members.

- Mr. Harpal Singh Zoo Education Officer cum Block Officer Animal Management
- Mr. Shivjot Singh Forest Guard Animal Management

Apart from Department of Forests and Wildlife preservation Punjab the experts of 2 NGO's also called o join the exposure visit these NGOs were WWF (World Wide Fund for Nature –INDIA and TSA (Turtle Survival Alliance)

Following expert members were present from the NGOs

WWF-INDIA

- Dr. Asghar Nawab (Senior Manager-Biodiversity; WWF-India Secretariat; New Delhi)
- Ms. Gitanjali Kanwar (Senior Project Officer, WWF-India Harike Field Office; Punjab)
- Mr. Sanjeev Kumar Yadav (Co-ordinator Aquatic Biodiversity, WWF-India Hastinapur Field Office; Meerut)

TSA

- Mr. Nariman Vazifdar (Field Researcher)

OBJECTIVES OF THE VISIT:

Team visit was based on the following objectives

- To understands the Management of Gharials in captivity
- Creation of simulation of riverine habitat
- Transportation of Gharials
- Assessment of Gharial Cohorts to be brought to Punjab
- General discussion regarding husbandry, marking and behaviour aspects
- Exposure visit of natural habitat .



Team reached Morena on 24th October 2017 in the evening and DFO Morena Dr. Abdul Alim Ansari, IFS arranged boarding arrangements there and in the morning of 25th October 2017 Mr.Jyoti Prasad



Dandotiya (Forest Guard, Deori Hatchery In-charge, Morena; Madhya Pradesh) provided a guided tour to the team at eco centre and Chambal Wildlife sanctuary. Mr. Jyoti Prasad Dandotiya elaborated on the management practices adopted for the maintenance and safe keep of the captive Gharial stock. He also informed that at present there is a stock of 577 captive Gharial at the centre. The year wise live stock position at the centre was as under

- Year 2013 (21 hatchlings)
- Year 2014 (129 hatchlings)
- Year 2015 (130 hatchlings)
- Year 2016 (138 hatchlings)
- Year 2017 (159 hatchlings)



Mr. Jyoti Prasad explained that they are using intensive care with heaters and Lamp shades during winters for the first year's hatchlings. They recorded temperature and humidity and also maintain it regularly. After the completion of one year the hatchlings shifted to another enclosure which are double in size this enclosure is called yearlings enclosure.





They replace the water after every alternative day, They clean the surface of ponds and scraping it properly they use bleaching powder as a disinfectant and after applying the disinfectant they rinse it completely and refilled the pond with water,



Mr. Jyoti Prasad explained the stock of 50 Gharials (10:40) reserved for transportation to Punjab Harike Wetland for release are belongs to the batch of 2014. They measure at 1.50m; weigh around 12-16 kg. They had *scute* marked and their morphometric details recorded. The team of Chhatbir zoo restrain one reptile and identified its sexing





They also explained that the glass fixed at the surrounding of the rearing enclosures is not good. They are replacing it with proper mesh. Because glass is blocking the air circulation which is not good for the reptiles. They use polyethylene and synthetic transparent sheets and fiber sheets

They have also the facility of rearing the turtles. The enclosure is the same but pond is differently designed like a moat which helps to maintain running water system as shown in the picture



They are providing dead fish there which are freshly caught by the local vendors. These are local fish available in the ponds and water bodies nearby. The maximum size of the fish is not bigger than 50 to 60 cm.





They explained that they restocking about 150 gharials every year in the Chambal river. According to Morena Wildlife Division they do not observe the Gharials after the release in the wild.



The transportation box were also been show by them. It was a simple rectangular cuboid wooden box with the dimension of 155X50X50 cm with both side openable doors. It has been minutely observed. Few nails and shaves were seen which are sharp and can cause wound reptiles. This will be well taken care while making transportation cages at Chhatbir zoo.



It has been discussed and suggested by the expert if Chhatbir zoo wants to create a river simulation and wave generation system to build-up the muscle tone in the Gharials against the high water tides, It should be initiate with the newly born hatchlings not with already grown and reared Gharials because the muscle tonicity developed only 1st and 2nd year. The water waves also set randomly without follow any set pattern therwise the Gharials will scheduled their biological clock accordingly. DFO Morena shared the Layout maps of Gharial rearing enclosures

After the detail discussion at rearing centre the team were move to take a exposure of Chambal river which is natural habitat of the Gharial and other wild fauna. It was observed that there was plenty sandy spaces which are available for basking and nest making.



Ghariales were seen basking and some other reptiles like *Pangura Tacta* and *Nilssonia gangetica* were seen.



It was observed that the river banks were also shared by the villagers for washing clothes and bathing and they are doing their routine activities just few yards away without any fear. The Gharial seems to be very shy in their natural habitat and it sudden disappear in the water when any boat or any human tries to come closer to it. Many agricultural activities were also seen at the river bank like Tractor cultivation and water pumping which seems to be unbothered by the reptiles over there.





It also been suggested and recommended by the experts that If we reintroduce 50 Gharials in Harike or Beas river, It is necessary to restocking every year minimum 100 reptiles in 1:4 ratio continuous for minimum 10 years. After that the possibilities of establish a to 5 colonies (3 to 5 reptiles in each colony) well settled in few areas of Punjab riverine system will be a successful reintroduction.



TRANSPORTATION OF GHARIAL HATCHLINGS:

Based on the inputs received from Eco centre, Morena, keeping in view of the safety of animals and considering the distance of the travel, transportation containers dedicated to the gharial hatchlings were designed and manufactured in the workshop of zoo

QUARANTINE AND OBSERVATION:

Gharial hatchlings were maintained in a specially designed pond enclosure and regularly monitored by the animal management wing and the veterinary wing

ACCLIMATIZATION AND ADAPTATION:

After passing the initial transport stress, gradually gharial hatchlings started taking fish and showing normal behavior. Gharials were trained to swim along and against the stream by creating a strong artificial flow in the water pond. Water temperature was monitored and regulated.

LIVE FISH FEEDING:

After 3 days of continuous monitoring, live fishes were introduced in phased manner by gradually replacing the dead fishes

HEALTH AND FITNESS MONITORING:

The veterinary wing was regularly monitoring the parameters like weight, movement, feeding and growth in regular intervals. The fitness certificated before release was issued by the S.V.O of chhatbir zoo

RELEASE OF GHARIAL HATCHLINGS IN BEAS RIVER SYSTEM:

As per the directions of chief wildlife warden punjab, the date was finalised for release. The release cohorts were isolated in the ratio of 1:4 and transported to Beas river system. With the assistance of field staffs of the DFO, Ferozepur wildlife division and technical members of WWF-India, the Gharial hatchlings were released twice in the beas river of punjab, the details are as follows.







19. Animal acquisition / transfer / exchange during the year

Acquisition

1	Flap shell turtle	<i>Lissemys punctata</i>	2	DFO Wildlife	07.01.2017	Rescued by staff of DFO Wildlife ropar from the village Lohgarh, Golden enclave #151-A, these turtles were kept in the Wildlife hospital on 19.06.2017
2	Diamond Dove	<i>Geopelia cuneata</i>	10	Gift	25.06.2017	10 no. Dimond dove brought at chhatbir zoo by Mr. Jashanpreet Singh Grewal resident of village Mundia District Ludhiana. Mr. Jashanpreet Singh is a NRI whohad these exotic birds and wanted to donate these birds to chhatbir zoo.
3	Black headed royal snake	<i>Spalerosophis atriceps</i>	2	Exchange	24.09.2017	Aquired from Manda Zoo vide letter no. WLP/Plan/769-71 dated 06.09.2017 of PCCF WL cum CWLW J & K and PCCF WL cum CWLW Punjab letter no. 3875 dated 15.09.2017 and FD ZOO letter end. no. 2462-63 dated 22.09.2017 and Letter end. No. 2471-A dated 26.09.2017
4	Chakur Partridge	<i>Alectoris chukar</i>	2	Exchange	24.09.2017	
5	Indian wolf	<i>Canis lupus</i>	3	Exchange	28.09.2017	Aquired from Jaipur Zoo vide CZA letter no. Letter no. 23-5/2017-CZA (AK)/1063/2017 Dated 09.06.2017 of CZA and FD ZOO end. No.1031-32 dated 14.06.2017 and letter end. No. 2496-97 dated 26.09.2017



6	Hamadryes Baboon	<i>Papio hamadryas</i>	1	Acquired	09.03.2018	Received One male Baboon from NZP, Delhi on dated 09.03.2018 in a part of animal exchange vide CZA letter no. F.No.23-3/2017-CZA(Pt.)(PKR)/1830/2017 Dated 25.10.2017 and NZP Delhi's Director letter no. F.No.IV-16/2010-NZP/Corres/Mang./4843-19 Dated 07.03.2018 and Field Director Chhatbir Zoo's letter end. No. 4496-98 Dated 09.03.2018
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Transfer by exchange

1	Leopard	<i>Panthera pardus</i>	3	Transfer	10.08.2017	Transfer to Bathinda Zoo vide CZA letter no. F.No. 23-4/2016-CZA(AK)331/2017 dated 17.02.2017
2	Painted Stork		8	Transfer	24.09.2017	Transfer to Manda Zoo vide letter no. WLP/Plan/769-71 dated 06.09.2017 of PCCF WL cum CWLW J & K and PCCF WL cum CWLW Punjab letter no. 3875 dated 15.09.2017 and FD ZOO letter end. no. 2462-63 dated 22.09.2017 and Letter end. No. 2471-A dated 26.09.2017
3	Budgerigar		8	Transfer	24.09.2017	
4	Spot bill duck		4	Transfer	26.09.2017	
5	Lady Amherst pheasant		2	Transfer	26.09.2017	Transfer to Jaipur Zoo vide CZA letter no. Letter no. 23-5/2017-CZA (AK)/1063/2017 Dated 09.06.2017 of CZA and FD ZOO end. No.1031-32 dated 14.06.2017 and letter end. No. 2496-97 dated 26.09.2017
6	Swamp Deer		2	Transfer	30.09.2017	
7	Hamadryes Baboon	<i>Papio hamadryas</i>	1	Transfer	10.03.2018	Transfer One male Baboon to NZP, Delhi on dated 10.03.2018 in a part of animal exchange vide CZA letter no. F.No.23-3/2017-CZA(Pt.)(PKR)/1830/2017 Dated 25.10.2017 and NZP Delhi's Director letter no. F.No.IV-16/2010-NZP/Corres/Mang./4843-19 Dated 07.03.2018 and Field Director Chhatbir Zoo's letter end. No. 4496-98 Dated 09.03.2018



8	Leopard	<i>Panthera pardus</i>	1	Release	16.03.2018	Rescued by DFO Amritsir and team of Wildlife wing and Chhatbir zoo. This leopard entered in sub-urban area and conflicted with the villagers. It was brought at Chhatbir Zoo hospital on 26.12.2017. Report sent to FD zoo vide letter no. 1084-II dated 26.12.2017. This leopard was sent to Bir Talab Bathinda vide FD ZOO's Letter end. no. 4539-40 dated 15.03.2018 as per directions of Chief wildlife warden .
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20. Rescue and Rehabilitation of wild animals carried out by the Zoo

Rescue

1	Leopard	<i>Panthera pardus</i>	1	Rescue and died	28.04.2017	Rescued from DFO Wildlife Ropar in critically injured condition at 12 Pm on 28.04.2017. It was unable to move on hind limbs and kept in Wildlife Hospital under treatment it died on 07.05.2017
2	Monitor Lizard	<i>Varanus bengalensis</i>	1	Rescue and release	16.05.2017	One monitor lizard rescued from Zirakpur (Baltana) from a shoeroom on the telephonic order of Field Director Chhatbir Zoo. It was very active and healthy lizard. It was kept under observation in wildlife Hospital and released in the jungle (Bak side Zoo) on 18.05.2017
3	Civet		1	Rescued	26.07.2017	Rescued from village Paragpur by RO Derabassi reported vide letter no. 539-II dated 27.07.2017
4	Indian roofed turtle	<i>Pangshura tecta</i>	55	Rescued	02.08.2017	Rescued by DFO(WL) Hoshiarpur court case property vide letter no.1211 dated 02.08.2017 and reported vide letter no. 581-II dated 02.08.2017
5	Indian spotted turtle	<i>Geoclemys hamiltonii</i>	2	Rescued	02.08.2017	
6	Rhesus baby monkey	<i>Macaca mulatta</i>	1	Rescued	13.09.2017	Rescued from CWLW office
7	Python	<i>Python molurus</i>	1	Rescued	25.10.2017	Rescued from village Mubarakpur after called by Police Department. Report to FD ZOO vide letter no. 884-II dated 25.10.2017



8	leopard	<i>Panthera pardus</i>	1	Rescued	26.12.2017	Rescued by DFO Amritsir and team of Wildlife wing and Chhatbir zoo. This leopard entered in sub-urban area and conflicted with the villagers. It was brought at Chhatbir Zoo hospital on 26.12.2017. Report sent to FD zoo vide letter no. 1084-II dated 26.12.2017.
9	Civet		1	Rescued	26.02.2018	Rescued by DFO Wildlife Philiaur and with the permission of PCCF WL cum Chief Wildlife Warden the animal was sent to Chhatbir Zoo.
10	Langur Infaint	<i>Presbytis entellus</i>	1	Rescued	15.03.2018	One infaint Langur (baby) rescued by Mr. Manmohan of # 489, Shiwalik Avenue, Naya Nangal Punjab who found this baby Langur on a highway where its mother Langur was killed by a road vehicle and this baby Langur was injured. Mr, Manmohan brought this baby Langur at Chhatbir Zoo Hospital for treatment and care. This baby Langur was hospitalized and reported to FD zoo vide letter no. 1363-II dated 16.03.2018. This Baby Langur did't survive and died on 31.03.2018
11	Water rail bird	<i>Rallus aquaticus</i>	1	Rescued	21.03.2018	Mr. Kulbhushan Kanwar president of Natural Biodiversity brought this bird in injured condition at Chhatbir zoo. Report sent to FD zoo vide letter no. 1383-II dated 23.03.2018. The animal was kept under observation for rehabilitation.
12	Rofus tree pie	<i>Dendrocitta vagabunda</i>	2	Rescued	23.03.2018	On 22.03.2018 night a tree was uprooted by the wind in the Sloth Bear Exhibit. 2 Chicks of tree pie was found abandoned by the zoo keeper during the tree removal process on 23.03.2018. These birds were kept under observation for rehabilitation.



Release

1	PIGEON WHITE	<i>Columbidae</i>	31	Release	30.09.2017	Release as per Guidelines Rule 10(1)(9)
2	PIGEON BLACK	<i>Columbidae</i>	17	Release	30.09.2017	
1	Python	<i>Python molurus</i>	1	Release	28.10.2017	Rescued Python on dated 25.10.2017 released back in the wild by the order of CWLW Punjab under the supervision of committee formed by CWLW in the wild habitat in Ropar Wildlife division. Report sent to FD Zoo vide letter no. 992-II dated 30.10.2017 against FD Zoo's letter no. 2852 dated 237.12.2017.

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21. Annual Inventory of animals (2017-18)

INVENTORY OF WILD ANIMALS AND BIRDS BETWEEN 01.04.2017 to 31.03.2018

SCHEDULE 1 OF WILDLIFE (PROTECTION ACT, 1972)

Sr. No.	Species	Scientific Name	Position as on 01.04.2017				Birth			Acquisition by Rescue/gift			Acquisition by Transfer			Disposal by Death			Disposal by Transfer			Position as on 31.03.2018							
			M	F	U	Tot	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	Tot				
BIRDS																													
1	PEAFOWL INDIAN	<i>Pavo cristatus</i>	5	3	0	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5	3	0	8
2	PEAFOWL WHITE	<i>Pavo cristatus</i>	2	2	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	1	0	3
3	KALEEJ PHEASANT	<i>Lophura leucomelanos</i>	2	3	0	5	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	3	1	6	
Total Birds			9	8	0	17	0	0	1	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	9	7	1	17	
MAMMALS																													
1	BLACK BUCK	<i>Antelope cervicapra</i>	1	1	3	34	0	0	5	0	0	0	0	0	0	0	2	1	0	0	0	0	0	0	1	1	8	36	
2	WHITE BUCK	<i>Antelope cervicapra</i>	4	4	0	8	0	0	1	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	3	3	1	7	
3	CHINKARA	<i>Gazella bennetti</i>	4	2	0	6	0	0	2	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	4	1	1	6	
4	DEER BROW ANTLERED	<i>Cervus eldi</i>	1	1	1	3	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	2	4	
5	DEER SWAMP	<i>Cervus duvauceli</i>	3	6	1	10	0	0	1	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	2	5	2	9	
6	ELEPHANT INDIAN	<i>Elephas maximus</i>	1	3	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	3	0	4	



7	LEOPARD	<i>Panthera pardus</i>	10	6	0	16	0	0	1	1	0	0	0	0	0	0	2	1	1	3	1	0	6	4	0	10
8	LIONS INDIAN	<i>Panthera leo persica</i>	1	3	0	4	0	0	4	0	0	0	0	0	0	0	0	0	4	0	0	0	1	3	0	4
9	MACAQUE LION TAILED	<i>Macaca silenus</i>	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1
10	TIGER BENGAL	<i>Panthera tigris tigris</i>	3	2	0	5	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	2	2	0	4
11	FOUR HORNED ANTELOPE	<i>Tetracerus quadricornis</i>	3	2	0	5	0	0	0	0	0	0	0	0	0	3	1	0	0	0	0	0	0	1	0	1
12	GAUR (Indian Bison)	<i>Bos gaurus</i>	4	0	0	4	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	3	0	0	3
13	LEOPARD CAT	<i>Felis bengalensis</i>	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1
14	WHITE TIGER	<i>Panthera tigris tigris</i>	1	1	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	2
15	MOUSE DEER	<i>Tragulus meminna</i>	2	2	1	5	0	0	2	0	0	0	0	0	0	0	0	2	0	0	0	2	2	1	5	
16	OTTER SMOOTH COATED		1	1	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	2
17	INDIAN WOLF	<i>Canis lupus</i>	0	0	0	0	0	0	0	1	2	0	0	0	0	0	0	0	0	0	0	0	1	2	0	3
	Total		51	53	6	110	0	0	17	2	2	0	0	0	0	10	5	8	4	2	0	39	48	15	102	

SCHEDULE 1 OF WILDLIFE (PROTECTION ACT, 1972)

S r. No.	Species	Scientific Name	Position as on 01.04.2017				Birth			Acquisition by Rescue/gift			Acquisition by Transfer			Disposal by Death			Disposal by Transfer			Position as on 31.03.2018			
			M	F	U	Tot	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	Tot
REPTILES																									
1	GHARIAL	<i>Gavialis gangeticus</i>	1	3	7	21	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	1	3	4	18
2	CROCODILE	<i>Crocodilus palustris</i>	3	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	3
3	PYTHON (Indian rock)	<i>Python molurus molurus</i>	0	0	7	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	7
4	BENGAL MONITOR LIZARD	<i>Varanus bengalensis</i>	0	0	2	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2
5	YELLOW MONITOR LIZARD	<i>Varanus flavescens</i>	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1
6	INDIAN STAR TORTOISE	<i>Geochelone elegans</i>	0	0	8	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	8



7	INDIAN FLAP SHELL TURTLE	<i>Lissemys punctata</i>	0	0	19	19	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	21	
8	INDIAN SOFT SHELL TURTLE	<i>Nilssoniana gangetica</i>	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
9	INDIAN ROOFED TURTLE	<i>Pangshura tecta</i>	1	3	0	4	0	0	0	0	5	5	0	0	0	0	0	9	0	0	0	1	3	46
10	INDIAN SPOTTED TURTLE	<i>Geochelone himiltoni</i>	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	2	
	Total		5	6	55	66	0	0	0	0	59	0	0	0	0	0	12	0	0	0	5	6	102	

SCHEDULE II OF WILDLIFE (PROTECTION ACT, 1972)

S r. No.	Species	Scientific Name	Position as on 01.04.2017				Birth			Acquisition by Rescue/gift			Acquisition by Transfer			Disposal by Death			Disposal by Transfer			Position as on 31.03.2018					
			M	F	U	Tot	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	Tot		
MAMMALS																											
1	BEAR HIMALYAN BLACK	<i>Selenarctos thibetanus</i>	1	5	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	5	0	6	
2	BEAR SLOTH	<i>Melursus ursinus</i>	0	2	0	2	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	1	0	1	
3	CIVET	<i>Paradoxurus hemaphysoditus</i>	1	1	3	5	0	0	0	0	2	0	0	0	1	0	0	0	0	0	0	0	0	1	5	6	
4	JACKAL	<i>canis aureus</i>	1	1	6	8	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	1	6	7	
5	LANGUR COMMON	<i>Presbytis entellus</i>	1	1	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	2	
6	MACAQUE ASSAMESE	<i>Macaca assamensis</i>	1	1	2	0	13	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	2	0	13
7	MACAQUE BONNET	<i>Macaca radiata</i>	6	2	0	8	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	5	1	0	6	
8	MACAQUE RHESUS	<i>Macaca mulatta</i>	5	5	0	10	0	0	0	0	1	0	0	0	0	1	0	0	0	0	0	0	5	5	0	10	
9	MACAQUE PIG TAILED	<i>Macaca nemestrina</i>	2	2	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	0	4	
10	JUNGLE CAT	<i>Felis chaus</i>	1	1	6	8	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	2	4	0	6	
	Total		29	22	15	66	0	0	0	0	12	0	0	0	4	4	0	0	0	0	0	7	7	3	11	61	
REPTILES																											
1	COBRA	<i>Naja naja</i>	0	0	6	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6	6	



2	RAT SNAKE	<i>Ptyas mucosa</i>	0	0	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	4
3	CHECKERED KEELBACK	<i>Xenochrophis piscator</i>	0	0	2	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2
	Total		0	0	12	12	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	12

SCHEDULE III & IV OF WILDLIFE (PROTECTION ACT, 1972)

S. N. O.	Species	Scientific Name	Position as on 01.04.2017				Birth			Acquisition by Rescue/gift			Acquisition by Transfer			Disposal by Death			Disposal by Transfer			Position as on 31.03.2018				
			M	F	U	Tot	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	Tot	
Birds																										
1	CRANE SARUS	<i>Grus antigone</i>	7	3	2	12	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	7	2	3	12
2	DOVE	<i>Streptopelia chinensis</i>	0	0	40	40	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	15	10	40
3	DUCK SPOT BILL	<i>Anas poecilorhyncha</i>	0	0	9	9	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	4	5	5	1	11
4	DUCK COMBED	<i>Sarkidionis melanotos</i>	1	2	19	22	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	10	10	6	26
5	FOWL RED JUNGLE	<i>Gallus gallus</i>	2	7	0	9	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	2	7	6	15
6	PARAKEET ROSE RINGED	<i>Psittacula krameri</i>	0	0	43	43	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	15	15	15	45
7	PARAKEET ALEXANDRI NE	<i>Psittacula eupatria</i>	2	2	17	21	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	7	7	21
8	PARAKEET BLOSSOM HEADED	<i>Psittacula roseate</i>	2	2	1	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	1	5
9	PARTRIDGE S GREY	<i>Francolinus pondicerianus</i>	0	0	3	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	3
10	PARTRIDGE S BLACK	<i>Francolinus francolinus</i>	0	0	4	4	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	8
11	PELICANS ROSY	<i>Pelecanus philippensis</i>	0	0	3	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	3
12	QUAIL COMMON	<i>Coturnix coturnix</i>	1	0	8	9	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	8	8
13	STORK BLACK NECKED	<i>Xenorhynchus asiaticus</i>	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1
14	STORK PAINTED	<i>Mycteria leucocephala</i>	15	15	60	90	0	0	13	0	0	0	0	0	0	0	0	0	0	0	0	8	15	15	65	95



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S r. N o.	Species	Scientific Name	Position as on 01.04.2017				Birth			Acquisition by Rescue/ gift			Acquisition by Transfer			Disposal by Death			Disposal by Transfer			Position as on 31.03.2018									
			M	F	U	Tot	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	Tot						
OTHER BIRDS																															
1	EMU	<i>Dromice ius novaholl andiae</i>	8	8	8	24	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	8	7	23	
2	COCKATOO SULPHER CRESTED	<i>Kokatoe galerita</i>	0	0	2	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	
3	COCKTIEL GREY	<i>Nymphicus hollandicus</i>	1	1	8	10	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5	5	3	13		
4	BUDGRIGAR	<i>Melopsittacus undulatus</i>	1 0 0	1 0 5	0	20 5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	4	0	9 6	1 0 1	0	197
5	PHEASANT RING NECKED	<i>Phasianus colchicus</i>	3	2	0	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	2	0	5
6	PHEASANT GOLDEN	<i>Chrysolophus pictus</i>	5	6	0	11	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	4	5	0	9	
7	PHEASANT SILVER	<i>Lophura nycthemerus</i>	2	2	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	0	4	
8	LADY AHMREST PHEASANT	<i>Chrysolophus amherstiae</i>	2	1	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	1	0	0	0	1	
9	ZEBRA FINCHES	<i>Taeniopygia guttata</i>	1	1	2 8	30	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1 0	1 0	1 0	30	
10	BLACK SWAN	<i>Cygnus atratus</i>	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1
11	LOVE BIRD	<i>Agapornis</i>	0	0	2	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	
12	GEESE COMMON	<i>Anser gene</i>	0	0	5 7	57	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5 7	57	
13	PIGEON WHITE	<i>Columbidae</i>	0	0	3 1	31	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3 1	0	0	0	0
14	PIGEON BLACK	<i>Columbidae</i>	0	0	1 7	17	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1 7	0	0	0	0
15	OSTRICH	<i>Struthio camelus</i>	0	3	0	3	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	2	0	0	2
16	JAWA SPARROW	<i>Lonchura oryzivora</i>	0	0	1 0	10	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1 0	10	
17	DIMOND DOVE	<i>Geopelia caneata</i>	0	0	0	0	0	0	5	0	0	1 0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1 5	15	
	TOTAL		1 2 2	1 3 0	1 6 3	41 5	0	0	8	0	0	1 0	0	0	0	0	1	2	1	5	5	4 8	1 2 9	1 3 6	1 0 6	371					



EXOTIC & OTHERS

S r. N o.	Species	Scientific Name	Position as on 01.04.2017				Birth			Acquisition by Rescue/gift			Acquisition by Transfer			Disposal by Death			Disposal by Transfer			Position as on 31.03.2018											
			M	F	U	Tot	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	M	F	U	Tot								
OTHER MAMMALS																																	
1	HIPPOPOMT AMUS	<i>Hippopotamus amphibius</i>	1	3	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	3	0	4			
2	ZEBRA		0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0			
3	JAGUAR	<i>Panthera onca</i>	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1			
4	FELLOW DEER	<i>Dama dama</i>	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1			
5	HAMADRYE S BABBOON SACRED	<i>Papio hamadryas</i>	2	3	0	5	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	2	3	0	5	
	TOTAL MAMMALS		5	7	0	12	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	5	6	0	11
106	TOTAL ANIMALS (Schedule I, II, III, IV & Others/Exotic)		319	366	591	1276	0	0	106	3	4	76	1	0	0	26	19	22	10	7	60	352	410	560								1322	

22. Mortality of animals

Summary of Death Report M.C.Zoological Park Chhatbir during 01.04.2017 to 31.03.2018

Sr. No.	Animal Name	Scientific name	Sex	No.	Date	Cause of Death
1	Sarus crane	<i>Chrysolophus pictus</i>	Female	1	01.04.2017	Senile changes in vital organs
2	Shikra	<i>Geochelone elegans</i>	Unk	1	25.04.2017	Haemorrhagic enteritis
3	Lion still birth	<i>Panthera leo persica</i>		2	27.04.2017	Still birth of Shilpa Lioness
4	White Peacock	<i>Peregrene</i>	Female	1	30.04.2017	Hypovolumic shock
5	Ostrich	<i>Gazella bennetti</i>	Female	1	01.05.2017	Haemorrhagic enteritis
6	Lion still birth	<i>Panthera leo</i>		2	27.04.2017	Still birth of Shilpa Lioness
7	Emu	<i>Iophura nycthemerus</i>	Unk	1	15.05.2017	Haemorrhagic enteritis
8	Golden pheasant	<i>Hyena hyena</i>	Male	1	28.05.2017	Hypovolumic shock
9	Golden pheasant	<i>Varanus</i>	Female	1	08.06.2017	Internal Haemorrhags



10	Leopard	<i>Panthera pardus</i>		1	08.06.2017	Still birth of Bijli female leopard
11	Leopard	<i>Bos gaurus</i>	Male	1	18.06.2017	Senile changes of vital organs
12	Hog deer	<i>Gazella bennetti</i>	Male	1	24.06.2017	Internal Haemorrhags
13	Bonnet monkey	<i>Macaca radiate</i>	Male	1	11.07.2017	Internal haemorrhage due to snake bite
14	Black buck	<i>Antelope cervicapera</i>	Female	1	26.07.2017	Internal haemorrhage and mayopathy
15	Chinkara fawn	<i>Gazella bennetti</i>		1	27.07.2017	Heart failiure due to infighting
16	Black buck	<i>Antelope cervicapera</i>	Male	1	30.07.2017	Shock due ti hit injury
17	Sambar	<i>Cervus unicolor</i>	Male	1	27.08.2017	Septiceamia
18	Wild boar	<i>Sus scrofa</i>	Female	1	28.08.2017	Internal haemorrhage
19	Blue bull	<i>Boselaphus tragocamelus</i>	Male	1	31.08.2017	Heart failiure due to sanility
20	Wild boar	<i>Sus scrofa</i>	Female	1	05.09.2017	Hepatittis
21	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	08.09.2017	Aleolar tissue changes, Respiratory failiure, Pleuriteis
22	Chinkara	<i>Gazella bennetti</i>	Female	1	08.09.2017	Internal haemorrhage and shock due to infighting
23	Zebra	<i>Equus quagga</i>	Female	1	10.09.2017	Disseminated intravascular coagulation due to snake bite
24	Common quail	<i>Coturnix coturnix</i>	Male	1	11.09.2017	Senile changes of internal organs
25	Bengal tiger	<i>Panthera tigris</i>	Male	1	20.09.2017	Multipal organ failiure due to senility
26	Hog deer	<i>Axis porsinus</i>	Male	1	21.09.2017	Senile changes of internal organs
27	White buck	<i>Antelope cervicapera</i>	Unk	1	30.09.201	Acute tympany
28	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	30.09.2017	Respiratory failure
29	Hog deer	<i>Axis porsinus</i>	Male	1	12.10.2017	Senile cahnges of vital organs
30	Jackal	<i>Antelope cervicapera</i>	Male	1	23.10.2017	Senile cahnges of vital organs
31	Jungle cat	<i>Felis chaos</i>	Female	1	28.10.2017	Retrograde changes of vital organs
32	Leopard	<i>Panthera pardus</i>	Male	1	31.10.2017	Degeneration of tissues and organs
33	Bonnet Monkey	<i>Macaca radiata</i>	Female	1	02.11.2017	Degeneration of tissues and organs
34	Jungle cat	<i>Felis chaos</i>	Male	1	14.11.2017	Actue respiratory distress
35	Civet	<i>Paradoxurus hemaphroditus</i>	Male	1	19.11.2017	Actue respiratory distress
36	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	22.11.2017	Actue respiratory distress
37	Leopard	<i>Panthera pardus</i>	Male	1	27.11.2017	Acute renal failiure



38	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	05.12.2017	Actue respiratory distress
39	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	12.12.2017	Actue respiratory distress
40	Rhesus monkey	<i>Macaca mulata</i>	Female	1	19.12.2017	Aspiratory pneumonia
41	Sloth bear	<i>Melursus ursinus</i>	Female	1	22.12.2017	Hepatocellular charcinoma
42	Bison	<i>Bos gaurus</i>	Male	1	01.01.2018	Suspected FMD
43	White buck	<i>Antelope cervicapera</i>	Male	1	03.01.2018	Suspected FMD
44	Black buck	<i>Antelope cervicapera</i>	Male	1	04.01.2018	Suspected FMD
45	Four horned antelope	<i>Tetracerus quadricornis</i>	Female	1	05.01.2018	Suspected FMD
46	Goral	<i>Nemorhaedus goral</i>	Male	1	06.01.2018	Suspected FMD
47	Four horned antelope	<i>Tetracerus quadricornis</i>	Male	1	08.01.2018	Suspected FMD
48	Goral	<i>Nemorhaedus goral</i>	Male	1	12.01.2018	Suspected FMD
49	Four horned antelope	<i>Tetracerus quadricornis</i>	Male	1	14.01.2018	Shock due to retention of urine
50	Four horned antelope	<i>Tetracerus quadricornis</i>	Male	1	17.01.2018	Suspected FMD
51	Goral	<i>Nemorhaedus goral</i>	Male	1	19.01.2018	Suspected FMD
52	Goral	<i>Nemorhaedus goral</i>	Male	1	23.01.2018	Suspected FMD
53	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	23.01.2018	Acute respiratory distress
54	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	24.01.2018	Acute respiratory distress
55	Goral	<i>Nemorhaedus goral</i>	Male	1	25.01.2018	Suspected FMD
56	Mouse deer	<i>Tragulus meminna</i>		1	26.01.2018	Suspected FMD
57	Goral	<i>Nemorhaedus goral</i>	Female	1	28.01.2018	Suspected FMD
58	Goral	<i>Nemorhaedus goral</i>	Female	1	01.02.2018	Suspected FMD
59	Mouse deer	<i>Tragulus meminna</i>		1	10.02.2018	Pneumnitis
60	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	16.02.2018	Acute respiratory Faliure
61	Indian roofed turtle	<i>Pangshura tacta</i>	Unk	1	16.02.2018	Acute respiratory distress



62	Gharial	<i>Gavialis gangeticus</i>	Male	1	21.02.2018	Haemorrhagic shock dueto trauma
63	Gharial	<i>Gavialis gangeticus</i>	Male	1	22.02.2018	Septicemia caused by panniculitis
64	Gharial	<i>Gavialis gangeticus</i>	Male	1	23.02.2018.	Septicemia caused by panniculitis
65	Wild boar	<i>Sus scrofa</i>	Male	1	12.03.2018	Sepcaemic shock

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23. Compliance with conditions stipulated by the Central Zoo Authority

	Norm No.	Condition Stipulated	Time period to Comply	Remarks
General Requirements				
1	1(7)	The Zoo should not allow its sewage affecting the surroundings of the zoo. To prevent such a situation it should have appropriately designed sewage treatment plant.	One year	Efforts are being made for the proper disposal of sewage without affecting the surrounding of the zoo. However to prevent such a situation an appropriate design sewage treatment plant is proposed to be created under PUNCAMPA scheme 2017-18 and financial outlay of rupees1Cr has also been year marked for this. The estimates have been prepared and submitted to the higher authorities for approval. The work in this regard will be undertaken shortly
Animal housing, display of animals and animal enclosures :				
4	3(8)	Zoo should send report of the rescued animals of Schedule-1 animals received by the zoo to Central Zoo Authority regularly.	Immediate effect	The report regarding rescued animals of schedule-1 by the Chhatbir zoo is regularly sent to Central Zoo authority along with quarterly and annual inventory reports.
5	4	Tiger and Lion enclosures should have appropriately designed kraals.	One Year	An appropriately designed kraals in respect of lion is in place. The component for creating open kraals in respect of Bengal tigers has been incorporated under PUNCAMPA 2017-18 whose financial allocation has been year marked and estimates are under the process of approval. This work will be done very shortly.
6	4	Out of bound areas around the enclosure should be densely planted with bamboo and thorny hedges.	Six months	At many places bamboo plantation has been done to keep the public out of bound from the enclosures. Wherever the bamboo/thorny hedges are not possible, the display board saying "out of bound" has been put . The out of bound area around the leftover enclosures will be planted in the current year.



7	4	Old cage type primate enclosures should be demolished and adequate number of well-designed open top enclosures should be constructed.	Two Year	This observation has been considered and component of creating open top well designed enclosure in respect of primate chimpanzee/ baboon has been incorporated in the APO of Punjab Zoos Development societies in 2017-18. The demolition and thereafter construction of appropriate designed primate enclosure will be done in due course of time.
8	4	Zoo should have an appropriately designed carnivore safari with a minimum area of 20 hectares. This would involve doing away the herbivore safari.	One Year	The possibility to expand the area of lion safari from 10 ha to 20 ha was explored by merging the present lion safari with existing deer safari. It required an expenditure of rupees 9-10 cr whose allocation is being requested from the Government for undertaking this exercise.
9	4	Tiger and lion feeding cells look barren and affect the ambience of the area. These should be camouflaged by planting bamboos and native shrubs.	Six months	The tiger and lion feeding cells are being camouflaged by planting of bamboo and suitable climbers.
10	4	Zoo is using abandoned Canid enclosures for housing the barking deer. These enclosures are too small and need to be demolished. New enclosures for barking deer should be constructed at appropriate site.	Six months	Temporary enclosure for barking deer has been constructed and the barking deer from the Canidae enclosure has been shifted. The abandoned canidae enclosures will be demolished shortly.
11	4	The Himalayan bear enclosure is too small. Himalayan bear should be shifted to other enclosure. This enclosure should be used to house wolf or some other suitable species.	Six months	The compliance has been made by shifting the Himalayan black bear to its appropriate enclosure.
12	4	Zoo has large number of Panther enclosures. Most of these enclosures should be done away with. The zoo should construct an appropriately designed open top enclosure with capacity of 6-10 enclosures. Rest of the Panthers should go to off the display area to be developed as Rescue Center.	Two Years	An off display area for excess number of rescued panthers is under planning and this condition will be implemented in due course of time.
13	4	White peacock aviary is too small in dimension. It's area should be extended.	Six months	The new walk in aviary has been created with large size enclosures for different birds including peacock. The white peacock presently displaying in small cage will be shifted to newly designed walk in aviary shortly.
14	4	Ungulate enclosures should have appropriately designed feeding cells and kraals.	One year	The creation of feeding cells and kraals in the ungulate enclosures is under consideration and funds for this purpose are short presently.
15	4	Most of the enclosures have 360 degree viewing. The viewing area should be limited to 1/3 of the periphery of the enclosure.	Six months	This condition is being implementing in letter and spirit and viewing area is decreased one third of the periphery of enclosure by raising the vegetation fence.
16	4	Water bird aviary should be camouflaged by planting of shrubs and bamboos to maintain privacy for birds.	Six months	This condition is being implementing in letter and spirit and viewing area is decreased one third of the periphery of



				enclosure by raising the vegetation fence.
17	4	The reptile house should have appropriately designed visitors' gallery. The size of the display chamber should be increased merging neighboring enclosures.	Six months	Reptile house with appropriate designed display chambers having proper enrichment and visitor gallery has already been established.
18	4	Nocturnal house should be properly furnished with requisite signage and fittings to make it educative and functional.	Six months	Interpretative material and signage's for whole zoo including nocturnal house is under preparation by the ongoing project of Asian Development Bank (Tranch - 3) for the Chhatbir zoo. The nocturnal house will be fitted with signage's with i/m very shortly.
19	4	Crocodile enclosure is too small. It needs to be redesigned/extended in consultation with Central Zoo Authority.	One year	The redesigning of crocodile exhibit as per the CZA guidelines is under process.
20	4	Pheasant enclosure chamber are of smaller dimension than the prescribed size. Their area should be increased by merging the neighbouring cells.	Six months	The pheasant enclosures chambers are having dimensions as per CZA guidelines however possibilities are being explored for further increasing the area.
21	4	Good efforts for environmental enrichment of enclosures have been done but it looks to artificial. Efforts to be made to make it naturalistic by planting tress an shrubs.	Six months	Naturalistic enrichment by planting trees and shrubs is being done.
22	4(9)	Stand-off barriers at some of the enclosures is too high. These are too law at some of the enclosures. These should be made of prescribed dimensions. Every enclosure should have stand-off barriers of prescribed dimensions.	Six months	The increase in the height of stand of barriers at tiger enclosure was the compulsion of zoo management to avoid risk to prevent any untoward incident. Standard stand-off barriers of prescribed and common dimensions shall be erected in due course of time.
23	4(10)	All sign boards should have precise biological and ecological information.	Six months	The compliance is being done.
Upkeep and healthcare of animals :				
2 4	5	The zoo should have appropriately designed meat house at a reasonable distance from the kitchen.	Six months	A separate meat house has been created with a reasonable distance from the kitchen.
2 5	5	Tiger and Lion enclosures should have pucca flooring leaving no empty space below the floor. The wooden feeding platform should be detachable so that thorough cleaning of meat traces and blood can be done.	Six months	The pucca flooring has been done in respect of lion houses while a component for making pucca flooring of tiger houses has been incorporated in the PUNCAMPA 2017-18. This work will be completed in the current year.
2 6	5(2)	The zoo should have appropriately designed water storage tank.	Two year	The planning to make 5 lakh Lt storage water tank is under process.
2 7	5(6)	Curatorial staff should maintain records of the biological behavior observed by them.	Immediate effect	The compliance is being done.
Veterinary and infrastructure facilities :				
2 8	6(1)	Zoo hospital should have requisite number of inpatient wards for	One year	Zoo hospital is maintaining adequate number of wards in respect to animals,



		herbivores and birds.		birds, reptiles and other live stocks.
29	6(6)	Too zoo should have an MoU with the Center of Wildlife Sciences, Ludhiana on veterinary diagnosis and veterinary research.	Immediate effect	Zoo authorities are constantly in touch with head of center for wildlife sciences, GADVASU, Ludhiana for appropriate action.
Post-mortem and disposal of carcasses of animals :				
30	7(1)	Post mortem room of the zoo should have a proper changing room and shower facility and appropriate post-mortem equipment.	Three months	The compliance has been done.

Acquisition and breeding of animals :				
31	9(4)	Mates should be arranged for single jaguar, swan and fallow deer.	Six months	The issue of pairing of swan and fallow deer is taken up on priority by dialoguing with other zoos of India.
Research activities :				
32	10(1)	The zoo should have detailed Disaster Management Plan and should have mock drills regularly.	Immediate effect	Quick response team has already been constituted and to implement Disaster Management Plan mock drills are being initiated.
33	10(1)	Zoo should have a detailed research plan and execute it effectively.	Immediate effect	Detailed research plan is being prepared.
Visitors Facilities :				
34	12(3)	Zoo should have ramp and wheel chairs to facilitate the differently abled persons.	Immediate effect	The wheel chairs are in place and ramp has been made where needed for facilitating differently abled persons.
General observations :				
35	General	There are many exotic trees especially Eucalyptus (disambiguation) in the zoo which are posing a potential threat to the animal enclosures, boundary wall, building and other infrastructure of zoo. These exotic tree species should be replaced with indigenous tree species of the region which will improve the vegetation cover and ecological ambiance of the zoo.		Plan is being made to replace exotic trees like eucalyptus with indigenous tree species of the region.



24. List of free living wild animals within the zoo premises

a. Mammals

S.No	English Name	Scientific Name
1	Samar	<i>Cervus uicolor</i>
2	Jackal	<i>canis aureus</i>
3	Porcupine	<i>Hystrix indica</i>
4	Hare	<i>Lepus nigricollis</i>

b. Birds

S.No	English Name	Scientific Name
1	Black Kite	<i>Milvus migrans</i>
2	White Breasted Hen	<i>Amauornis phoenicurus</i>
3	Moorhen	<i>Gallinula</i>
4	Himalayan Bulbull	<i>Pycnonotus leucogenys</i>
5	Jungle Babbler	<i>Turdoides striata</i>
6	Grey Headed Warbler	<i>Basileuterus griseiceps</i>
7	Common Teal	<i>Anas crecca</i>
8	Oriental White Eye	<i>Zosterops palpebrosus</i>
9	White Throated Fantail	<i>Rhipidura albicollis</i>
10	Black Drongo	<i>Dicrurus macrocercus</i>
11	Brown Headed Barbet	<i>Megalaima zeylanica</i>
12	Indian Peafowl	<i>Pavo cristatus</i>
13	Eurasian thick-knee	<i>Burhinus oedicanus</i>
14	Greater Tit	<i>Parus major</i>
15	Grey Headed Canary Flycatcher	<i>Culicicapa ceylonensis</i>
16	White Wagtail	<i>Motacilla alba</i>
17	Grey Wagtail	<i>Motacilla cinerea</i>
18	Red Breasted Flycatcher	<i>Ficedula parva</i>
19	Asian Brown Flycatcher	<i>Muscicapa latirostris</i>
20	Common Sandpiper	<i>Actitis hypoleucos</i>
21	Alexander Parakeet	<i>Psittacula eupatria</i>
22	Little Grebe or Dabchick	<i>Podiceps ruficollis</i>
23	Large Cormorant	<i>Phalacrocorax carbo</i>
24	Little Cormorant	<i>Phalacrocorax niger</i>
25	Darter or snake bird	<i>Anhinga rufa</i>
26	Grey heron	<i>Ardea cinerea</i>
27	Purple heron	<i>Ardea purpurea</i>
28	Indian Pond heron or Paddy bird	<i>Ardeola grayii</i>
29	Cattle egret	<i>Babulcus ibis</i>



30	Large egret	<i>Egretta alba</i>
31	Smaller or Median egret	<i>Egretta</i>
32	Little egret	<i>Egretta garzetta</i>
33	Night heron	<i>Nycticorax nycticorax</i>
34	Painted stork	<i>Mycteria leucocephalus</i>
35	White necked stork	<i>Ciconia episcopus</i>
36	Ruddy shelduck or Brahminy duck	<i>Tadorna ferruginea</i>
37	Pintail	<i>Anas acuta</i>
38	Common teal	<i>Anas Crecca</i>
39	Spotbill duck	<i>Anas poecilorhycha</i>
40	Mallard	<i>Anas platyrhynchos</i>
41	Gadwall	<i>Anas Penelope</i>
42	Shoveller	<i>Anas clypeata</i>
43	Common Pochard	<i>Aythya ferina</i>
44	Nakta or Comb Duck	<i>Sarkidiornis melanotos</i>
45	Black winged Kite	<i>Elanus careruleus</i>
46	Crested honey buzzard	<i>Pernis Ptilorhynchus</i>
47	Pariah Kite	<i>Milvus migrans</i>
48	Shikra	<i>Accipiter badius</i>
49	Asiatic Sparrow Hawk	<i>Accipiter nisus</i>
50	Greater spotted eagle	<i>Aquila clanga</i>
51	Lesser spotted eagle	<i>Aquila pomarina</i>
52	Marsh harrier	<i>Circus aeruginosus</i>
53	Crested serpent eagle	<i>Spilorins cheela</i>
54	Black partridge	<i>Francolinus francotinus</i>
55	Grey partridge	<i>Francolinus pondicerianus</i>
56	Grey quail	<i>Coturnix coturnix</i>
57	Jungle bush quail	<i>Perdica asiatica</i>
58	Indian Pea Fowl	<i>Pavo cristatus</i>
59	Little bustard quail	<i>Turnix sylvatica</i>
60	Indian bustard quail	<i>Turnix suscitator</i>
61	Demoiselle crane	<i>Anthropoides virgo</i>
62	Ruddy crane	<i>Porzana fusca</i>
63	Moorhen	<i>Gallinula chloropus</i>
64	Coot	<i>Fulica atra</i>
65	White-tailed lapwing	<i>Vanellus leucurus</i>
66	Red wattled lapwing	<i>Vanellus indicus</i>
67	Black winged stilt	<i>Himantopus himantopus</i>
68	Green Pigeon	<i>Treron phoenicoptera</i>
69	Blue rock pigeon	<i>Columba livia</i>
70	Rufous turtle dove	<i>Streptopelia orientalis</i>



71	Ring dove	<i>Streptopelia decapcto</i>
72	Spotted dove	<i>Streptopelia chinensis</i>
73	Rose ringed parakeet	<i>Psittacula eupatria</i>
74	Blossom headed parakeet	<i>Psittacula cyanocephala</i>
75	Pied crested cuckoo	<i>Clamator jacobinus</i>
76	Indian cuckoo	<i>Cuculus micropterus</i>
77	Koel	<i>Eudynamys scolopacea</i>
78	Coucal or crow pheasant	Centropus Sinensis Sinensis
79	Barn owl	<i>Tyto alba</i>
80	Collared scops owl	<i>Otus bakkamoena</i>
81	Great horned or Eagle owl	<i>Bubo bubo</i>
82	Dusky horned owl	<i>Bubo coromadus</i>
83	Brown fish owl	<i>Bubo Zeylonensis</i>
84	Spotted owlet	<i>Athene brama</i>
85	Indian Jungle night jar	<i>Caprimulgus indicus</i>
86	House swift	<i>Apus affinis</i>
87	Palm swift	<i>Cypsiurus parvus</i>
88	Small blue kingfisher	<i>Alcedo atthis</i>
89	Blue tailed bee eater	<i>Merops philippinus</i>
90	Small green bee-eater	<i>Merops orientalis</i>
91	Hoopoe	<i>Upupa epops</i>
92	Grey hornbill	<i>Tockus birostris</i>
93	Large green barbet	<i>Megalaima zeylanica</i>
94	Lesser golden backed woodpecker	<i>Dinopium benghalense</i>
95	Golden oriole	<i>Oriolus oriolus</i>
96	Black drongo or king crow	<i>Dicrurus adsimilis</i>
97	Blackheaded or Brahminy myna	<i>Sturnus pagodarum</i>
98	Common myna	<i>Acridotheres tristis</i>
99	Bank myna	<i>Acridotheres ginginianus</i>
100	Tree pie	<i>Dendrcitta vagabunda</i>
101	House crow	<i>Corvus splendens</i>
102	Jungle Crow	<i>Corvus macrorhynchos</i>
103	Redvented bubul	<i>Pycnonotus cafer</i>
104	Rufous bellied babbler	<i>Dumetia hyperythra</i>
105	Yellow eyed babbler	<i>Chrysomma sinense</i>
106	Brown flycatcher	<i>Muscicapa latirostris</i>
107	Paradise flycatcher	<i>Terpsiphone paradisi</i>
108	Yellow bellied wren warbler	<i>Prinia flaviventris</i>
109	Tailor bird	<i>Orthotomus sutorius</i>
110	Magpie robin	<i>Copsychus salularis</i>



111	River chat or whitecapped redstart	<i>Chaimarrornis leucocephalus</i>
112	Indian robin	<i>Saxicoloides fulicata</i>
113	Tree crepper	<i>Certhia himalayana</i>
114	Purple sunbird	<i>Nectarinia asiatica</i>
115	House sparrow	<i>Passer hispaniolensis</i>
116	Baya weaver bird	<i>Ploceus philippinus</i>
117	Black throated weaver bird	<i>Ploceus benghalensis</i>
118	Red munia or Avadavat	<i>Estrilda amandava</i>
119	White throated munia	<i>Lochura malabarica</i>
120	Spotted munia	<i>Lochura punctulata</i>
121	Crested bunting	<i>Melophus lathami</i>

c. Reptiles

S. No	English Name	Scientific Name
1	Python (Indian rock)	<i>Python molurus molurus</i>
2	Bengal Monitor	<i>Varanus bengalensis</i>
3	Indian Flap shell turtle	<i>Lissemys punctata</i>
4	Cobra	<i>Naja naja</i>
5	Rat Snake	<i>Ptyas mucosa</i>
6	Russell wiper	<i>Daboia russelii</i>
7	Red Sand boa	<i>Eyrx johni</i>
8	Checkerd keel back	<i>Xenochrophis piscator</i>
9	common krait	<i>Bungarus caeruleus</i>

