

GREEN PAKISTAN PROGRAMME



1ST REVISED

PC-I SCHEME

REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

Total Cost: Rs.5890.599 million

Gestation Period: 07 Years (2016-17 to 2022-23)



**GOVERNMENT OF PUNJAB
FOREST, WILDLIFE & FISHERIES
DEPARTMENT, LAHORE**

JUNE, 2019

GOVERNMENT OF PAKISTAN

PLANNING COMMISSION

PC-I FORM

(SOCIAL SECTORS)

1.	Name of the Project:	Green Pakistan Programme – Revival of Wildlife Resources in Punjab
2.	Location:	All Punjab (Map is attached at <u>Annex-A</u>)
3.	Time required for completion of project:	07-Years (84-Months) 2016-17 to 2022-23
4.	Capital Cost of Project:	<u>Rs. in million</u> Local Cost: 5890.599 FEC : Nil Total: 5890.599
5.	Authority responsible for: • Sponsoring • Execution • Operation and Maintenance: • Concerned Federal Ministry	i) Government of Pakistan through Ministry of Climate Change ii) Government of Punjab through Punjab Wildlife & Parks Department Punjab Wildlife & Parks Department and C&W Department through Project Management Unit / PM&E Unit, Head Office, Lahore. Punjab Wildlife & Parks Department through respective Deputy Directors Wildlife Ministry of Climate Change Government of Pakistan

6. Plan Provision:

Prime Minister of Pakistan while considering a summary submitted by the Ministry of Climate Change on 11th January 2016 on the subject “Revival of Forestry and Wildlife Resources in Pakistan” had desired the Revival of Wildlife Resources in Punjab covering institutional revival and technical re-organization of Wildlife Department at provincial level through time-bound plans including capacity building and incentive driven performance regime with the technical assistance provided by the Ministry of Climate Change, Government of Pakistan.

The Federal Government has already made an allocation of Rs.2.000 billion PSDP 2016-17 & 2017-18 on cost sharing basis to reclaim and develop forest areas of Pakistan and Revival of Wildlife Resources in Punjab as per directive of Prime Minister. The current project has been up-scaled in compliance of the way forward / common strategy circulated by the Federal Government during meeting held on 06.12.2018 at Ministry of Climate Change, Islamabad, **Annexure-A-I**. The Government of Punjab will contribute an equal share (50%) for the project.

The project is also related to the relevant component on Environment and Climate Change of Vision 2025 and 11th Five Year Development Plan (2013-18) approved by the Planning Commission. Further the old framework of Millennium Development Goals (2000-2015) expired on 31st January 2016 and now in place a new international framework has been introduced to promote sustainable development. The international 2030 UN Development Agenda known as Sustainable Development Goals (SDGs) will pave the way for environmentally sound solutions. Under target 15 of SDGs, each country has responsibility:

- i. Take urgent and significant action to reduce the degradation of habitats, halt to loss of biodiversity and by 2020, protect and prevent the extinction of threatened species.
- ii. Promote fair and equitable sharing of the benefits arising from the utilization of genetic resources and promote appropriate access to such resources, as internationally agreed.
- iii. Take urgent action to end poaching and trafficking of protected species of flora and fauna and address both demand and supply of illegal wildlife products.
- iv. By 2020, introduce measures to prevent the introduction and significantly reduce the impact of invasive alien species on land and water ecosystems and control or eradicate the priority species.

7. Project objectives and its relationship with Sectoral Objectives.

Punjab Wildlife and Parks Department is an independent organization working as attached department since 1973 under the Administrative Control of the Secretary Forestry, Wildlife & Fisheries Department Punjab.

The Wildlife & Parks Department Punjab is working under the supervision of the Director General, Wildlife & Parks Punjab, who is the provincial head of the Department. The districts are headed by the District Wildlife Officer (DWO) alongwith relevant protection staff. The regional offices are located at respective divisional headquarters headed by Deputy Director Wildlife.

- Rawalpindi
- Salt Range at Kalar Kahar
- Gujranwala
- Faisalabad
- Bahawalpur
- Dera Ghazi Khan
- Sahiwal
- Sargodha
- Multan

The project has been formulated for the Revival of Wildlife Resources in Punjab covering institutional revival and technical re-organization through time bound plans including capacity building and incentive driven performance regime. Thus the project has the following main objectives.

- Revival of wildlife resources through supplementation, propagation, conservation and management of wildlife resources.
- Capacity building through enhancement of skill sets of wildlife staff and research.
- Technical re-organization / strengthening of department through I.T. based management of wildlife resources.
- Mass awareness about the importance of Wildlife Resources.

As per Punjab Wildlife Act amended upto 2007, the management of wildlife resources in the Punjab has been entrusted to the Punjab Wildlife and Parks Department. The major areas of responsibility cover the following sectoral objectives.

- Protection, preservation, conservation and management of wildlife
- Management of wildlife and their habitat through
 - Rehabilitation of natural habitat
 - Wildlife propagation through captive breeding
- Provision of recreational facility to the general public
- Mass education about the importance of wildlife
- Research and training in relevant disciplines
- Liaison with national and international conservation agencies

Punjab Wildlife Department is facing multi-dimensional challenges like habitat deterioration rapid decrease in the wildlife resources due to illegal hunting poaching and shooting in wildlife refuge areas. Population pressure, excessive use of pesticides, transformation of wild areas into urbanization or industrial developments, capacity issue of the Department, non-availability of authenticated data base for future planning, non-exposure to best international practices and issues relating to climate change etc.

Wildlife is not restricted to a single habitat. They are the oldest associate of human beings and occupy niches not occupied by other forms of life. Man is the single most important factor affecting their population and their habitat. The habitats of potential wildlife have been deteriorated and shrinking day by day. Wildlife is very adaptable and they adjust themselves with the conditions provided to them. Wildlife in the Punjab is greatly reduced even in a good habitat in form of deserts like Cholistan, Dera Ghazi Khan and Thal, mountainous and sub-mountainous tracts in the Northern Punjab, Swamp areas and large water reservoirs. Even the cultivated areas also support a large population of wildlife.

Presently the Department is managing 37-Wildlife Sanctuaries, covering an area of (490,744 acres), 24-Game Reserves, (7,533,880 acres), 14-Wildlife Parks (1,242 acres), 04-National Parks (568,205 acres) and 04-Zoos (312 acres). Acquiring total land mass of 85,94,383 acres in Punjab. List of above said protected areas is attached as **Annexure-B**.

Thus the instant PC-I Scheme prepared in line with the direction of the Prime Minister of Pakistan is closely related with sectoral objectives narrated above.

8. Benefits of the project activities to national economy

Punjab Wildlife & Parks Department is responsible for Protection, Preservation, Conservation and Management of Wildlife in the Punjab Province. The Department, since its establishment, has been involved in different in-situ and ex-situ conservation efforts to save the wildlife fauna of the province.

In-situ conservation efforts mainly include;

- Protection and conservation of wild fauna in their habitats.
- Controlling illegal hunting and poaching of wildlife.
- Creation and management of protected areas.
- Promotion of sustainable management of the Wildlife Habitats.
- Protection and restoration of degraded areas.
- Introduction of legislation.
- Information, education and raised awareness.
- Involvement of local communities for wildlife conservation.

For conservation and propagation of wildlife resources, the department has implemented various development schemes related to wildlife sector. Many projects are under implementation, which envisage protection and conservation of wildlife in nature, propagation under captivity, population monitoring of endangered species and training of staff in wildlife management / research in different aspects of wildlife biology.

Keeping in view the condition of rapidly deteriorating wildlife resources, the department has also focused on ex-situ conservation and established a chain of Wildlife Parks / Breeding Centres / Zoos in different eco-regions. The parks / zoos served important centres to preserve 'gene pool' through captive breeding of endangered wildlife species, alongwith public recreation, education and motivation in wildlife resources management. After successful breeding, surplus progeny is released in abandoned habitats for propagation under natural conditions and trophy hunting. These ex-situ conservation facilities also cater for captive breeding of endangered wildlife species, recreation and education regarding the importance of wildlife to the local inhabitants.

The current project is mainly focusing the areas like in-situ conservation of wildlife resources, management of captive wildlife stock, incentivized facilities to provide wildlife breeding farms, improvement in wildlife survey & census, capacity building of wildlife staff, research on emerging wildlife issues, develop & implement protected areas system plans and launching mass awareness campaign.

With the implementation of aforementioned interventions, the project would contribute significantly towards the national agenda of Green Pakistan as well as the Sustainable Development Goal (SDGs) to which the Pakistan is signatory.

Challenges

Biodiversity refers to the variety of life, which can be seen in diverse habitats or ecosystems, species and genetic diversity. Sustainability of ecosystems depends to a large extent on the buffering capacity provided by having a rich and healthy diversity of genes, species and habitats. The air we breathe, the water we drink and the soil that supports crop production are all products of the complex interactions that occur among various living organisms on earth. These services include cleaning of water and regulation of the water cycle, purification of air, pollination, soil formation and protection, crop pest control, and the provision of food, fuel, fibers and drugs. Moreover, genetic diversity in domestic species and their wild relatives enables researchers to develop improved varieties of animals and plants for human needs; which serves as an insurance for future food security. In addition diversity in wild plant species is a major medicinal resource in yunani tибb (traditional medicine) and 40% of allopathic drugs were originally made from wild medicinal plants (GoP, 2000). This entails safeguarding all components of biodiversity, ecosystems or habitats, species as well as genetic diversity.

With a widespread conversion of natural ecosystems to agriculture, erosion and rapid degradation of habitats, spread of alien invasive species and the continuing depletion of populations of wild animals and plants, almost all remaining natural or modified ecosystems are now critically threatened.

Wildlife is a provincial subject with execution and implementation of wildlife protection, preservation, conservation, management improvement programmes vested in provincial Wildlife & Parks Department. However, policy formulation, national level coordination and compliance to international treaties / conventions is the responsibility of the Federal Government. Currently, wildlife sector is confronted with many challenges, such as;

- i. Loss, fragmentation and degradation of natural habitats.
- ii. In-effective management of Wildlife Parks / Zoos / Safaris and protected areas.
- iii. Lack of biodiversity inventories and monitoring systems.
- iv. Limited resources and inadequate institutional capacity.
- v. Depletion of population of many species.
- vi. Gaps in knowledge, lack of information and database of threatened and endangered species.

The overall improvement of the Wildlife Sector in the province will require continuous efforts through a number of initiatives under long-term Green Pakistan Programme. Existing meager wildlife resources being crucial to environmental stability demands serious interventions from Federal / Provincial Government to lead from the front with commitment for sufficient financial contribution through an umbrella project to improve and revive the wildlife resource in Punjab.

9. Economic and Financial Analysis

The project is designed with the following objectives.

- Revival of wildlife resources through supplementation, propagation, conservation and management of wildlife resources.
- Capacity building through enhancement of skill sets of wildlife staff and research.
- Technical re-organization / strengthening of department through I.T. based management of wildlife resources.
- Mass awareness about the importance of Wildlife Resources.

The most important objective is the revival of wildlife resources and their habitat in the province through development of National Parks, Wildlife Reserves, Wildlife Breeding Farm, Wildlife Hatcheries, Re-introduction and Supplementation of wildlife species in their natural range of occurrence.

One of other objectives is the establishment of state of the art GIS Lab., its regional nodes and district connectivity / capacity building through I.T. regime for collection of real time data about biodiversity, population dynamics in the wild, threats to wildlife species / habitat, dependence of adjoining community on natural resources and its rapid depletion. This real time data would help to make informed decision making and future planning of natural resources management.

Project Benefits

- i. Incremental benefits would be created through increase in protected areas and enabling environment for better propagation of wildlife resources and flora of the target areas.
- ii. Incremental employment opportunities about more than 15000 through direct or indirect employment.
- iii. Socio-Economic uplift of adjoining communities / areas through creation of different economic interventions.
- iv. Enhanced and better management of natural resources through protection measures and logistic support to protection staff.
- v. Incremental increase in the professional capacity of human capital of the department through training in different skill sets and exposure visits to abroad.
- vi. Availability of trained and skilled manpower for efficient management of wildlife resources in the province.
- vii. Increased economic activity, improved service delivery and better scrutiny from the adverse impact of climate change and natural disaster will benefit the people of adjoining areas particularly and overall masses of the province generally.
- viii. Reduce carbon dioxide and better protection and conservation of biodiversity will benefit the general masses.
- ix. Incremental increase in the potential of eco-tourism in the province will benefit the people w.r.t. the improvement in their mental health and reduction of stress.
- x. Abandoned habitat of blackbuck and other species would be furnished with corresponding species, which intern help to restore extinct species in their natural range of occurrence.
- xi. Enhanced public awareness will help to promote the cause of wildlife protection, conservation especially in the youth / students.
- xii. Research on biodiversity conservation in collaboration with universities would help to produce future managers of natural resource management on one hand, whereas on the other side it will facilitate the department to cope with emerging challenges of wildlife and habitat destruction.
- xiii. Poverty index of the adjoining communities would be improved through generation of different economic activities in their neighborhood which would intern upgrade their spending level for better health, education and other requirements.

10. Capital Cost Estimates

Estimation of project cost is based on the market rates of commodities and services and foreign exchange rates prevalent in January, 2019.

11. Annual operating and maintenance cost after completion of the project (Annual Recurring Cost)

After termination of the project, the estimated recurring cost for the activities carried out during first three years of the project has been calculated as **Annexure-C**.

12. Quantitative Objectives of the Project

Sr. No.	Wildlife Components / Particulars	Quantity / Units
i.	G.I.S. Lab at Head Office	01 No.
ii.	G.I.S. Nodes at Regional level	08 Nos.
iii.	Rehabilitation / Improvement of Wildlife Check posts	02 Nos.
iv.	Development of Wildlife Check posts i/c provision of allied facilities.	22 Nos.
v.	Development of Ara-Basharat National Park	01 No.
vi.	Management Planning and Preparation of Action Plan / Implementation Strategy for Kheri Murat	01 No.
vii.	Development of Model Wildlife Breeding Farm	01 No.
viii.	Development of Wildlife Reserve at Head Balloki	01 No.
ix.	Improvement and Restoration of Nermal Lake	01 No.
x.	Construction of Hatchery in Murree for supplementation & propagation of pheasants in respective ecological zones.	01 No.
xi.	Construction of Pre-release Pens for Pheasants in Murree hills.	04 Nos.
xii.	Development of Pre-release pen over 500 acres for reintroduction of Blackbuck in Cholistan alongwith allied facilities i.e. habitat enrichment, water ponds etc.	01 No.
xiii.	Improvement / Rehabilitation of Saidpur Hatchery i/c provision of allied facilities.	01 No.
xiv.	Impart training to Private Wildlife Breeding Farmers	100 Nos.
xv.	Capacity Building of Officers / Officials through short training courses / exposure visits	• 15-Officers training / Short courses in wildlife management • 20-Officers training / Short courses in project management. • 60-Staff training
xvi.	Management of Captive Wildlife Stock through Micro-Chipping	• 10 Nos. Wildlife Parks • 3 Nos. Zoos • 1 No. Safari Zoo

Sr. No.	Wildlife Components / Particulars	Quantity / Units
xvii.	Workshops on Wildlife Survey / Census / Wetlands management / Protected areas management	03 - Workshops
xviii.	Wildlife Sector Review & Formulation of Provincial Wildlife Conservation Strategy & Action Plan	01 No.
xix.	Development of Protected Area Management Plans	03 Nos.
xx.	Development of Wildlife Survey / Census Facility at District Level through provision of survey & I.T. equipments etc.	40 - Districts
xxi	Mass awareness programme	• 10-Seminars/workshop/ walks i/c development of website • Eco-awareness programme for students • Collaboration with Universities / NGOS / INGOS to promote Research on biodiversity conservation etc.
xxii	Human Resources / Project Management Unit	01 No.

13. Location of the Project

The following areas of the province will be tackled under this project during its gestation period.

Province / Territory	Locations
Punjab	i. Project Management Unit / PM&E Unit, Head Office, Lahore ii. Rawalpindi Region iii. Sargodha / Salt Range Region iv. Lahore & Sahiwal Region v. Faisalabad Region vi. Multan Region vii. D.G. Khan Region viii. Bahawalpur Region ix. Gujranwala Region

14. Methodology / Implementation Strategy

i). Development and Improvement of Central GIS Laboratory at Head Office, Lahore.

A GIS node was established at Head Office Lahore for the collection and development GIS and Remote Sensing Datasets of the Wetlands of Punjab. This node will be upgraded as a Central GIS Laboratory/Information and Communication Technology Center of Punjab Wildlife & Parks Department to cater all the vector and raster data regarding wildlife of Punjab Province in addition to the datasets of wetlands of Punjab.

Cost of Infrastructure Development and Machinery / Equipment

(Rs. in million)

Sr. No.	Items of Work	Qty	Rate/ Unit	Total
i.	Glass partition of server room, manager room	LS		0.248
ii.	Development of server table, server racks, manager's room racks and table, moveable drawers with improvement of tables of main lab	LS		0.812
iii.	Development of central table with racks for digitization and keeping of topo-sheets and other GIS / RS related hard copies	LS		0.100
iv.	Computer chairs for Server Room and Manager Room	4	0.025	0.100
v.	Computer chairs for main lab.	6	0.010	0.060
vi.	3 Seater Bench with steel frame	2	0.034	0.068
vii.	False ceiling with lighting and other electric work	LS		1.144
viii.	Desktop Computers, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multifunction DVD Writer or higher specs, with standard keyboard and mouse, equivalent or above	4	0.150	0.600
ix.	LED touch screens 24 to 30 inches, 16:9 aspect ratio, 1920x1080, HDMI & VGA Connectivity	5	0.050	0.250
x.	LED Screen 60 inches for display of maps, 3840x2160, built in wifi, wifi direct, 3xHDMI 2xUSB 1xEthernet ports.	1	0.350	0.350
xi.	Laptop , Core i7 7 th generation, 16GB Ram DDR3, 15 inch or higher display, 1TB SATA HDD 7200rpm Hard Drive, Blue Ray DVD Drive or higher, Gigabit Ethernet controller LAN, equivalent or above	2	0.175	0.350
xii.	Server Intel Xeon processor E5 2600 v4, RAM 64GB DDR4, 2400MT/s DIMM, 2TB 15000 RPM SATA Hard Drive, Ethernet controller 2x10Gbps, equivalent or above	2	0.500	1.000
xiii.	External Hard Drives for Data Storage and backup 8TB, transfer speed 220MB/s, USB 3.0 & 2.0 connectivity	1	0.080	0.080
xiv.	External Hard Drives for Data Storage and backup 3TB, transfer speed 220MB/s, USB 3.0 & 2.0 connectivity	2	0.030	0.060
xv.	External DVD/CD Writer	1	0.025	0.025
xvi.	Garmin GPS receiver units Map 64S or higher version	6	0.100	0.600
xvii.	GPS Camera 20 megapixel	1	0.100	0.100
xviii.	Multimedia with screen preferably Hitachi, CP-S 335 Panasonic or equivalent	1	0.160	0.160
xix.	UPS 5 KVA with dry batteries for servers	2	0.375	0.750
xx.	UPS 10 KVA with dry batteries for lab	1	0.605	0.605
xxi.	Laser Printer HP Laserjet M225DN MFP equivalent or above	1	0.060	0.060
xxii.	Color Printer HP Laserjet 5225 A3 Size equivalent or above	1	0.300	0.300
xxiii.	Plotter, HP DESIGNJET T790 ePrinter 44-inch with extra cartridges	1	0.650	0.650
xxiv.	Networking accessories for Networking of the lab Including, Cables, ducts, networking switches and networking charges	LS	0.500	0.500
xxv.	AC, Split type DC inverters, 1.5 ton, server room, manger room and lab	4	0.100	0.400
xxvi.	ArcGIS Server / Softwares	1	16.000	16.000

Sr. No.	Items of Work	Qty	Rate/ Unit	Total
xxvii.	ArcGIS Desktop with extensions / Softwares	1	6.000	6.000
xxviii.	High Performance 360 view camera	1	1.371	1.371
xxix.	Portable 360 Camera	9	0.158	1.422
xxx.	Multi-Spectral Imaging Camera with drone	1	2.421	2.421
xxxi.	High-Accuracy GNSS Tablets for survey, 4GB RAM, 64GB Internal Memory	10	0.177	1.770
xxxii.	54" Large Format Scanner	1	0.580	0.580
xxxiii.	ISCSI Storage Area Network with 40TB Disk Space	1	2.371	2.371
xxxiv.	Kaspersky Total Security Antivirus 5 years subscription	1	0.971	0.971
xxxv.	Firewall for internet security at server end	1	0.871	0.871
xxxvi.	Backup Server / Softwares	1	2.021	2.021
xxxvii.	Establishment of Wildlife Management Information System and GIS Applications	1	3.371	3.371
xxxviii.	Internet connection fiber optics & internet charges	LS	Job	2.521
xxxix.	Other (Contingencies)	LS	-	3.156
xxxx.	Stationery, Cartridges for plotter, printers etc.	LS	-	1.800
Total				56.018

Cost of Human Resource for GIS Lab

Sr. No.	Name of Post	*BPS	No. of Post	Total for project period
1.	GIS Analyst	17	1	4.954
2.	RS Analyst	17	1	4.954
3.	Network Administrator / GIS Web Developer	17	1	4.954
4.	Data Entry Operator	14	4	10.234
5.	Naib Qasid	1	2	1.849
Total:			9	26.945

* Recruitment criteria / TORs of the staff are attached as **Annexure-D**.

ii). Establishment of GIS Nodes at regional level with associated staff

Regional GIS nodes will be established at every region of the Punjab Province with a mandate to collect all the vector and raster data in their respective region and share it with the central GIS Lab. for the analysis. These regional nodes will be equipped with workstations, scanners, printers, digitizers, GPS receivers, with associated staff.

Cost of Infrastructure Development and Machinery / Equipments

Sr. No.	Items of Work	Qty	Rate/ Unit	Cost per Node	Total Cost (8 Nodes)
1.	Development of wall mounted tables with racks, soft boards, electrification, false ceiling etc.	LS		4.500	4.500
2.	Computer chairs	3	0.010	0.030	0.240
3.	White boards	1	0.010	0.010	0.080

Sr. No.	Items of Work	Qty	Rate/ Unit	Cost per Node	Total Cost (8 Nodes)
4.	Desktop Computer, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multi-format DVD Writer or higher specs, with standard keyboard and mouse, equivalent or above	2	0.150	0.300	2.400
5.	LED touch screens 24 to 30 inches, 16:9 aspect ratio, 1920x1080, HDMI & VGA Connectivity	3	0.050	0.150	1.200
6.	Laptop, Core i7 7th generation, 16GB Ram DDR3, 15 inch or higher display, 1TB SATA HDD 7200rpm Hard Drive, Blue Ray DVD Drive or higher, Gigabit Ethernet controller LAN, equivalent or above	1	0.175	0.175	1.400
7.	Server Intel Xeon processor E5 2600 v4, RAM 64GB DDR4, 2400MT/s DIMM, 2TB 15000 RPM SATA Hard Drive, Ethernet controller 2x10Gbps, equivalent or above	1	0.500	0.500	4.000
8.	External Hard Drives for Data Storage and backup 3TB, transfer speed 220MB/s, USB 3.0 & 2.0 connectivity	1	0.030	0.030	0.240
9.	External DVD/CD Writer	1	0.025	0.025	0.200
10.	Garmin GPS receiver units Map 64S or higher version	5	0.162	0.812	6.500
11.	GPS Camera 20 megapixel	1	1.500	1.500	1.500
12.	UPS 5 KVA with dry batteries	2	0.375	0.750	6.000
13.	Laser Printer HP LaserJet M225DN MFP equivalent or above	1	0.060	0.060	0.480
14.	Color Printer HP LaserJet 5225 A3 Size equivalent or above	1	0.300	0.300	2.400
15.	Networking accessories for Networking of the lab Including, Cables, ducts, networking switches and networking charges	LS	LS	0.625	5.000
16.	AC, Split type DC inverters, 1.5 ton	1	0.100	0.100	0.800
17.	Steel Almirah	1	0.020	0.020	0.160
18.	Provision of Internet Connection & internet charges	1	2.370	2.370	18.960
19.	Other (Contingencies)	LS	LS	1.350	14.136
				Total:	70.196

Cost of Human Resource for Regional Nodes

Sr. No.	Name of Post	BPS	No. of Post	Total for project period
1.	GIS/RS Analyst	17	8	44.898
2.	Data Entry Operator	14	8	6.934
			Total:	16
				51.832

iii). **Strengthening of Wildlife Protection Measures – Rehabilitation & Construction of Wildlife Check posts & Logistic Support.**

A) Following is the list of wildlife check posts with cost of rehabilitation and improvement and provision of missing facilities, etc.

Sr. No.	Name of Check Post	Region	District	Cost
1.	Kot Addu	D.G. Khan	Muzaffargarh	0.336
2.	Head Panjnad	D.G. Khan	Muzaffargarh	0.114
Total:				0.450

B Development of Wildlife Check Posts i/c provision of allied facilities.

Sr. No.	Name of Area	Nos	Rate	Total Cost
1.	Salt Range	04	4.064	16.256
2.	D.G. Khan	04	4.064	16.256
3.	Murree	04	4.064	16.256
4.	Kahuta	01	4.064	4.064
5.	Attock	03	4.064	12.192
6.	Cholistan	06	4.064	24.384
Total:		22	4.064	89.408

C Provision of logistic support to wildlife check posts.

Sr. No.	Name of Item	Nos	Rate	Total Cost
1.	Motorcycles 125CC Honda Delux, 2 Nos. for each check post	44	0.150	6.600
Total:		44	0.150	6.600

D Cost of Human Resource for Check Post

Sr No	Items of Work	B P S	No. of Post	2016-17	2017-18	2018-19	2019-20 (6-months)	2020-21	2021-22	2022-23	Total
1.	Wildlife Inspectors	09	22	0.00	0.00	0.00	1.080	4.644	7.140	10.010	22.874
2.	Wildlife Watchers	05	66	0.00	0.00	0.00	2.700	11.610	17.852	25.030	57.192
Total:			88	0.00	0.00	0.00	3.780	16.254	24.992	35.040	80.066

iv). **Establishment of National Parks and Management Planning**

Prior to 1966 Pakistan had taken no significant steps towards establishing protected areas network. That year at the invitation of Government of Pakistan the **World Wildlife Fund carried out a survey of country's wildlife resources** and recommended measures to arrest their deterioration. These included the **establishment of two large National Parks and eight Wildlife Sanctuaries**. This initiative was followed by constitution of Wildlife Enquiry Committee in 1968, which made further recommendations for the establishment of four National Parks, 18 Wildlife Sanctuaries and 52 Game reserves (Government of Pakistan, 1971). These recommendations have been substantially exceeded 4 National Parks, 44 Wildlife Sanctuaries and 65 Game reserves by the year 1978.

Though 1983 Environment Protection Ordinance was an important step towards dealing environment problems more precisely, but it was not implemented even after the establishment of Pakistan Environment Protection Council. **In 1992, heads of many countries signed Agenda 21 on the eve of Earth Summit on global commitment to protect environment and promote sustainable development in Rio de Janeiro.** That was the time when Pakistan prepared its **National Conservation Strategy** for sustainable development and environmental improvement. After Mid-Term review of NCS, Ministry of Environment developed a National Environment Action Plan which started working in 2001. Pakistan is also a party to Convention of Biological Diversity since 1994. Being a party to CBD, Government of Pakistan has prepared Biodiversity Action Plan in 2000 with the help of IUCN and WWF for sustainable use of biological resources and maintenance of biological diversity.

According to **Third National Report on Implementation of Biodiversity Action Plan**, the target of enhancing the percentage of protected areas of the country to 12% has been achieved. Time framework, targets and indicators were developed under the Protected Areas Management Project (PAMP) for three national parks i.e. Hingol, Chitral Gol and Machiara national parks. The model shall be followed for other Protected Areas.

New protected areas are being established in un-fragmented natural areas and areas under high threat. In the recent past, new National Parks and other protected areas have been notified in regions of NWFP and AJK. Initial consultative process for declaration of Marine protected Areas has also been initiated by IUCN Karachi, Pakistan.

In Punjab Province there are 64 protected areas comprising of 4 National Parks, 37 wildlife sanctuaries and 23 game reserves covering an area 4,575,071 acres which is only 9% of the total land mass of the Punjab Province. Keeping on view the National and International obligations and status of biological resources of the Province there is a dire need to establish new Protected Areas in the Province along with enhancing protection level of existing PAs.

Under the broader framework of the existing project "Green Pakistan Programme-Revival of Wildlife Resources" the department will establish a new national park i.e., Ara-Basharat National Park. The clause-17 of the Punjab Wildlife (Protection, Preservation, Conservation and Management Act, 2007 supports the declaration of National Park as under.

"With a view to the protection and preservation of flora and fauna in the natural state, Government may, by notification in the official gazette, declare any area which is the property of Government or over which Government has proprietary rights to be a national park and may demarcate it in such manner as may be prescribed".

As per aforesaid provision of Wildlife Act and preliminary field report, following forest areas (32,904 acres state land) is proposed to establish Ara-Basharat National Park.

i.	Ara Reserve Forest, District Chakwal	10,685 Acres
ii.	Makhila Reserve Forest, District Chakwal	8,005 Acres
iii.	Parrera Reserve Forest District Chakwal	3,264 Acres
iv.	Phadial Reserve Forest District Chakwal	10,950 Acres

The proposed forest areas are interlinked with each other and may be used for the establishment of National Park.

Following are the key activities identified under the project.

- A. GIS based boundary delineation and demarcation
- B. Topographic mapping of the area.
- C. Landcover / landuse mapping using remote sensing technology
- D. GIS based notification of the protected area
- E. Baseline studies of Birds, Mammals, Reptiles, Amphibians, Insects, plants etc.
- F. Zonation and Management planning of the National Park

Besides establishment of Ara-Basharat National Park, management and action plans together with implementation strategy of other two areas i.e. Kheri Murat (to be declared as National Park) and Murree-Khutta National Park would also be undertaken in order to conserve the biological resources of the Province.

Break-up of Cost (Ara-Basharat National Park)

Sr. No.	Items	Total
1.	Conservancy & Works	1967.952
2.	Machinery, tools, Stores and Equipment	346.687
3.	Establishment	258.808
4.	Commodities & Services and others	510.895
Total:		3084.342

Detail Break-up is attached as **Annexure-E**

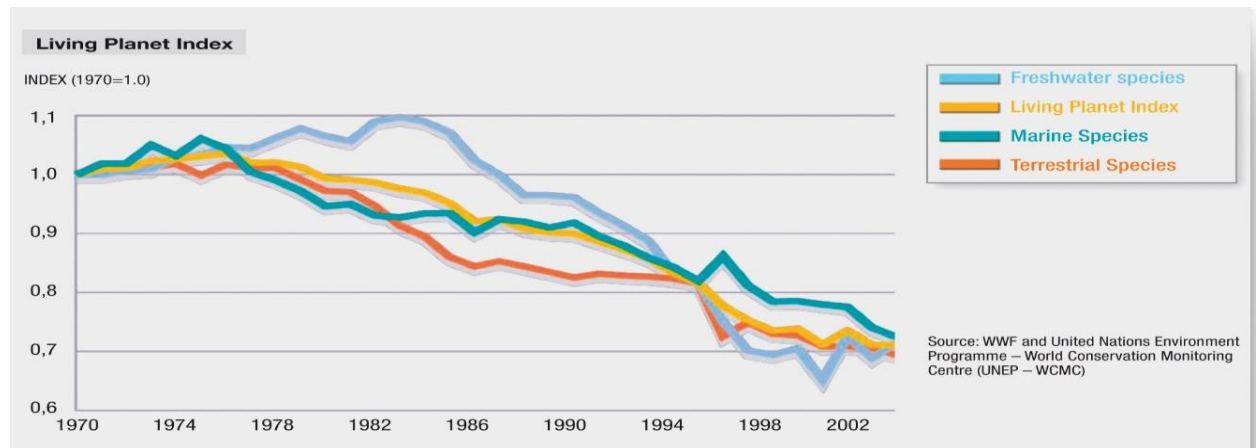
v). Establishment of Kheri Murat National Park

Sr. No.	Items	Total
1.	Conservancy & Work	178.167
2.	Machinery, Commodities & Services	54.550
3.	Establishment	69.742
Total:		302.459

Detail Break-up is attached as **Annexure-F**

vi). Development of Model Wildlife Breeding Farm

The reality of biodiversity crisis and environmental destruction, apparent loss and decline of species worldwide is universally accepted. The Living Planet Index (Figure below) is one measure of this loss of biological diversity. Its use as an indicator of global biodiversity reveals that vertebrate populations have declined by almost 30% over the period from 1970 to 2007. According to the International Union for Conservation of Nature (IUCN), if we focus on the planet's mammal species, 23% of them are threatened to some degree. The degradation of their habitats and fragmentation of their populations are often the main causes of their decline. But pressure from hunting and competition with domestic animals have also played a significant role in the disappearance of many of these species, which until recently were abundant in the wild.



Given this state of loss of biodiversity, tools are needed to restore the populations of wildlife species. In its Technical Guidelines on the Management of Ex-situ populations for Conservation (2002), the IUCN, says that “a goal of conservation is the maintenance of existing current genetic diversity and viable populations of all taxa in the wild in order to maintain biological interactions, ecological processes and function.” And it adds that: “The threats to biodiversity in-situ [i.e., wherever it is found] continue to expand, and taxa have to survive in increasingly human-modified environments. Threats, which include habitat loss, climate change, unsustainable use, and invasive organisms and pathogenic organisms, can be difficult to control.”

And it concludes that “the reality of the current situation is that it will not be possible to ensure the survival of an increasing number of threatened taxa without effectively using a diverse range of complementary conservation approaches and techniques, including, for some taxa, increasing the role and practical use of ex situ techniques.”

Captive breeding programmes are one of these ex-situ conservation techniques (i.e., those performed outside of the range of the species in question) advocated by the IUCN and may perhaps be the most important techniques when it comes to efforts to prevent the total extinction of some endangered species.

Punjab Wildlife & Parks Department has established 16 wildlife parks cum breeding centers all over the Punjab for captive breeding (ex-situ conservation) of threatened wildlife species of the province. The breeding rate / capacity of these breeding centers has not been adequate since their establishment. This might be due to the reason that these wildlife parks / breeding centers have public access which causes disturbance during the breeding season of different species.

Keeping in view the aforementioned reason development of model wildlife breeding farm is planned under the Green Pakistan Programme which would be a state of the art facility to breed threatened birds, ungulates and carnivore species. The project would be developed over an area of 100-acres in Chichawatni Plantation.

Break-up of Cost (Model Wildlife Breeding Farm)

Sr. No.	Items	Total
1.	Conservancy & Works	480.002
2.	Machinery, tools, Stores and Equipment	77.885
3.	Establishment	75.352
4.	Commodities & Services	336.133
Total:		969.372

Detail Break-up is attached as **Annexure-G**

vii). Development of Hatchery in Murree for supplementation, propagation & conservation of Pheasants

Pheasants are regarded as the most distinctive bird family of the Himalaya, perhaps, due to their charismatic features and also their significant role in the high-altitude ecosystem. They serve as useful indicator of habitat/environmental quality, as a major prey base for predatory birds and mammals and indicators of adverse human impacts on their ecosystems. They are large bodied, brightly colored, ground dwelling birds, which belong to family Phasianidae and order Galliformes. These birds exhibit greater sexual dimorphism in both size and plumage. The kalij pheasant (*Lophura leucomelanos*) is a pheasant found in forests and thickets, especially in the Himalayan foothills, from Pakistan to western Thailand. Males are rather variable depending on the subspecies involved, but all have an at least partially glossy bluish-black plumage, while females are overall brownish. Both sexes have a bare red face and greyish legs (the latter separating it from the red-legged silver pheasant). It is generally common and widespread, though three of its eastern subspecies (*oatesi*, *lineata* and *crawfurdi*) are considered threatened and *moffitti* is virtually unknown in the wild.

Distribution and Habitat

Kalij Pheasants (*Lophura leucomelana*) comprise a complex of nine subspecies within the gallopheasant group whose distribution extends from the Indus River of Pakistan in the western Himalayas, eastward through northern India, Nepal, Sikkim, Bhutan, and south through Burma to western Thailand (Delacour 1949). They are sedentary in forested foothills and mountainous country from 600-3400 m elevations. along woodland roads, brushy ravines, and at the edges of forest clearings, but may move to lower elevations during winter (Bump and Bohl 1961, Bohl 1971).

Kalij Pheasants are found in AJK, Kahuta, Murree (Lower Topa, Charhan, Kuldana, Khanitak, Malot, Masot, Angoori, Kathar, Gharanda, Baroha), Kotli Satian (Karor, Badnia, Basant) and Marghala hills. In Punjab, its population has been decreased to an alarming level due to habitat deterioration, poaching and other detrimental reasons which needs to be addressed immediately. Therefore, in order to conserve and further supplementation of Kalij pheasants in Murree Hills, hatchery and pre-release pens would be developed together with allied facilities and protection measures. Similarly, the existing Saidpur hatchery would also be re-habilitated / improved.

Development of Hatchery in Murree for supplementation, propagation and conservation of Pheasants in respective ecological zones

Sr. No.	Items	Total
1.	Conservancy & Works	51.896
2.	Machinery, tools, Stores and Equipment	22.055
3.	Establishment	18.605
4.	Commodities & Services	76.945
Total:		169.501

Detail Break-up is attached as **Annexure-H**

Construction of Pre-release Pens for Pheasants in Murree Hills.

Sr. No.	Items	Total
1.	Conservancy & Works	26.972
2.	Machinery, tools, Stores and Equipment	10.850
3.	Establishment	17.207
4.	Commodities & Services	21.200
Total:		76.229

Detail Break-up is attached as **Annexure-I**

Improvement / Rehabilitation of Saidpur Hatchery i/c provision of allied facilities.

Sr. No.	Items	Total
1.	Conservancy & Works	19.768
2.	Machinery, tools, Stores and Equipments	21.125
3.	Establishment	7.473
4.	Commodities & Services i/c cost of parent breeding flock, food etc.	26.845
Total:		75.211

Detail Break-up is attached as **Annexure-J**

viii). In-situ Conservation and Re-introduction of Blackbuck in Cholistan Area of Punjab Province

Blackbuck (*Antelope cervicapra*) is native to parts of Nepal, India and Pakistan and belongs to a monotypic genus. Blackbuck are primarily grazing animal and avoid forest areas. But will survive in semi desert regions as long as there is sufficient scattered vegetation. Within Pakistan territory, there is no evidence that they ever extended west of the Indus, they were most numerous in the semi-desert tracts on the borders of Rajasthan (India). They are never found in mountainous country. Prior to the nineteenth century, blackbuck was one of the most abundant ungulates in the Indian subcontinent, with an estimated population of around 4 million. However, hunting and habitat loss caused a substantial decline in population, with less than 80,000 animals remaining by 1964. The native population in India is stable, with an estimated 50,000 individuals in the recent past.

The main stronghold of the Blackbuck within Pakistan territory used to be around Bahawalnagar and Fort Abbas in the northern part of Cholistan. In the 1950s they were regularly seen and hunted around Bahawalnagar. Even as recently as 1967 there was a group of twelve Blackbuck in Mogiwali Toba, a natural area of thorn forest (*Prosopis spicigera*) near Phulra close to the Indian border. They remained under observation for about two years but left the territory due to the prolonged drought. One or two Blackbuck were also seen to frequent Dodhlanwala Toba further south. Lieutenant General Marden recalls seeing many groups of twenty to thirty Black buck in the desert around Dharawar in the 1930s but these have long since been exterminated. Apart from these places Cholistan near the India border. Black buck also occurred on the edge of the Thar Desert near Nagarparkar, though they have never been common in this area, and no more than the occasional single individual was sighted. The former Mir of Khairpur introduced Blackbuck in the early part of this century into Takkar in the eastern desert portion of his State (northern Sindh) where they were allowed to roam wild. In the 1950s Blackbuck were still numerous in this region.

The species is now listed in Appendix II of the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), classed as 'near threatened' in the International Union for the Conservation of Nature (IUCN) Red List, and protected under the Punjab Wildlife Act 1974. According to the IUCN's Conservation Assessment and Management Plan (CAMP) of Mammals of Pakistan report it is nationally assessed as Extinct in Wild in Pakistan. Mention must be made of a number of projects to reintroduce Blackbuck into Pakistan, the first at Lal Suhanra National Park, Bahawalpur. The Blackbuck were donated by Texas ranchers from a flourishing population earlier introduced into Texas, USA. Later imports, through WWF Pakistan efforts, from captive herds in Denmark and Holland have resulted in establishment of captive herds at Khar in the Kirthar National Park, at Kalabagh in the Punjab Salt Range, and at Jallo Park outside Lahore. In 1993, there were about 80 animals in Lal Sohanran, over 60 in Khar, over 30 in Kahirpur Mirs and about 25 in Jallo Zoo Park. So far, no solid attempt has been made to release any of these animals into the wild. Now, current study / activities are planned to introduce the blackbuck in wild while focusing on the research on their survival, behavior and breeding.

Plan of Action

A pre-release enclosure of 500 acre is planned to be constructed in the Cholistan Desert which will be enriched with natural vegetation compared with the habitat of wild blackbuck including water bodies. Fawns of suitable age selected from different wildlife breeding centers of Punjab Wildlife Department and Forest Departments will be tagged and shifted to the pre-release enclosure and feed on the natural vegetation and live in semi-wild condition leading to induce wild instinct in their behavior. At parallel area of 1km in radius outside the pre-release enclosure will be enriched with natural habitat conditions for blackbuck. At later stage the animals will be gradually released in the wild and monitoring will be carried out accordingly.

Key Activities of the Project

- ☐ Construction of pre-release enclosure which will include natural water bodies and natural vegetation.
- ☐ Hiring of Staff and procurement of necessary equipment and store items
- ☐ Identification/selection of fawn to be translocated to the pre-release enclosure.
- ☐ Tagging and translocation of fawns to the pre-release enclosure.
- ☐ Studies on survival, behavior and breeding of the released fawns.
- ☐ Gradual release and monitoring of the released animal in the wilderness

Break-up of Cost (Re-introduction of Blackbuck in Cholistan)

Sr. No.	Items	Total
1.	Conservancy & Works	51.737
2.	Machinery, tools, Stores and Equipment	40.000
3.	Establishment	39.356
4.	Commodities & Services and others	35.200
Total:		166.293

Detail Break-up is attached as **Annexure-K**

Break-up of Cost (Nemal Lake)

Sr. No.	Items	Total
1.	Conservancy & Works	61.423
2.	Machinery, tools, Stores and Equipment	17.115
3.	Establishment	32.342
4.	Commodities & Services and others	77.200
Total:		188.080

Detail Break-up is attached as **Annexure-L**

Break-up of Cost (Head Balloki)

Sr. No.	Items	Total
1.	Conservancy & Works	125.932
2.	Machinery, tools, Stores and Equipment	11.350
3.	Establishment	31.385
4.	Commodities & Services and others	42.550
Total:		211.217

Detail Break-up is attached as **Annexure-M**

- ix). **Capacity building of officers / officials through training, short courses / exposure visits both for local areas as well as abroad.**
Training courses for Wildlife Managers

- a). **Course Title:** Integrated Species Conservation and Management

Course contents:

- The role of zoos in conservation
- Extinctions – past and present
- Indicator, flagship, keystone and umbrella species in conservation
- Conservation genetics and species conservation
- Population Viability Analysis
- Assessing priorities
- Role of communities
- Field trip for direct observations
- Designing species recovery programmes
- Translocations and reintroductions
- Balancing in situ and ex situ conservation.

Course Location: The course will preferably run at Durrell Conservation Academy at Durrell's headquarters in Jersey, UK. However, other compatible organizations / universities may also be selected.

Course cost: The course will cost Rs.7,00,000/- per person

Total Cost Rs.7,00,000 x 5 = **3.500 million**

- b). **Course Title:** Avian Egg Incubation Workshop

Course Duration: The Avian egg incubation workshop is a practical workshop designed to give participants the skills required to successfully incubate bird eggs and deal with problems that could arise.

Course contents:

- Embryo and membrane development
- Factors affecting hatchability before and during incubation
- Hatchery management techniques
- Artificial incubation and its role in field conservation programmes

Course Location: The course will preferably run at Durrell Conservation Academy at Durrell's headquarters in Jersey, UK. However, other compatible organizations / universities may also be selected.

Course cost: The course will cost Rs.7,00,000/- per person

Total Cost Rs.7,00,000 x 5 = **3.500 million**

c). **Course Title:** Certificate Course in Wildlife Management

Course Duration: As per available schedule with relevant institution

Course Location: Preferably Wildlife Institute of South Asian Region. However, some other compatible regional institutions may be selected.

Course Contents: The main objectives of the course are to:

- Provide understanding and knowledge on modern concepts in wildlife management,
- Provide an insight into relevant conservation policies and legislation and their enforcement mechanism at Global, Regional, National, State and Local Level,
- Provide hands on experience and training in use of modern scientific methods, techniques and tools that are required for assessment and monitoring of conservation goals,
- Develop understanding of landscape approach to conservation and skills for scientific wildlife management planning, and
- Develop skills for resolving human wildlife conflict including capture, handling, care and management of wild animal.

The broad outline of the course structure includes the following modules:

- Wildlife Species and Habitats
- Population Estimation
- Remote Sensing and GIS
- Wildlife Management (Human Wildlife Conflict including Capture and Restraint, Wildlife Health Management, Habitat Management, Law, Management Planning, Enforcement and Monitoring, Ex-situ Conservation and management, Communities and Outreach)

Course cost: Rs.10,00,000/- per person

Total Cost: Rs.10,00,000/- x 5 = **5.000 million**

- d). **Course Title:** Training course in I.T. based project management from reputed training institute i.e. PIM, IBA and other compatible national / sub-national institutions etc.

Course Duration: One week (Five Working Days)

Course Location: Pakistan

Course Cost: Rs.56,250/- per person

Course Contents:

- What is project & project management framework
- Integration of organization strategy with projects
- Project integration management
- Scope management
- Time Management
- Cost Management
- Quality Management
- Human Resources Management
- Communication Management
- Risk Management
- Procurement Management
- How to develop a project organization

Total Cost = Rs.56250 x 20 = **1.125 million**

- e). **Course Title:** Staff training in various office management & wildlife management areas

Location: Pakistan

Course Duration: Three to Five Working Days

Course Cost: Rs.37,500/- per person

Total Cost: Rs.37,500 x 60 = **2.250 million**

Cost of Capacity Buildings / Trainings = Rs.15.375 million

x). Workshops for Capacity Building

Following Capacity Buildings Workshops would be conducted with the help of trainers

a). Title: Workshop on Integrated Wetland Management

Workshop Introduction:

Wetlands support a wide spectrum of globally important biodiversity that merits support from the international community to ensure its sustainable conservation. A significant fraction of Punjab's wetlands-dependent biodiversity is classified as endemic threatened and vulnerable in internationally recognized evaluations such as IUCN's Red Data Book. Furthermore, international conventions such as Ramsar have recognized the role that Pakistan's wetlands play in maintaining and sustaining regional ecological processes that support globally important biodiversity such as bird migration routes and wintering grounds. While the country is making efforts to conserve its wetlands, it is constrained in this task by lack of access to physical and financial resources and immediate political and economic problems.

Pakistan has demonstrated its fundamental commitment to biodiversity conservation in general and wetlands conservation in particular through its support for appropriate international conventions. The adoption of a Wetlands Action Plan in 2000 further illustrates the Government of Pakistan's recognition of the importance of wetlands and the need to find sustainable solutions for their conservation. After the 18th amendment the subject area 'wetlands' has become Provincial business and Punjab Wildlife & Parks Department being the main stakeholder has mandate to build the capacity of its staff for the effective management of wetlands of Punjab Province including globally significant RAMSAR sites.

Location: Lahore / Pakistan

Cost:

Sr. No.	Items of Work	Rate / Unit	Total
1	Boarding / Lodging charges of the Trainers	0.350	0.350
2	Air and local travel of guest speaker / Trainers	0.500	0.500
3	Charges of Venue including hall rent and tee/lunch for the participants	1.000	1.000
4	Honoraria for local guest speakers	0.200	0.200
5	Other (Contingencies)	0.200	0.200
Total:			2.250

b). Title: Workshop on Protected Areas Management

Workshop Introduction:

Wildlife and protected area management should aim to conserve native faunas together with their natural habitats and to improve the livelihoods of rural communities. Activities should include the preparation, publishing and dissemination of concepts, studies, policy recommendations, guidelines, best practices, and other educational resources; support to regional networks; design and implementation of field projects; the organization of and participation in technical workshops, expert meetings and information events; as well as capacity development and training.

With this back ground Punjab Wildlife & Parks Department has planned to build the capacity of its field staff in following areas under Protected Areas Management initiative:

- Ecotourism in protected areas
- wildlife policies and legislation for protected areas
- design and management of protected areas
- wildlife conservation and sustainable management
- impacts of climate change on wildlife and protected areas
- protected areas zonation
- protected areas boundary delineation
- disease dynamics at the human-wildlife-livestock-ecosystem interface

Location: Lahore / Pakistan

Cost:

Sr. No.	Items of Work	Rate / Unit	Total
1	Boarding / Lodging charges of the Trainers	0.350	0.350
2	Air and local travel of guest speaker / Trainer	0.500	0.500
3	Charges of Venue including hall rent and tee/lunch for the participants	1.000	1.000
4	Honoraria for local guest speakers	0.200	0.200
5	Other (Contingencies)	0.200	0.200
Total:			2.250

c). Title: Workshop on Capacity Building and Wildlife Surveys

Workshop Introduction:

Conservation activities including wildlife surveys are carried out by the officers and officials of the Punjab Wildlife & Parks Department throughout the year. But lack of technical capacity is one of the biggest constraints towards the standardization and publication of the outcome of these activities. A training is being planned by the Department for capacity building of officers and officials to standardize survey & census methods and publish research output in well reputed peer reviewed scientific journals.

Location: Lahore / Pakistan

Cost:

Sr. No.	Items of Work	Rate / Unit	Total
1	Boarding / Lodging charges of the Trainers	0.350	0.350
2	Air Travel and local travel of guest speaker / Trainer	0.500	0.500
3	Charges of Venue including hall rent and tee/lunch for the participants	1.000	1.000
4	Honoraria for local guest speakers	0.200	0.200
5	Other (Contingencies)	0.200	0.200
Total:			2.250

xi). Eco Awareness Programme for Students

An eco-awareness programme will be launched for the students of Schools, Colleges and Universities enabling them to participate in the different ongoing activities of Punjab Wildlife & Parks Department which will help in sensitizing the new generation for wildlife conservation. These students will get hands on awareness / training in Zoos / Wildlife Parks, Field Trips and other field activities of Punjab Wildlife and Parks Department.

- Each session will be of one day long with minimum 10 participants from school, colleges or universities.
- 48-Eco awareness sessions would be conducted.
- Transportation, boarding and lodging will be provided by the Department through rental services.
- Sessions will be held year round
- Students will receive a certificate from Punjab Wildlife and Parks Department after the successful completion of the eco-awareness programme.

Cost involved includes:

Sr. No.	Items of Work	Rate/ Unit	Total
1.	Rent a Vehicle for transportation	3.840	3.840
2.	Tents Dome Shaped (2 to 3 Person)	0.270	0.270
3.	Mess Tent	0.100	0.100
4.	Folding Tables	0.100	0.100
5.	Folding Chairs	0.150	0.150
6.	Sleeping Bags with Mattresses	0.375	0.375
7.	GPS Receivers	0.500	0.500
8.	Digital Camera 20 MP with card	0.200	0.200
9.	Generator 5 KVA Honda/YAMAHA with cables and electric boards	0.850	0.850
10.	Cost of Food etc. for students.	2.400	2.400
11.	Other (Contingencies)	7.200	7.200
Total:			15.985

xii) Development of Wildlife Survey / Census Facilities at District level – Provision of Survey & Census and I.T. Equipments

Currently there is no system of Wildlife Survey / Census at District level. Some arrangements of wildlife survey / census are existed at PWRI, which normally conduct census of two or three wildlife species i.e. waterfowl partridges and Indus blind dolphins at an irregular intervals. Resultantly, no database is collected and maintained for future planning to meet the emerging challenges of rapidly depleting wildlife resources. Foregoing in view, it is proposed that a small facility of wildlife census / survey be established at District level to conduct regular survey / census of prevailing wildlife resources in the district. The data so collected would be compiled at district level and thereafter would be consolidated at provincial headquarters.

A list of equipment to strengthen the survey / census component of the Punjab Wildlife & Parks department with estimated cost is given in the following table.

Sr. No.	Items	Qty	Rate/ Unit	Total
1.	Binoculars Nikon 12x50 (1 in each District)	40	0.030	1.200
2.	Binoculars Nikon 16x50 (1 in each District)	40	0.040	1.600
3.	Tents Dome Shaped (2 to 3 Person)	40	0.045	1.800
4.	Kit Bags	40	0.010	0.400
5.	Hand torch	40	0.002	0.080
6.	First Aid Pouch	40	0.002	0.080
7.	Insulated Mug / Thermos	40	0.004	0.160
8.	Water Bottle, Stainless steel	40	0.003	0.120
9.	Measuring tape	40	0.001	0.040
10.	Rope Nylon	LS	LS	0.050
11.	Note books and pen	40	0.001	0.040
12.	Jacket	40	0.010	0.400
13.	Magnifying glass	40	0.001	0.040
14.	Sleeping Bags with Mattresses (3 in each District)	120	0.025	3.000
15.	GPS Receivers Garmin 64S or equivalent (1 in each District)	40	0.100	4.000
16.	DSLR Camera Canon D70 or equivalent with 400m lenses (1 in each Division) with memory cards and tripod stands	10	0.500	5.000
17.	Emergency lights, solar rechargeable	40	0.010	0.400
18.	Search light with bag and batteries	40	0.020	0.800
19.	Spotting Scopes 80x60 or higher with tripod stand (1 in each Division)	10	0.300	3.000
20.	Desktop Computers, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multi-format DVD Writer or higher specs, with standard keyboard, mouse, LED 24" to 30", Printer A4, Scanner A4 and UPS 2 KVA with dry batteries, equivalent or above.	40	0.500	20.000
Total				42.210

xiii). Wildlife Sector Review & Development of Provincial Wildlife Conservation Strategy, Implementation Plan and Protected Areas Management Plans

The Punjab province covers an area of 20.6 million hectares, that constitute 23.45% of land mass of Pakistan and the areas where wildlife can find their habitat is 40% of the total land area of the Punjab. The protected areas such as wildlife sanctuaries, game reserves, national parks, wildlife parks / breeding centers and zoos notified under wildlife act are spreading over about 16% of total land mass of the province of Punjab. But the wildlife population and their habitats are suffering at the hands of human beings who are their longest associates. The population of wildlife is decreasing day by day due to various factors such as social factors, economic factors, political factors, demographic factors, environmental factors including: drought seasons, floods, deforestation, conversion of habitat into agricultural use, industrial use of habitat, greenhouse gases emissions, excessive use of pesticides and human intervention in natural habitat.

The purpose of this study is to conduct a sectoral study of wildlife resources their habitat and factors limiting propagation of wildlife both in natural habitat as well as in captivity, identification of gaps, to devise a comprehensive wildlife policy and suggest amendments in Wildlife Act and relevant rules in the light of study report and to meet the emerging challenges. The study will also focus on the development of protected areas system plans for three identified representative ecological zones i.e Wetland areas, Cholistan and Salt Range of Punjab. The protected area plans so prepared would be helpful to introduce endangered and recently extinct native wildlife species in their relevant habitats as well as management of protected areas on scientific lines

The study will also provide guidelines to improve fundamental principles and rules for establishment of CBOs in the wildlife potential areas and involve local community in the protection of endangered wildlife species so they feel themselves as their custodians and protectors of wildlife. The consultants would be hired following the guidelines for selection of consultants of PPRA Rules, Government of Punjab. The sector review study including development of provincial wildlife policy and development of protected areas system plans would cover, but not limited, the following broader analytical review of:

a) Sector Review, Wildlife Conservation Strategy and implementation plan

- i. Existing scenario of wildlife resources in the province.
- ii. Existing habitat conditions – their categories and different pressures on habitat such as grazing, dependence of adjoining communities on habitat for their livelihood etc.
- iii. Biodiversity count of province
- iv. Factors effecting wildlife status/decrease in population both indigenous and exotic such as:
 - a. Social factors
 - b. Economic factors
 - c. Political factors
 - d. Demographic factors
- v. Environmental factors including Drought seasons, floods, deforestation, conversion of habitat into agricultural use, industrial use of habitat, greenhouse gases emissions, excessive use of pesticides and human intervention in natural habitat Study of entire protected areas such as:
 - a. Wildlife sanctuaries
 - b. Game reserves
 - c. National parks including Wildlife Parks / Breeding Centres / Zoos
 - d. Potential of floral and faunal
 - e. Management Issues

- vi. Study of existing legislation such as:
 - a. Wildlife Act and Rules framed their under
 - b. Policy review and suggestions for improvement measures.
- vii. Study of illegal hunting and poaching pressure
- viii. Measures to reduce illegal hunting and poaching
- ix. Analytical review of capacity of wildlife department with reference to wildlife protection, management, conservation and preservation in the province.
- x. Factors limiting capacity of wildlife department to enforce legislation and corrective measures
- xi. Failure and success stories of wildlife department with reference to wildlife management focusing:
 - a. In-situ conservation
 - b. Ex-situ conservation
- xii. Critical analysis and review of private wildlife breeding farms and suggestion to improve wildlife in private sector.
- xiii. Analytical review of implementation with respect to international conventions to which Pakistan is signatory and national policies etc.
- xiv. Recommendations and action plan to improve wildlife status in the province covering all above mentioned areas.
- xv. The sectoral review, Conservation Strategy and implementation plan would be a self-contained and well elaborated document which would be prepared as per best international practices and on acceptable format.

b) Protected Areas Management plans

- i. Survey of selected areas with reference to floral and faunal resources.
- ii. Study of wildlife population resources both indigenous and exotic
- iii. Existing land use practices, analytical study of best international practices with reference to management planning.
- iv. Proposal to improve land use practices.
- v. GIS based mapping of area selected for management planning with clear identification and demarcation of boundaries.
- vi. Involvement of local communities and develop a mechanism to potentially involve local population to ensure sustainable management of wildlife.
- vii. Identification of root causes and potential threats to the area selected for management plans and course correctives.
- viii. Devise plan for reintroduction of native wildlife species.
- ix. Devise plan for improvement of habitat, develop suitable and conducive wildlife refuge areas, especially for-seeing natural calamities, disasters, droughts and any other abnormal happenings.
- x. Designing HR models to ensure optimal utilization of natural resources of area selected for management planning.
- xi. Plan and develop implementation strategy of interventions proposed for management planning and corresponding financial outlay.
- xii. Develop management plans covering above said factors
- xiii. The Protected Areas Management Plans would be developed as per best international standard on acceptable format.

Cost break-up

Sr. No.	Item of Work	Qty.	Unit Rate	Total
i.	Short consultancy / experts charges to conduct Sectoral Review Analysis and development of provincial wildlife Conservation Strategy including action plan.	1	L.S.	5.250
ii.	Short consultancy / experts charges to develop protected areas management plans for three selected ecological zones.	3	L.S.	10.500
iii.	Others / contingencies	L.S.	L.S.	0.500
Total:		-	-	16.250

Draft TORs are attached as **Annexure-O**.

xiv). Incentivized Facilities to Private Breeding Farms

Currently a chain of Wildlife Breeding Farms (more than 130-Nos.) have been established in Private Sector. These breeding farms are regulated by the Punjab Wildlife & Parks Department. The private breeding farms are playing a vital role for captive breeding of wildlife species and supply of wildlife resources to interested parties. But due to lack of expertise of wildlife management in private sector, there is dyer need that the capacity of private breeders should be build-up to maintain the wildlife stock on scientific lines in the following areas.

- Introduction of local and international marketing of wildlife stock
- Proper pairing and maintenance of reliable gene pool
- Animal handling / translocation
- Treatment, vaccination / immunization
- Wildlife rescue
- Feed intake, assimilation and preference
- Nutritional values and metabolism
- Epidemic and outbreaks
- Serum therapy and passive immunity
- Effect of feed on breeding
- Bio-safety measures and vector control

The experts of relevant fields would be invited from the well-known institutions like Agriculture University, UVAS, WWF, IUCN, NGOs / INGOs, Wildlife Department of other provinces, MoCC and other compatible organizations.

Workshops cost (four workshops / training session)

Sr. No.	Item of work	Qty	Rate / Unit	Total
i.	Boarding lodging of the guest speakers	4/days	0.050	0.200
ii.	Travel charges of guest speakers	L.S.	0.400	0.400
iii.	Charges of venue including hall rent and tea / lunch for the participants (100/participants)	4/day (four workshops)	0.200	0.800
iv.	Honoraria for guest speakers	8 Nos.	0.025	0.200
v.	Others / contingencies	L.S.	0.200	0.200
Total:				1.800

xv). Mass Awareness Campaign

The mass awareness campaign has been prepared with a view to reach general public / masses for the protection and preservation of wildlife resources in the province. The electronic and print media shall be engaged for motivation of large scale public attached to wildlife as an avocation, hunter or wildlife lover and conservationist. The CBOs shall brought forward for the protection and conservation of wildlife with special reference to the endangered species in their respective areas.

Following interventions would be initiated in this regard.

- i. Mass awareness campaign about the imperative of wildlife and its role in the eco-system through.
 - a. Seminars, workshops, development of publicity material and website
 - b. Collaboration with Universities, NGOs / INGOs to promote research on Biodiversity Conservation.
 - c. Provision of photographic equipments and other stores.

Cost Break-up of awareness campaign

Sr. No.	Item of work	Qty	Rate / Unit	Total
i.	Cost of Seminars, Workshop & Walks	10 Nos.	0.850	8.500
ii.	Development of Website	1	0.500	0.500
iii.	Photographic equipments / other store	L.S.	L.S.	3.560
iv.	Collaboration with Universities & international / national NGOS to promote research on Biodiversity Conservation	L.S.	L.S.	15.000
v.	Short consultancies for developing mass awareness material	L.S.	L.S.	10.000
Total:				37.560

xvi) Management of Captive Wildlife Stock

Presently the department is running 14-Wildlife Parks and 03-Zoos and One-Safari Zoo in the Punjab. The total captive stock of animals and birds maintained at aforementioned Wildlife Parks / Zoos / Safari Zoo are in thousands i.e. there are 1302 animals and 5604 birds. These animals / birds are facing severe problems of in-breeding due to similar parent flocks. Since decades no adequate fresh blood has been added to address the in-breeding issues.

Similarly, no tagging of animals / birds being kept in these Parks / Zoos has been made to maintain their proper pedigree and inventory profiles. Standardization of proper feed in accordance with nutritional requirement of animals / birds to ensure optimal breeding results is also of para-mount importance.

Therefore, the department has planned to address these issues to ensure defect free breeding and revival of wildlife resources. Initially wildlife stock of four Wildlife Park, three Zoos and one Safari Zoo would be taken in hands as pilot project.

Cost break-up

Sr. No.	Item of work	Qty	Rate / Unit	Total
i.	Tagging / Micro Chipping of animals / birds and provision of scanners & other equipments.	Wildlife Stock of: 10 – Wildlife Parks 3 – Zoos 1 – Safari Zoo	L.S.	21.000
ii.	Provision of new animals / birds for blood exchange	L.S.	L.S.	25.000
iii.	Standardization of proper feed & other charges.	L.S.	L.S.	2.000
Total:				48.000

A brief note on in-breeding is attached as **Annexure-P**.

xvii). Establishment of Project Management Unit (PMU) / Appointment of Project Director:

The successful implementation of the project will depend on the effective role of PMU through dedicated team of officers / officials, a designated Project Director and vigorous monitoring mechanism. About six posts of supporting staff and one vehicle has been provided as per Annexure-VI. The PMU team shall be responsible for management & smooth implementation of project handling internal account matters relating to the project, the transfers of funds / financial transactions from federal government as well as from the provincial government.

All posts except driver will be temporary and for the project period whereas the post of driver shall continue through SNE on annual bases till the declaration as permanent.

Role of Project Management Unit (PMU)

The Project Management Unit (PMU) shall ensure periodic and timely monitoring and evaluation for accomplishment of field activities at locations and help in preparation of progress reports for onward submission to provincial and federal agencies. Following progress reports shall be prepared by the PMU of the project and by the territorial incharges for submission to Ministry of Climate Change for review & onward submission to the PM office and M/o PD&R.

- i. Monthly Progress Reports
- ii. Half Yearly Monitoring Reports
- iii. Annual Evaluation Reports
- iv. Project Termination Report
- v. Post project completion impact assessment report

The Monitoring & Evaluation plan is attached at **Annexure-Q**.

15. Demand and supply analysis:

The department shall be responsible to supply on demand the data regarding the project through the PD of the project.

16. Present facilities available in the area to be served by the project:

Certain existing facilities such as technical Administrative and Executive Staff, Infrastructure and some logistics etc. are available with the department. The support of existing facilities will act as catalyst for success of the Green Pakistan Programme.

17. Certificate

Certified that the project has been prepared as per instructions issued by the Planning Commission for the preparation of PC-I Project

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APPENDIX – I

SUMMARY OF PROVINCIAL / REGIONAL PROJECT PROFILES

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)

Sr #	Name of Province / Region	Total Cost	Major Activities / Targets		
			Sr #	Wildlife Components / Particulars	Quantity / Units
1.	Punjab	5890.599	i.	G.I.S. Lab at Head Office	1 No.
			ii.	G.I.S. Nodes at Regional level	8 Nos.
			iii.	Rehabilitation / Improvement of Wildlife Check posts	02 Nos.
			iv.	Development of Wildlife Check posts i/c provision of allied facilities.	22 Nos.
			v.	Development of Ara-Basharat National Park	1 No.
			vi.	Management Planning and Preparation of Action Plan / Implementation Strategy for Kheri Murat	1 No.
			vii.	Development of Model Wildlife Breeding Farm	1 No.
			viii.	Development of Wildlife Reserve at Head Balloki	01 No.
			xi.	Improvement and Restoration of Nermal Lake	01 No.
			x.	Construction of Hatchery in Murree for supplementation & propagation of pheasants in respective ecological zones.	1No.
			xi.	Construction of Pre-release Pens for Pheasants in Murree hills.	4 Nos.
			xii.	Development of Pre-release pen over 500 acres for reintroduction of Blackbuck in Cholistan alongwith allied facilities i.e. habitat enrichment, water ponds etc.	1No.

			xiii.	Improvement / Rehabilitation of Saidpur Hatchery i/c provision of allied facilities.	1No.
			xiv.	Impart training to Private Wildlife Breeding Farmers	100 Nos.
			xv.	Capacity Building of Officers / Officials through short training courses / exposure visits	• 15-Officers training / Short courses in wildlife management • 20-Officers training / Short courses in project management. • 60-Staff training
			xvi.	Management of Captive Wildlife Stock through Micro-Chipping	• 10 Nos. Wildlife Parks • 3 Nos. Zoos • 1 No. Safari Zoo
			xvii.	Workshops on Wildlife Survey / Census / Wetlands management / Protected areas management	3-Workshops
			xviii.	Wildlife Sector Review & Formulation of Provincial Wildlife Conservation Strategy & Action Plan	1 No.
			xix.	Development of Protected Area Management Plans	3 Nos.
			xx.	Development of Wildlife Survey / Census Facility at District Level through provision of survey & I.T. equipments etc.	40 Districts
			xxi	Mass awareness programme	• 10-Seminars/workshop/ walks i/c development of website • Eco-awareness programme for students • Collaboration with Universities / NGOS / INGOS to promote Research on biodiversity conservation etc.
			xxii	Human Resources / Project Management Unit	1 No.

APPENDIX – II

YEAR-WISE FINANCIAL PHASING OF INFRASTRUCTURE DEVELOPMENT / REHABILITATION

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Rehabilitation / Wildlife Check posts 2 Nos.	-	0.450	-	-	-	-	-	0.450
2.	Development of Wildlife Check posts i/c provision of allied facilities. i. Salt Range 04 Nos. ii. D.G. Khan 04 Nos. iii. Murree 04 Nos. iv. Kahuta 01 No. v. Attock 03 Nos. vi. Cholistan 06 Nos. vii. Total: 22 Nos.	-	-	-	24.384	24.384	20.320	20.320	89.408
3.	Human Resource Charges of Protection Staff for Check posts: one Wildlife Inspector and three Wildlife Watchers for each check post.	-	-	-	3.780	16.254	24.992	35.040	80.066
4.	Conservancy & Works of Ara-Basharat National Park	-	-	-	50.000	500.000	600.000	817.952	1967.952
5.	Machinery, Tools, Stores & Equipment of Ara-Basharat National Park	-	-	-	14.830	94.570	71.480	165.807	346.687

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
6.	Establishment Charges of Ara-Basharat National Park	-	-	-	8.010	42.431	91.248	117.119	258.808
7.	Commodities & Services Charges of Ara-Basharat National Park	-	-	-	-	12.500	66.618	431.777	510.895
8.	Development of Model Wildlife Breeding Farm – Conservancy & Works, Machinery, Store & Equipment, Commodities & Services and Cost of Establishment.	-	-	-	32.172	362.538	228.833	345.829	969.372
9.	Construction of Hatchery in Murree for supplementation & propagation of pheasants in respective ecological zones.	-	-	-	9.000	15.000	17.000	10.896	51.896
10.	Construction of Pre-release Pens for Pheasants in Murree Hill, 4 Nos.	-	-	-	-	-	9.000	17.972	26.972
11.	Development of Pre-release pens over 500 acres for reintroduction of Blackbuck in Cholistan alongwith allied facilities i.e. habitat enrichment, water ponds etc.	-	-	-	-	14.000	14.000	23.737	51.737
12.	Improvement / Rehabilitation of Saidpur Hatchery i/c provision of allied facilities.	-	-	-	5.000	5.719	-	9.049	19.768
13.	Human Resource Charges for Model Wildlife Area in Cholistan	-	-	-	4.378	10.072	11.584	13.322	39.356

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
14.	Human Resource Charges for Hatcheries at Murree, Saidpur and Pre-release Pens in Murree Hills.	-	-	-	2.052	11.873	13.656	15.704	43.285
15.	Commodities & Services for Cholistan model Area.	-	-	-	3.500	6.700	8.000	17.000	35.200
16.	Machinery & Equipments for Cholistan model Area.	-	-	-	2.500	8.500	10.000	19.000	40.000
17.	Machinery & Equipments for Murree & Saidpur Hatcheries and Pre-release Pens in Murree Hills.	-	-	-	5.000	11.000	13.000	25.030	54.030
18.	Provision of logistic support to wildlife checkpoints i.e. 44 Nos. Motorcycles 125CC Honda Delux @ Rs.0.150/each, two motorcycle for each Checkpost.	-	-	-	1.800	1.800	1.500	1.500	6.600
19.	Commodities & Services for Murree & Saidpur Hatcheries and Pre-release Pens in Murree Hills.	-	-	-	18.000	28.400	31.000	47.590	124.990
20.	Conservancy & Works for improvement & restoration of Kheri Murat National Park.	-	-	-	32.325	37.000	37.559	71.283	178.167
21.	Machinery, Stores & Commodities for improvement & restoration of Kheri Murat National Park.	-	-	-	22.050	8.000	8.000	16.500	54.550
22.	Cost of Establishment for improvement & restoration of Kheri Murat National Park.	-	-	-	5.742	20.000	21.000	23.000	69.742

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
23.	Conservancy & Works for improvement & restoration of Namal Lake.	-	-	-	22.785	14.511	7.016	17.111	61.423
24.	Machinery, Stores & Equipments for improvement & restoration of Namal Lake.	-	-	-	5.564	5.865	4.886	0.800	17.115
25.	Cost of Establishment for improvement & restoration of Namal Lake.	-	-	-	-	6.322	12.105	13.915	32.342
26.	Commodities & Services for improvement & restoration of Namal Lake.	-	-	-	15.800	20.600	16.800	24.000	77.200
27.	Conservancy & Works for improvement & restoration of Head Balloki.	-	-	-	43.319	55.464	11.086	16.063	125.932
28.	Machinery, Stores & Equipments for improvement & restoration of Head Balloki.	-	-	-	7.000	4.350	-	-	11.350
29.	Cost of Establishment for improvement & restoration of Head Balloki.	-	-	-	-	5.280	12.142	13.963	31.385
30.	Commodities & Services for improvement & restoration of Head Balloki.	-	-	-	5.000	7.250	8.350	21.950	42.550
Total:		-	0.450	-	343.991	1350.383	1371.175	2353.229	5419.228

APPENDIX – III

YEAR-WISE FINANCIAL PHASING OF GIS LAB & REGIONAL NODES

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)

Sr #	Item of Work / Particulars	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Improvement / Rehabilitation of Central GIS Lab i/c cost of machinery / equipments and internal improvement works	-	8.667	1.080	33.130	0.800	1.400	10.941	56.018
2.	Human Resources Charges for Central Lab.	-	-	1.668	5.374	5.922	6.611	7.370	26.945
3.	Development of Regional Nodes of GIS Lab at 8 (eight) Regional Headquarters	-	2.163	22.680	12.077	6.520	6.520	20.236	70.196
4.	Human Resources Charges for Regional Nodes	-	-	3.200	10.330	11.434	12.706	14.162	51.832
Total:		-	10.830	28.628	60.911	24.676	27.237	52.709	204.991

APPENDIX – IV

YEAR-WISE PHASING OF CAPACITY BUILDING - TRAININGS, WORKSHOPS, SEMINARS, DEVELOPMENT OF PROTECTED AREAS MANAGEMENT PLANS ETC.

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)

Sr #	Item of Work / Particulars	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Training courses for officers & officials.	-	1.000	0.525	3.500	6.775	3.575	-	15.375
2.	Workshops (3 Nos.) for Capacity Building.	-	-	-	2.250	4.500	-	-	6.750
3.	Eco-awareness programme for students.	-	-	0.600	2.900	3.316	2.900	6.269	15.985
4.	Development of Wildlife Surveys / Census facilities at district level – provision of equipment etc.	-	0.593	3.146	6.754	9.500	10.500	11.717	42.210
5.	Sector Review & Formulation of Provincial Wildlife Conservation Strategy and Implementation Plan	-	-	-	5.250	-	-	-	5.250
6.	Development of Protected Areas management plans for three selected areas.	-	-	-	3.875	7.125	-	-	11.000
Total:		-	1.593	4.271	24.529	31.216	16.975	17.986	96.570

APPENDIX – V

YEAR-WISE PHASING OF INCENTIVIZED FACILITIES TO PRIVATE BREEDING FARMERS, MANAGEMENT OF CAPTIVE WILDLIFE STOCK AND MASS AWARENESS PROGRAMME ETC.

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)

Sr #	Item of Work / Particulars	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Incentivized facility / training to Private Wildlife Breeding Farms.	-	-	-	0.450	0.900	0.450	-	1.800
2.	Management of Captive Wildlife Stock i.e. Tagging / Micro Chipping and Provision of equipment & medicines.	-	1.775	5.380	10.303	12.042	5.000	13.500	48.000
3.	Mass Awareness Camping i/c Seminars / Workshops / Walks and Collaboration with Universities, NGOS, INGOS to promote research on Biodiversity conservation and short consultancies for developing mass awareness material.	-	0.860	0.511	3.450	9.239	7.000	16.500	37.560
Total:		-	2.635	5.891	14.203	22.181	12.450	30.000	87.360

APPENDIX – VI**YEAR-WISE PHASING OF PROJECT MANAGEMENT UNIT (PMU)****SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB****(Rs. in million)**

Sr #	Title of Post / Particulars	BPS	No.	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Project Director	19	1	-	-	0.780	1.716	1.888	2.077	2.285	8.746
2.	Accountant	17	1	-	-	0.400	0.920	1.058	1.217	1.399	4.994
3.	Personal Assistant cum Computer Operator	16	1	-	-	0.300	0.690	0.793	0.911	1.047	3.741
4.	AutoCAD Draftsman	14	1	-	-	-	0.414	0.476	0.547	0.629	2.066
5.	Civil Draftsman	14	1	-	-	-	0.414	0.476	0.547	0.629	2.066
6.	Driver	4	1	-	-	0.138	0.517	0.364	0.418	0.480	1.917
7.	Office Boy / Naib Qasid	1	1	-	-	0.108	0.248	0.285	0.327	0.376	1.344
8.	One Double Cabin Hilux Pick-up 4x4 (local assembled)		1	-	-	-	4.850	-	-	-	4.850
9	T.A		LS	-	-	-	0.150	0.200	0.250	0.650	1.250
10.	POL & Maintenance Charges		LS	-	0.100	0.350	1.200	1.320	1.450	3.350	7.770
11.	Repair & Maintenance of machinery & Equipments		LS	-	-	-	2.000	2.000	2.000	4.000	10.000
12.	Repair & Maintenance of Vehicle & Motorcycles		LS	-	-	-	2.000	2.000	2.000	4.000	10.000
13.	Contingent paid staff		LS	-	-	-	2.000	2.000	2.000	4.000	10.000

Sr #	Title of Post / Particulars	BPS	No.	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
14.	Motorcycle 125cc Honda Delux @ Rs. 0.150/each, 2 Nos.		LS	-	-	-	0.300	-	-	-	0.300
15.	Office Stationery		LS	-	0.050	0.150	0.150	0.200	0.300	0.750	1.600
16.	Publicity & Advertisement		LS	-	-	0.200	0.250	0.250	0.300	0.750	1.750
17.	Exposure visit charges		LS	-	-	-	-	2.000	2.000	3.756	7.756
18.	Others		LS	-	0.550	0.200	0.225	0.250	0.325	0.750	2.300
Total:				-	0.700	2.626	18.044	15.560	16.669	28.851	82.450

APPENDIX – VII

SUMMARY OF COST

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)

Sr #	Title	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Infrastructure Development / Rehabilitation.	-	0.450	-	343.991	1350.383	1371.175	2353.229	5419.228
2.	GIS Lab & Regional Nodes	-	10.830	28.628	60.911	24.676	27.237	52.709	204.991
3.	Training, Workshops, Seminars, Development of Protected Areas System Management Plans etc.	-	1.593	4.271	24.529	31.216	16.975	17.986	96.570
4.	Incentivized Facilities to Private Breeding Farmers, Management of Captive Wildlife Stock and Mass Awareness Programme etc.	-	2.635	5.891	14.203	22.181	12.450	30.000	87.360
5.	Project Management Unit (PMU).	-	0.700	2.626	18.044	15.560	16.669	28.851	82.450
Total:		-	16.208	41.416	461.678	1444.016	1444.506	2482.775	5890.599

COMPARATIVE STATEMENT

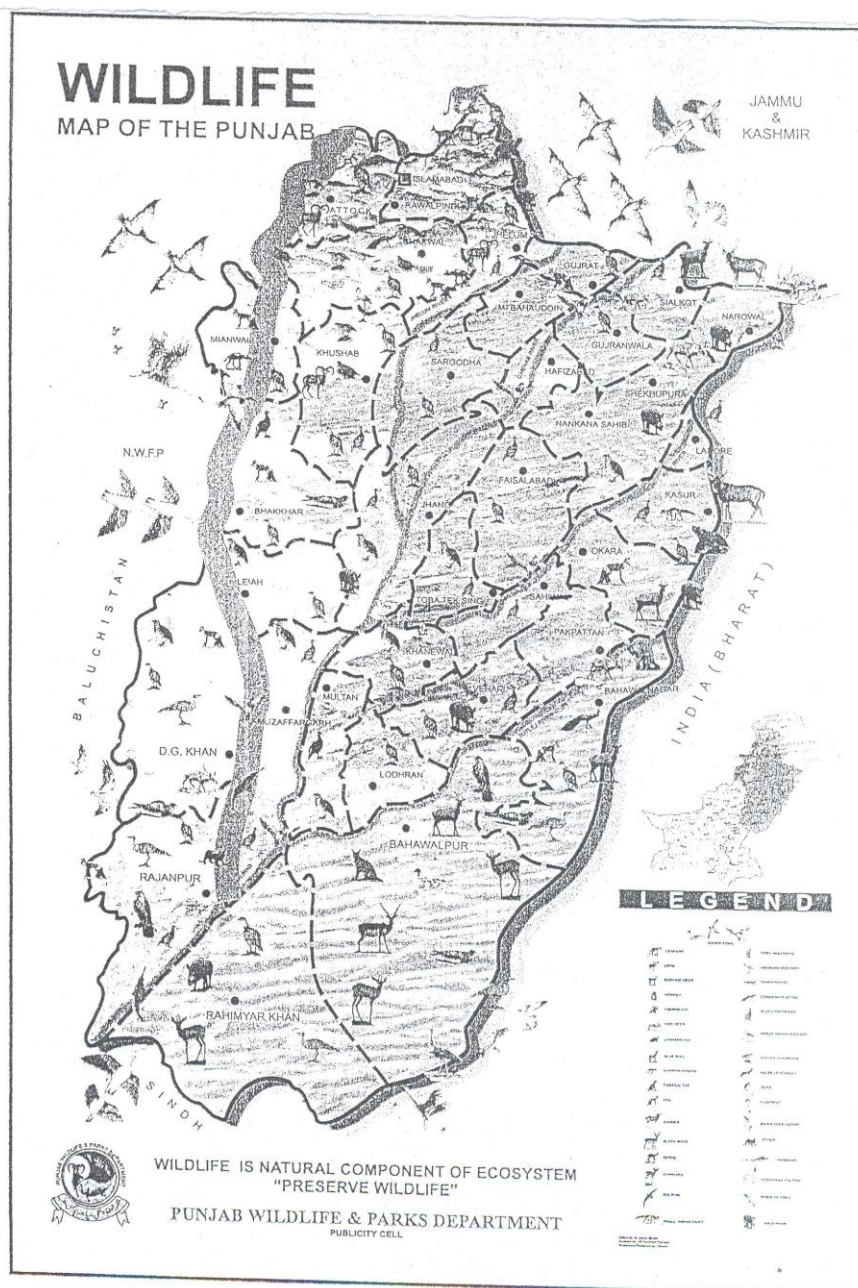
SUMMARY OF COST

(Rs. in million)

APPROVED PC-I SCHEME			REVISED PC-I SCHEME		
Sr. No.	Item of work	Cost	Item of work	Cost	Diff:
1.	Infrastructure Development / Rehabilitation.	0.450	Infrastructure Development / Rehabilitation.	5419.228	(+) 5418.778
2.	GIS Lab & Regional Nodes	73.597	GIS Lab & Regional Nodes	204.991	(+) 131.394
3.	Training, Workshops, Seminars, Development of Protected Areas System Management Plans etc.	44.100	Training, Workshops, Seminars, Development of Protected Areas System Management Plans etc.	96.570	(+) 52.470
4.	Incentivized Facilities to Private Breeding Farmers, Management of Captive Wildlife Stock and Mass Awareness Programme etc.	42.420	Incentivized Facilities to Private Breeding Farmers, Management of Captive Wildlife Stock and Mass Awareness Programme etc.	87.360	(+) 44.940
5.	Project Management Unit (PMU).	19.871	Project Management Unit (PMU).	82.450	(+) 62.579
	Total:	180.438	Total:	5890.599	(+) 5710.161

ANNEXURES

LOCATION MAP OF THE PUNJAB



Way Forward/ Common Strategy for Provinces/Federating Unit in existing PC-I scheme titled "Green Pakistan Programme- Revival of Wildlife Resources in Pakistan"

Activities	Unit
Conservation and Preservation of Wildlife	
Up gradation of one P.A.* (Biosphere Reserve, N.P/ Safari) with special focus on eco-tourism and one Zoo in each province/federating unit on international standards	
*(P.A.'s having intact resources and management plan will be included for up gradation)	
Dossier Development for at least one Biosphere Reserve in each province/ territories and submission to UNESCO/ISESCO	
Re-introduction of extinct species in wild on the basis of feasibility reports (blackbuck etc.)	
Promotion of Private Breeding Programmes through partnerships	
Revival of Critically Endangered Habitats – Biodiversity Action Plan-2005: (at least one habitat)	
Engagement of local university to identify need of actions in C.E. habitats	
Consultative meeting for implementation of outcomes of above.	
Afforestation and Reforestation activities (in accordance to needs of wild fauna of conservation concern) etc.	No. of plants
Curb Illegal wildlife Trafficking	
Check posts at vantage points (except Brick and Mortar activity)	Check posts/desks/ centers
Control Desk at National and/or International airports	
Rehabilitation/ Rescue Centers for Confiscated Wildlife specially focusing on translocation and confiscation protocols, (except Brick and Mortar activity)	
Community based Surveillance i.e. Seasonal raid parties (5 years)OR Incentive programme for providing information on illegal hunting/trafficking etc.	Employees
App for wildlife trade and cruelty reporting	
Migratory Birds Route Management	
Protection of staging areas for the cranes (at least one important area)	No. of Points/Sites and area in hectares
Improved management of at least one Ramsar site for waterfowls	
Awareness Raising of community	
Management of Protected Areas	
Printing of awareness material	
Training of community game watchers/guards	
Promotion of communities having success stories	
Zero plastic in Protected Areas	
Collection and Transportation of Solid waste from all protected areas	
Removal of solid waste from habitats in coordination with MCI, EPA and CAA for protection of avian species	Kg
Raising of feed lots for forage in P.A. to reduce forage competition	Acres
Rehabilitation of Wildlife in Urban	
Introduction of artificial nests for targeted species (at least one housing scheme)	No. of nest boxes and no housing sche

Printing of Brochures for Urban citizens focusing on urban wildlife species	
Promotion of Community Based Conservation Initiatives	
Wildlife Protection Task Force: Hiring of game watchers from community based organizations (CBO's) for their contribution towards wildlife protection and Management (5 years)* *Communities having maximum contribution towards conservation based upon third party census shall be entitled up to 50% of the grant towards payment of salary of watchers.	Employees
Establishment of community/private Game Reserves (GR) at potential sites for trophy hunting (3 in each province/Fed unit)	GR
Community mobilization and organization for Wildlife Protection	Communities
Community Development	
Community development through small scale project i.e. livelihood improvements	Projects
Community based livestock insurance & vaccination schemes	Schemes
Community based Solar power units (where needed)	Units
Management of Private GR's	
Development of kacha water ponds	No.
Sowing of seeds of indigenous species in barren and degraded lands of Game Reserves	Kg
Capacity Building of Federal/ Provincial wildlife Departments	
Review of provincial wildlife acts in conformity to NWP	
Development of legislation for bakarwals/ nomads around PA's	
Updation of "Prevention of Cruelty to Animals Act, 1980	
Development of National Red Data Book for Mammals and Birds of Pakistan	
Drone Technology for Wildlife Census at provincial level	
Development of National/provincial level Wildlife database	
Interprovincial Coordination for data collection, improved management and enforcement of rules and regulations	
a) Coordination of wildlife departments and researchers for identification of problems and seeking solutions	
b) Small scale research study development	
c) Coordination with local administration, HEC, Universities, ISESCO and UNESCO	
PMU for Project Execution	

SUBJECT: **GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB**

WILDLIFE PARKS

Sr. No.	Name of Wildlife Parks	Location / District	Area in Acres
1.	Bhagat Wildlife Park	T.T. Singh	15
2.	Bahawalnagar Wildlife Park	Bahawalnagar	40
3.	Kamalia Wildlife Park	T.T. Singh	15
4.	Loi Bher Wildlife Park	Rawalpindi	687
5.	Murree Wildlife Park Bansra Gali	Rawalpindi	240
6.	Rahim Yar Khan Wildlife Park	R.Y. Khan	15
7.	Sulemanki Wildlife Park	Okara	29
8.	Vehari Wildlife Park	Vehari	15
9.	Gatwala Wildlife Breeding Farm	Faisalabad	25
10.	Changa Manga Wildlife Park	Kasur	40
11.	Pirowal Wildlife Park	Khanewal	42
12.	Jallo Wildlife Park	Lahore	43
13.	Fatehpur Wildlife Park	Bhakkar	12
14.	Jhang Wildlife Park	Jhang	24

SUBJECT: **GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB**

ZOOS / SAFARI ZOO

Sr. No.	Name of Zoo / Safari Zoo	Location / District	Area in Acres
1.	Lahore Zoo	Lahore	25
2.	Bahawalpur Zoo	Bahawalpur	25
3.	D.G. Khan Zoo	D.G. Khan	12
4.	Kheri Murat National Park	Attock	

SUBJECT: **GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB**

WILDLIFE SANCTUARIES

Sr. No.	Name	District / Location	Area in Acres
1	Bahawalpur Plantation	Bahawalpur	1352
2	Bhagat Plantation	T.T. Singh	620
3	Bhakkar Plantation	Bhakkar	5249
4	Chak Katora Plantation	Bahawalpur	1323
5	Changa Manga Plantation	Kasur	12512
6	Chashma Barrage	Mianwali	81750
7	Chichawatni Plantation	Sahiwal	11530
8	Cholistan	Bahawalpur & B/Nagar	159492
9	Chumbi Surla	Chakwal	12180
10	Daman Forest Plantation	Rajanpur	5610
11	Daphar Forest Plantation	Mandi Baha-ud-Din	7126
12	Depalpur Plantation	Okara	7235
13	Fateh Major Plantation	Bhakkar	3100
14	Harnoli Plantation	Mianwali	2196
15	Head Qadirabad	Gujranwala	7040
16	Inayat Forest Plantation	Layyah	10405
17	Jalalpur Sharif	Jhelum	5591
18	Jauharabad Plantation	Khushab	985
19	Kamalia Plantation	T.T. Singh	10864
20	Khabbeki lake	Khushab	700
21	Khanewal Plantation	Khanewal	17822
22	Kotla Issan Forest Plantation	Rajanpur	5381
23	Kundian Plantation	Mianwali	19274
24	Lal Suhanra Plantation	Bahawalpur	12600
25	Machu Plantation	Layyah	10154
26	Miranpur Plantation	Lodhran	1899
27	Mitha Tiwana Plantation	Khushab	2758
28	Rajan Shah Plantation	Layyah	5214
29	Rakh Ghulaman	Bhakkar	10716
30	Rakh Kharewala	Layyah	14523
31	Rakh Kundal	Jhelum	7410
32	Shorkot Plantation	Jhang	10079
33	Sodhi	Khushab	14380
34	Taunsa Barrage	Muzaffargarh	7000
35	Walhar Plantation	Rahim Yar Khan	4632
36	Head Panjnad Pond Area	Muzaffargarh	
37	Jhallar	Khushab	42

SUBJECT: **GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB**

GAME RESERVES

Sr. No.	Name	District / Location	Area in Acres
1	Abbasia Forest Plantation	Rahim Yar Khan	24874
2	Bajwat	Sialkot	14319
3	Bhon Fazal	Gujranwala	2625
4	Border Belt	5 miles strip at Indo-Pak Border	
5	Cholistan	Bahawalpur, R.Y. Khan & Bahawalnagar	6625252
6	Chopalia	Bahawalnagar	24357
7	Daulana	Jhang	6000
8	Diljabba / Domeli	Jhelum, Chakwal	291840
9	Head Islam		6500
10	Kathar	Rawalpindi	2880
11	Kala Chitta	Attock	236338
12	Rakh Kheri Murat	Attock	13882
13	Kot Sabzal	Rajanpur	25000
14	Nabi Shah Lake	Sargodha	800
15	Nammal Lake	Mianwali	1200
16	Rahri Bunglow	Bahawalpur	13500
17	Rasool Barrage	Gujrat, Jhelum	2812
18	Thal	Muzaffargarh, Jhang, Layyah & Bhakkar	176124
19	Ucchali Lake	Khushab	2329
20	Khanpur Plantation	Muzaffargarh	32872
21	Tilla Jogian	Jhelum	24872
22	Shujabad Canal	Khanewal	3428
23	Kallar Kahar Lake	Chakwal	1387
24	Loi Bher	Rawalpindi	687

SUBJECT: **GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB**

NATIONAL PARKS

Sr. No.	Name	District	Area in Acres
1	Chinji Reserved Forest	Chakwal	15007
2	Lal Suhanra	Bahawalpur	162568
3	Kala Chitta	Attock	91342
4	Murree Kahuta & Kotli Sattian	Rawalpindi	299288

ANNUAL RECURRING COST AFTER COMPLETION

SUBJECT: GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

(Rs. in million)				
Sr #	Item of Work / Particular	2023-24	2024-25	2025-26
1.	Maintenance of Conservancy & Works	112.895	124.184	136.602
2.	Maintenance of Equipments Machinery & Stores	8.500	10.300	13.500
3.	Maintenance of Vehicles i/c POL Charges	25.000	30.000	35.000
4.	Pay & Allowances of Staff	342.367	393.722	452.780
5.	Others / Contingencies	12.000	15.000	20.000
Total:		500.762	573.206	657.882

RECRUITMENT ELIGIBILITY CRITERIA & TERMS OF REFERENCE OF PROJECT DIRECTOR

Duties and Responsibilities:

- i. The Project Director shall ensure proper management of project, periodic and timely monitoring & evaluation for accomplishment of field activities at various locations and preparation of progress reports for onward submission to provincial and federal agencies. Following progress reports shall be prepared by the PMU of the project and by the territorial in charges for submission to Ministry of Climate Change for review & onward submission to the Prime Minister's office and Ministry of Planning, Development and Reforms.
 - a) Monthly Progress Reports
 - b) Half Yearly Monitoring Reports
 - c) Annual Evaluation Reports
 - d) Project Termination Report
 - e) Post project completion impact assessment report
- ii. Lead the project implementation under the overall supervision of Director General, Wildlife & Parks Department & act as DDO for relevant components of the project.
- iii. Ensure implementation, monitoring of project interventions through proper coordination with a team of Regional Implementation Agencies.
- iv. Prepare, compile monthly ADP Progress Reports and participate in ADP Progress Review Meetings.
- v. Oversee the implementation of the project throughout Punjab to ensure smooth implementation of the project interventions.

Required Qualifications:

Master's degree in Wildlife Management, Economics, Project Management or Public Administration from a reputed, HEC recognized university.

Required Experience:

- i. At least 20-years of project management, planning, monitoring & evaluation and project administration experience in Public / Private sector and experience in some donor funded programme / project in the past would be preferred. Maximum Age limit is less than 60 years.
- ii. Demonstrated leadership ability to manage multiple stakeholders behind a common agenda.
- iii. Ability to deliver results.
- iv. Managed a team of programme implementations at various locations from diverse functions.
- v. Prior experience of working in / with government sector in environment related departments will be highly desirable.
- vi. Should be able to establish effective mechanism for coordination and monitoring and familiarity with modern m&e tools will be highly desirable.
- vii. Ability to analyse and solve complex problems and should possess good contract management skills.
- viii. Excellent analytical, communication and networking skills.

RECRUITMENT ELIGIBILITY CRITERIA & TERMS OF REFERENCE OF GEOGRAPHIC INFORMATION SYSTEM (GIS) ANALYST

Duties and Responsibilities:

1. GIS data development including digitization, post data processing and map making.
2. Create, maintain and QA/QC geospatial data sets using ArcGIS.
3. Tabulation of attribute information of developed geographic features into standard/conventional relational databases.
4. Maintaining record of spatial data (meta-data) and its proper archiving.
5. Conduct field surveys for data collection (biophysical and geographic) as and when required.
6. Conduct and compile research data using both primary and secondary data sources.
7. Perform any other tasks assigned on need basis.
8. Operate GPS equipment and can develop land cover / land use classification and other thematic maps.
9. Develop land cover / land use maps by using basic and advance classification tools such as pixel, sub pixel and object based classifiers.
10. Carry out field surveys for data collection, as and when required.
11. Development of cartographic maps using existing GIS and RS data for routine requests.
12. Conduct GIS/GPS trainings to different officers and officials of the Department, as and when required.
13. Performs related duties as assigned
14. Create, maintain, and QA/QC geospatial data sets using ArcGIS,
15. Deliver data sets, metadata, and cartographic productions to clients,
16. Develop GIS training courses for the Government Departments and NGOs/CBOs working in the field of Environment and Conservation;
17. Participates and assists field staff in carrying out field visits/surveys for data collection (biophysical and geographic) ground truthing, as and when required;

Required Qualifications: BS (4 Years) / M.Sc in Space Sciences / GIS / Remote Sensing / Geomatics

Required Experience: A minimum of one year of experience in GIS operations. Candidate having experience in GIS operations related to Wildlife will be given preference. Maximum age limit is 35 years.

Language Requirements: Excellent communication skills. Speak, read and write English. Competence in any additional computer programming language would be an added benefit.

Other Relevant Requirement/Information: Competence in the advanced use of software packages such as ERDAS IMAGINE, Definiens/Ecognition Developer, ArcView, ArcInfo and ArcGIS. Capable of working effectively within a team. Ability to conduct independent field work.

RECRUITMENT ELIGIBILITY CRITERIA & TERMS OF REFERENCE OF REMOTE SENSING ANALYST

Duties and Responsibilities:

1. Identify suitable RS data and complete related documentation for its acquisition.
2. Process satellite and aerial image data into high quality digital image products using the latest technology and equipment.
3. Radiometric and geometric correction of Satellite and Aerial Imagery
4. Performs Processes associated with Block Triangulations, Orthomosaic Production, Extraction Digital Elevation Model through satellite data, Orthorectification and Feature Extraction.
5. Operate GPS equipment and can develop landcover / landuse classification and other thematic maps.
6. Develop land cover / land use maps by using basic and advance classification tools such as pixel, sub pixel and object based classifiers.
7. Carry out field surveys for data collection, as and when required
8. Development of cartographic maps using existing GIS and RS data for routine requests.
9. Conduct RS trainings to different officers and officials of the Department, as and when required.
10. Performs related duties as assigned

Required Qualifications: BS (4 Years) / M.Sc in Space Sciences / GIS / Remote Sensing / Geomatics

Required Experience: A minimum of one year of experience in Remote Sensing operations. Candidate having experience in remote sensing operations related to Wildlife will be given preference. Maximum age limit is 35-years.

Language Requirements: Excellent communication skills. Speak, read and write English. Competence in any additional computer programming language would be an added benefit.

Other Relevant Requirement/Information: Competence in the advanced use of software packages such as ERDAS IMAGINE, Definiens/Ecognition Developer, ArcView, ArcInfo and ArcGIS. Capable of working effectively within a team. Ability to conduct independent field work.

RECRUITMENT ELIGIBILITY CRITERIA & TERMS OF REFERENCE OF WEB GIS DEVELOPER / NETWORK ADMINISTRATOR

Duties and Responsibilities:

1. Technical co-ordination and support of GIS activities of the GIS Laboratory and nodes of Punjab Wildlife and Parks Department (PWPD).
2. Planning and development of the Web GIS data management tools and processes.
3. Preparation of online maps (with GeoServer) for data review and analysis as well as reporting.
4. Preparation of spatial data queries (with PostGIS database) for maps, graphs or tables.
5. Production of printable maps (with ArcGIS or similar software) for reporting.
6. Collection, compilation, or integration of external cartographic data as required for analysis or reporting needs.
7. Support the preparation of presentations and reports related to GIS activities of the PWPD GIS Lab.
8. GIS data development including digitization, post data processing and map making.
9. Maintaining record of spatial data (meta-data) and its proper archiving.
10. Conduct field surveys for data collection (biophysical and geographic) as and when required.
11. Conduct and compile research data using both primary and secondary data sources.
12. Maintain and troubleshoot the networking issue of main GIS Lab and its nodes.
13. Perform any other tasks assigned on need basis.

Required Qualifications: BS (4 Years) / M.Sc in Computer Science / GIS or GIS related field

Required Experience: A minimum of one year of experience in Web GIS, and other GIS operations. Maximum age limit is 35-years.

Language Requirements: Excellent communication skills. Speak, read and write English. Competence in any additional computer programming language would be an added benefit.

Other Relevant Requirement/Information: Competence in the advanced use of software packages such as ArcView, ArcInfo and ArcGIS, GeoServer, PostGIS, Openlayers, ASP.NET, Oracle databases, SQL, and GIS database design. Should have sound knowledge of network administration and related operations.

RECRUITMENT ELIGIBILITY CRITERIA & TERMS OF REFERENCE OF DATA ENTRY OPERATOR

Qualification:

14-Year Education, BCS, B.Sc Computer Science/IT or equivalent qualification.
Maximum age limit is 30-years.

Requirements:

- Proficient user of MS office, especially MS Word, Excel and Access.
- Accurate keyboard skills with typing speed 35 words/min

Responsibilities:

- Prepare, compile and sort documents for data entry
- Create and manipulate databases
- Scan documents into documents management system or databases
- Maintain Logbook or records of activities and tasks
- Create reports of completed projects/tasks
- Assist technical staff of GIS Lab

RECRUITMENT ELIGIBILITY CRITERIA & TOR(S) OF PROJECT MANAGEMENT UNIT SUPPORTING STAFF

ACCOUNTANT

Duties & Responsibilities

- i. Prepare & maintain project bills and follow-up approval / sanctions with the relevant authority.
- ii. Maintain and manage all record pertaining to project budgets and finances.
- iii. Ensure budgetary and financial controls.
- iv. Collect and compile expenditure reports from the field formations and follow-up actions with the quarters concerned.
- v. Process billing and sanctions of bills with Accountant General office, State Bank and other relevant agencies.
- vi. Prepare and process tenders / quotation documents for project procurements etc.
- vii. Any other task assigned by the competent authority.

Qualification: 16-years Education in Commerce, Finance & Banking

Experience: 3-5 years experience in relevant areas

Age: Maximum 30-years

PERSONAL ASSISTANT CUM COMPUTER OPERATOR

Duties & Responsibilities

- i. Assist the Project Director to dispose-off project interventions / dak.
- ii. Maintain record of correspondences related to project activities.
- iii. Prepare, compile and sort documents of the project's activities.
- iv. Maintain log book or record of actions or tasks.

Qualification: 14-years Education BCS, BSC / I.T. or equivalent qualification

Experience: Proficient user of MS office, especially Word, Excel & Access and typing speed of 35 word / minute

Age: Maximum 30-years

DRIVER

Duties & Responsibilities

Maintain and upkeep vehicles as per government vehicle maintenance rules.

Qualification: Middle / Matric pass having LTV Driving License
More than 5-years driving experience of different vehicles
Army retired / Government / Cooperate will be preferred

Age: Maximum 35-years

OFFICE BOY / NAIB QASID

Duties & Responsibilities

Perform day to day office maintenance works.

Qualification: Matric pass from recognized institute

Experience: Relevant experience of 5-years in public or private office.

Age: Maximum age limit is 30-year.

BREAK-UP OF COST OF ARA- BASHARAT NATIONAL PARK**CONSERVANCY & WORKS****(Rs. in million)**

Sr #	Description	Qty	Rate	Unit	Total
1	Development of 50-0 ft wide Green Hedge around Park Periphery (Half area) in 2-0 ft deep trench	105065	1163.28	Rft.	122.220
2	Construction of Main Gate including external development.	2 Nos.	15149000	No.	30.298
3	Construction of Entry Block, Information Centre and parking area including external development.	12545	4530.00	Sft	56.829
4	Constriction of Check Posts i/c solar system, hand pump, furniture fixture etc. 40 Nos. 1000 sft/each complete in all respect including external development.	40000	3350.00	Sft	134.000
5	Construction of African Huts 10 Nos, 1145 Sft each including receptional block 1972 Sft. approach path, landscaping & external development.	13422	3580.09	Sft	48.052
6	Construction of Junction Complex i/c Tuck Shop, Restaurant, kiosk, outdoor sitting & Kids playing areas and landscaping complete in all respect, 10495 Sft.	10495	9950.00	Sft	104.425
7	Construction of Public Toilet 4 Set 900 Sft each i/c facility for special persons, sanitary installation, septic tank, manhole, sewer line and electrification complete in all respect.	3600	6400.00	Sft	23.040
8	Construction of emergency medical centre i/c external development.	2325	4597	Sft	10.688
9	Construction of Services management block complete i/c external development.	5515	4225.00	Sft	23.300
10	Securities and surveillance facilities i/c close monitoring system.	Job	-	-	48.330
11	Construction of raised platforms 100 Nos. 180 Sft. each furnished with Chakwal stone for visitors shelters.	100	108000	P.No	10.800
12	Construction of Office Complex 8000 Sft i/ c garages complete in all respect i/c external development	8000	4500	Sft	36.000
13	Construction of approach Black topped Road 20' wide complete in all respect	10	100,00,000	Km	100.000
14	Construction of internal Black topped Road 12' wide complete in all respect	5	5000000	Km	25.000
15	Construction of Kacha Jeepable Track 10 ft wide complete in all respect.	150	3,44,900	Km	51.735
16	Construction of water storage ponds 8 Nos 4000 gallon capacity.	32000	200.00	gallon	6.400
17	Construction of Vet Clinic 2704 Sft, including Incubation, Brooding Room, water supply and electrification complete in all respects.	2704	4500.00	Sft	12.168

Sr #	Description	Qty	Rate	Unit	Total
18	Construction of Wildlife Museum including air cooling system, fire alarm system, aluminum & glass partition and artificial habitat complete i/c external development.	5700	4880.00	Sft	27.816
19	Construction of children zoo over 25 acre area with Animal facility & infrastructure.	Job	-	-	350.000
20	Development of wet land i/c habitat development and water source system.	25	3600000	Acre	90.000
21	P/F vertical turbine KSB or equivalent one cusec discharge, coupled with 40 HP electric motor Siemens or equivalent, turbine chamber, boring, completed in all respect.	5	4000000	P.No	20.000
22	Constriction of overhead water reservoir, 10000 Gallon 40' height complete in all respect, 5 Nos.	50000	300	gallon	15.000
23	Construction of Electric supply line with HT, LT line transformers 200 KV, 10 Nos. completed in all respect	65600	1500	Rft	98.400
24	Development of land and landscaping.	50	1000000	Acre	50.000
25	Habitat enrichment / afforestation	100	391350	Acre	39.135
26	Constriction of Residence for (Bs-1-10) 15 Nos. 990 each complete in all respect.	14850	3500	Sft	51.975
27	Construction of Residence for (Bs-11-14) 8 Nos. 1360 each complete in all respect.	10800	3600	Sft	38.880
28	Construction of Residence for (Bs-17) 4 Nos. 1650 each complete in all respect.	6600	3600	Sft	23.760
29	Construction of Officers Bachelor Hostel i/c Kitchen, Dining Room etc. complete in all respect, 6600 Sft.	6600	3600	Sft	23.760
Sub-Total:					1672.011
30	Add 1 % 3rd party validation charges				16.720
31	Add 5 % PRA Tax				83.600
32	Add 1 % Tree Plantation				16.720
Sub-Total:					1789.051
Add 10% Price escalation					178.901
Grand Total:					1967.952

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

MACHINERY, STORES & EQUIPMENTS

(Rs. in million)		
Sr. No.	Items of Work	Total
1	Vehicles (Staff &Specialized Vehicles)	137.869
2	Purchase of Office I.T. equipment's Furniture & Fixture	46.625
3	Machinery, stores & equipment	75.000
4	Vet. Hospital / Animals Treatment Centre equipments	87.193
Total:		346.687

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

DETAIL OF VEHICLES

(Rs. in million)

Sr. No.	Items of Work	Qty	Rate / Unit	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Car 1300cc	1	3.400	-	-	-	3.400	-	-	-	3.400
2.	Double Cabin Pick- ups with Hood, local assembled 4*4	4	6.300	-	-	-	-	-	-	25.200	25.200
3.	Suzuki Cultus	1	1.700	-	-	-	1.700	-	-	-	1.700
4.	Single cabin with customize for security services 4*4	6	3.530	-	-	-	3.530	-	3.530	14.120	21.180
Sub-Total:				-	-	-	8.630	-	3.530	39.320	51.480
1.	Mini Truck 4x4	2	7.500	-	-	-	-	-	-	15.000	15.000
2.	Soft Wheel Trains with four Bogies	2	6.500	-	-	-	-	-	-	13.000	13.000
3.	Toyota Hilux Ambulance	1	7.500	-	-	-	-	-	-	7.500	7.500
4.	Staff Toyota Hiace	1	7.500	-	-	-	-	-	-	7.500	7.500
5.	Tractor 375 HP with accessories	4	2.200	-	-	-	4.400	4.400	-	-	8.800
6.	Water Bowzer Tank	1	7.500	-	-	-	-	-	7.500	-	7.500
7.	Two wheel Trolies for Tractors	4	0.650	-	-	-	1.300	1.300	-	-	2.600
8.	Fire Tender Truck	1	17.500	-	-	-	-	-	-	17.500	17.500
9.	Motorcycles 125 CC Honda Delux	42	0.166	-	-	-	0.500	0.500	0.500	5.489	6.989
Sub-Total:				-	-	-	6.200	6.200	8.000	65.989	86.389
Grand Total:				-	-	-	14.830	6.200	11.530	105.309	137.869

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

I.T. EQUIPMENTS AND FURNITURE & FIXTURE

(Rs. in million)

Sr #	Item	Qty	Rate	Total
1	Desktop Computer	20	0.500	10.000
2	Laptop	5	0.175	0.875
3	Fax Machine	10	0.060	0.600
4	Photocopier	3	0.500	1.500
5	Multimedia	2	0.175	0.350
6	UPS dry batteries 10 KVA	3	0.600	1.800
7	UPS dry batteries 5 KVA	5	0.300	1.500
8.	Furniture & Fixture	LS	LS	30.000
Total:				46.625

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

MACHINERY, STORES & EQUIPMENTS

(Rs. in million)

Sr. No.	Items of Work	Qty	Rate/ Unit	Total
5	Generator 5KVA Honda / Yamaha or equivalent	5	0.300	1.500
8	Animals Rescue Kit (Stretcher, Operation Kit / First Aid Box, Operation Table, Chemicals etc.) with necessary Medicines	LS	LS	1.000
9	Purchase of Mechanical Lawn Mover (engine mounted) 36 to 48 inch Blade	4	0.300	1.200
10	Manual Lawn Mower large size, good quality.	20	0.040	0.800
11	Purchase of Tilage	10 each	LS	0.500
12	Electric Water Cooler, 50 gallon, stainless steel body, Japanese/USA/UK compressor and imported thermostat.	50	0.080	4.000
13	Tranquilizing Gun with darts of different sizes and chemicals/injections	5	0.800	4.000
14	Fire Fighting Equipments	LS	LS	5.000
17	Children amusement facilities including children outdoor play sets, slides, marry go round, see saw, swings, monkey bar, tree climber, climbing ladder etc. made of steel/rubber/wood/recycled material etc.	Two Set each	LS	15.000
18	Benches with Backrest made of steel / rubber / wood / recycled material	100	0.050	5.000
19	Picnic Bench with Sheds	50	0.080	4.000
21	Dust Bins with stand & cover made of steel / rubber / wood / recycled material etc.	100	0.035	3.500
23	Desert Coolers of variable sizes	50	0.040	2.000
24	Metal Detectors of good quality	10	0.020	0.200
25	Walk-Through Gates of good quality	5	0.500	2.500
26	Sinology & Directional boards, Information boards	LS	LS	10.000
30	Provision, installation & commissioning of Reverse Osmosis water treatment plant of 800 Gallon capacity with plastic tank etc. complete in all respect.	2	2.000	4.000
31	Provision, installation & commissioning of day / night vision close circuit watch & ward system with 25-Cameras DVR, networking cable complete in all respect.	2-set each	2.000	4.000
32	Provision, installation & commissioning of Public address system i/c speakers, electrification supply line / cable complete in all respect.	Job	L.S	3.000
33	Purchase of Deep Freezer	10	0.100	1.000
34	Purchase of Refrigerator with freezing component for Lab.	20	0.090	1.800
35	Air Conditioner 1.5 ton (Lab. Incubation & treatment room)	10	0.100	1.000
Total				75.000

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

VET HOSPITAL EQUIPMENTS

(Rs. in million)

Sr #	Title	Qty	Total
1	Refrigerator 13-Cft	1	0.085
2	Deer Freezer	1	0.075
3	Room Cooler	10	0.360
4	Generator 5-KVA	1	0.300
5	Electric Heater	5	0.030
6	Covers, Beakers, Burets, Pipets	L.S.	0.006
Diagnostic Lab Equipments			
1	Auto Hematology Analyzer	1	3.710
2	Semi Auto Chemistry Analyzer	1	1.900
3	Hematology Kit	1	0.120
4	Centrifuge 8-tube	1	0.070
5	Ultra Sound Machine	1	0.690
6	X-Ray Machine with motorized floated table	1	3.900
7	Weighing Machine	3	0.090
8	Cardiac Monitor	2	2.800
9	Sterilizer (8x16)	1	0.006
10	Hot Air Oven (32 Ltr)	1	0.295
11	Pin Index Oxygen Cylinder attached with machine	1	0.020
12	Microscope	1	0.300
13	Auto Clave 10x20 electric case	1	0.030
14	CT Scan Toshiba Japan 16 slice	1	66.506
Surgical Lab Equipment			
1	Anesthesia Machine	1	3.710
2	Operation Table (Steel Base with hydraulic foot pump)	1	0.465
3	Pedestal light for surgery with four reflectors & stand	1	0.065
4	Surgical Kits complete	5	0.900
5	Orthopedic Surgical Kits complete	5	0.760
Total:			87.193

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

COST OF ESTABLISHMENT

(Rs. in million)		
Sr #	Title	Total
1.	Cost of Establishment	258.808
Total:		258.808

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

COST OF ESTABLISHMENT

Sr. No.	Name of Post	BPS	No. of Post	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total for Project Period
1	Director	19	1	-	-	-	-	0.780	1.794	2.063	4.637
2	Deputy Director (Admin & Accounts)	18	1	-	-	-	-	0.600	1.380	1.587	3.567
3	Deputy Director (Operations)	18	1	-	-	-	-	0.600	1.380	1.587	3.567
4	MBBS Doctor	17	1	-	-	-	-	0.400	0.920	1.058	2.378
5	Veterinary Officer	17	1	-	-	-	-	-	0.400	0.920	1.320
6	Pathologist	17	1	-	-	-	-	-	0.400	0.920	1.320
7	Assistant Director Wildlife	17	4	-	-	-	-	1.600	3.680	4.232	9.512
8	Budget & Accounts Officer	17	1	-	-	-	-	0.400	0.920	1.058	2.378
9	I.T. Manager	17	1	-	-	-	-	0.400	0.920	1.058	2.378
10	Horticulturist	17	1	-	-	-	0.400	0.920	1.058	1.217	3.595
11	Architect	17	1	-	-	-	0.400	0.920	1.058	1.217	3.595
12	S.D.O Civil	17	1	-	-	-	0.400	0.400	0.920	1.058	2.778
13	Wildlife Biologist	17	1	-	-	-	-	0.000	0.400	0.920	1.320
14	Security Officer	17	1	-	-	-	-	0.400	0.920	1.058	2.378
15	Administrative Officer	17	1	-	-	-	-	0.400	0.920	1.058	2.378
16	Education Officer	17	2	-	-	-	-	-	0.800	1.840	2.640
17	Marketing & Media Officer	17	1	-	-	-	-	0.400	0.920	1.058	2.378
18	Office Assistant / Accounts Assistant	16	4	-	-	-	0.600	1.890	2.760	3.174	8.424
19	PA / Senior Scale Stenographer	15	1	-	-	-	-	0.240	0.552	0.634	1.426
20	Head Draftsman	15	1	-	-	-	0.240	0.240	0.552	0.634	1.666
21	Civil Draftsman	14	2	-	-	-	0.360	0.360	0.828	0.952	2.500
22	Auto Cad Draftsman	14	2	-	-	-	0.360	0.360	0.828	0.952	2.500
23	Wildlife Supervisor	14	4	-	-	-	0.360	1.134	1.656	1.904	5.054
24	Photographer	14	1	-	-	-	-	0.180	0.414	0.476	1.070
25	Computer Operator	12	10	-	-	-	0.342	2.103	3.933	4.522	10.900
26	Dispenser (Male/Female)	11	4	-	-	-	-	0.648	1.492	1.716	3.856
27	Artist	11	1	-	-	-	0.162	0.373	0.429	0.493	1.457
28	Junior Clerk	11	10	-	-	-	-	1.620	3.730	4.290	9.640
29	Publicity / Marketing Assistant	11	2	-	-	-	-	0.324	0.746	0.858	1.928
30	Wildlife Inspector	9	30	-	-	-	-	1.500	3.450	3.967	8.917
31	Lab. / Vet. Assistant / Field Compounder	6	6	-	-	-	-	-	0.900	2.070	2.970
32	Painter	6	1	-	-	-	-	0.150	0.345	0.396	0.891
33	Electrician	6	2	-	-	-	-	0.300	0.690	0.792	1.782

Sr. No.	Name of Post	BPS	No. of Post	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total for Project Period
34	Wildlife Watcher	5	80	-	-	-	1.380	8.487	15.870	18.250	43.987
35	Security Guards / Watchers	5	40	-	-	-	-	-	5.520	12.696	18.216
36	Driver	4	21	-	-	-	0.414	2.898	6.665	7.664	17.641
37	Masson	4	4	-	-	-	-	-	0.552	1.269	1.821
38	Plumber / Fitter	4	2	-	-	-	-	-	0.276	0.634	0.910
39	Welder	4	2	-	-	-	-	-	0.276	0.634	0.910
40	Green Man / Baildar	1	60	-	-	-	2.160	8.964	14.904	17.139	43.167
41	Sweeper	1	10	-	-	-	-	-	1.080	2.484	3.564
42	Chowkidar	1	6	-	-	-	0.216	0.896	1.030	1.184	3.326
43	Naib Qasid	1	12	-	-	-	0.216	1.544	2.980	3.426	8.166
Total			339	-	-	-	8.010	42.431	91.248	117.119	258.808

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

COMMODITIES AND SERVICES

(Rs. in million)

Sr. No.	Items	Total
1	Cost of Animals / Birds	300.000
2	Operational charges	210.895
Total:		510.895

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

COMMODITIES AND SERVICES

(Rs. in million)

Sr. No.	Items	Total
1	Animals / Birds	300.000
2	Purchase of Visitors Shelters Canopy with Sitting Benches of recycled rubber wood material i/c fixing charges 100 Nos. @ Rs.0.580.	58.000
3.	Maintenance of Machinery, Vehicles etc.	6.000
4.	Rate & Taxes	2.000
5.	P.O.L. Charges	34.000
6.	WAPDA Charges	5.000
7.	Stationery	1.000
8.	Feed	30.000
9.	Chemical & Medicines	2.000
10.	Publicity & Advertisement	4.000
11.	Uniform	2.500
12.	Telephone & Trunk Calls	0.200
13.	Others	32.195
14.	Transport Charges	3.000
15.	Vehicle mounted monitoring cameras and provision of trackers (L.S.)	31.000
Total:		510.895

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	1967.952
2	Machinery, tools, Stores and Equipment	346.687
3	Establishment	258.808
4	Commodities & Services	510.895
Total		3084.342

ESTABLISHMENT OF ARA-BASHARAT NATIONAL PARK

LIST OF FURNITURE & FIXTURE

Sr. No.	Item	Qty
Furniture & Fixture for offices		
1	Officer Chair	25
2	Officer Table	25
3	Visitor Chair	130
4	Side Rack	25
5	File Cabinet	25
6	Official Chair	50
7	Official Table	50
8	Visitor Chair	200
9	Side Rack	50
10	Almirah	75
11	Staff Chair	200
12	Staff Table	100
13	Visitor Chair	100
14	Rack	100
15	Almirah	100
16	Bench for Naib Qasid	20
17	Steel Chest for Cash	4
18	Computer Table	25
19	Computer Chair	25
Furniture & Fixture for African Huts		
1	Double Bed Set with Side Racks i/c Mattress	10
2	Tarpai with two bed room chairs	20
3	Dressing with stole	20
4	Single bed with side rack i/c mattress	10
5	Dining tables with chairs	4
6	Sofa sets with large size central table	4
7	Wooden Almirah 3x1 ½ x 6	20

BREAK-UP OF COST OF KHERI MURAT NATIONAL PARK**CONSERVANCY & WORKS****(Rs. in million)**

Sr #	Description	Qty	Rate	Unit	Total
1	Construction of Main Gate including external development.	2	15149000.00	No.	30.298
2	Construction of Entry Block, Information Centre and parking area including external development.	12525	4537.00	Sft	56.826
3	Construction of Site Office 2850 Sft i/ complete in all respect i/c external development	2850	4500.00	Sft	12.825
4	Construction of check posts I/C external development	10	5.143	-	51.430
Sub-Total:					151.379
5	Add 1% 3 rd Party Validation Charges				1.513
6	Add 5% PRA Tax				7.567
7	Add 1% Tree Plantation				1.513
Sub-Total:					161.972
8	Add 10% Price Escalation				16.195
Grand Total:					178.167

BREAK-UP OF COST OF KHERI MURAT NATIONAL PARK

MACHINERY, STORES & EQUIPMENTS / COMMODITIES

(Rs. in million)

Sr. No.	Items of Work	Qty	Rate / Unit	Total
1.	Purchase of Double Cabin Pick-up with customized hood for security services 4x4	2	4.900	9.800
2.	Motorcycle, 125cc (Deluxe)	25	0.166	4.150
3.	P.O.L. Charges			14.600
4.	WAPDA Connection Charges			8.500
5.	Other / Misc.			5.000
6.	Boundary delineation, management plan and action strategy etc.			12.500
Total:				54.550

BREAK-UP OF COST OF KHERI MURAT NATIONAL PARK

COST OF ESTABLISHMENT

(Rs. in million)

Sr #	Name of Post	BPS	No. of Post	Total
1.	Assistant Director Wildlife	17	1	1.902
2.	Junior Clerk	11	1	1.166
3.	Wildlife Inspector	9	11	9.651
4.	Wildlife Watcher	5	45	34.120
5.	Driver	4	2	0.992
6.	Naib Qasid	4	2	1.312
7.	Chowkidar	1	2	1.199
8.	Baildar	1	20	15.520
9.	Sweeper	1	5	3.880
Total:			89	69.742

BREAK-UP OF COST OF KHERI MURAT NATIONAL PARK

SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	178.167
2	Machinery, Tools, Stores and Equipment / Commodities	54.550
3	Establishment	69.742
Total		302.459

**BREAK-UP OF COST OF DEVELOPMENT OF MODEL WILDLIFE
BREEDING FARM**

CONSERVANCY & WORKS

(Rs. in million)

Sr #	Description	Qty	Rate	Unit	Total
1	Construction of Boundary wall i/c brick work 13 ½ " thick above D P C with razor wire 2' circle 4' c/c complete in all respect	8400	3830.00	Rft.	32.172
2	Construction of Animal Enclosure, 10 Nos. 2000 Rft. i/c Toe wall of brick work 13 ½ " thick, 2' above from ground level, M.S. Channel, 3"x1 ½"x1/4" Post, 2.25' in toe wall and 7.25' above from toe wall, L-iron frame 1 ½"x1 ½"x1/4", partition of frame with tee iron 1 ½"x1 ½"x1/4", G.I. chain link 2"x2" mesh 8SWG struck pointing on toe wall both sides, painting, one shelter 15'x15' and water point 150 Sft, complete in all respect.	20000	3642.00	Rft	72.840
3	Construction of Birds Breeding section i/c Pheasantries, Hatcheries, Incubation Room, Brooding Room and Store room etc. complete in all respect.	20000	4026.00	Sft	80.520
4	Construction of Carnivores Breeding section / moat i/c Housings, caves, watering points, for Lion, Tiger, Leopard, Wolf etc. 8 Nos.800 Rft (one acre) / each, facilities moat type complete all respect.	6400	14000.00	Rft	89.600
5	Construction of Animal treatment facility / Vet Hospital complete in all respect.	3000	3800.00	Sft	11.400
6	Construction of Animal Sick enclosure, 5 Nos. 400 Rft. i/c Toe wall of brick work 13 ½ " thick, 2' above from ground level, M.S. Channel, 3"x1 ½"x1/4" Post, 2.25' in toe wall and 7.25' above from toe wall, L-iron frame 1 ½"x1 ½"x1/4", partition of frame with tee iron 1 ½"x1 ½"x1/4", G.I. chain link 2"x2" mesh 8SWG struck pointing on toe wall both sides, painting, one shelter 15'x15' and water point 150 Sft, complete in all respect.	2000	3642.00	Rft	7.284
7	Construction water supply system i/c Turbine one Cusec 2 Nos., OHR 10000 gallon 2 Nos. complete in all respect.	2	6500000.00	No.	13.000

Sr #	Description	Qty	Rate	Unit	Total
8	Construction of Electric supply line with HT, LT line 8200 Rft. steel pole 28 Nos. and transformers 100 KV, 2 Nos. completed in all respect.	8200	815.85	Rft	6.690
9	Construction of Office complex 2600 Sft i/c electrification, water supply and exterior finish with gutka complete in all respect.	2600	4550.00	Sft	11.830
10	Construction of Feed Preparation Chamber, store and Animal kitchen etc. 4000 Sft.	4000	3200.00	Sft	12.800
11	Constriction of Residence for (Bs,1-10) 4 Nos. 990 each complete in all respect.	3960	3600.00	Sft	14.256
12	Constriction of Supervisor Residence (B.S,11-14) 3 Nos. 1360 Sft / each complete in all respect.	4080	3600.00	Sft	14.688
13	Constriction of Residence (B.S,16-17) 2 Nos. 1650 Sft/ each complete in all respect.	3300	3600.00	Sft	11.880
14	Development of land i/c uprooting sarkanda growth, ploughing, leveling, dressing, making lawn, filling sweet earth i/c turfing, cost of turf and planting 1600 Nos. shrubs / plants of different species complete in all respect.	8	1124750	Acre	8.998
15	Construction of Kacha Jeepable Track 10 ft wide complete in all respect	5	250000.00	Km	1.250
16	Construction of approach Black topped Road 20' wide complete in all respect	5	8000000	Km	40.000
17	Construction of Main Gate including external development.	1	10349000	No	10.349
18	Security, Surveillance i/c close monitoring system	Job	-	-	8.000
19	Construction, Provision and Installation of Animal sculptures, Wildlife Model corners at main entry Gate complete i/c artistic painting according to the approved design of Department.	Job	-	-	1.043
Sub-Total					448.600
20	Add 1 % 3rd party validation charges.				4.486
21	Add 5 % PRA Tax.				22.430
22	Add 1 % Tree Plantation.				4.486
Total					480.002

BREAK-UP OF COST OF DEVELOPMENT OF MODEL WILDLIFE BREEDING FARM

MACHINERY, STORE & EQUIPMENTS

Sr. No.	Items of Work	Qty	Rate/ Unit	Total
1	Single cabin 4x4 Pickup	1	3.530	3.530
2	Tractor 375 HP with accessories	1	2.200	2.200
3	Generator 5 KVA	3	0.300	0.900
4	Motorcycles 125 CC Honda Delux	4	0.166	0.664
5	Desktop Computers, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multifformat DVD Writer or higher specs, with standard keyboard, mouse, LED 24" to 30", Printer A4, Scanner A4 and UPS 2 KVA with dry batteries.	4	0.500	2.000
6	Incubators	4	0.160	0.640
7	Tranquilizer Gun	2	0.980	1.960
8	Electric Water Cooler	5	0.075	0.375
9	Refrigerator 13-Cft	1	0.085	0.085
10	Deep Freezer	1	0.075	0.075
11	Room Cooler	10	0.036	0.360
12	Generator 5 KVA	1	0.325	0.325
13	Electric Heater	5	0.006	0.030
14	Covers, beakers, Burets, Pipets	1	0.006	0.006
15	Auto Haematology Analyser	1	1.714	1.714
16	Semi Auto Chemistry Analyser	1	0.900	0.900
17	haematology Kit	1	0.120	0.120
18	Centrifuge 8-tube	1	0.070	0.070
19	Ultra Machine	1	0.685	0.685
20	X-Ray Machine with Motorized Floated table	1	1.915	1.915
21	Weighting Machine	3	0.030	0.090
22	Cardiac Monitor	1	0.400	0.400
23	Steriliser	1	0.055	0.055
24	Hot Air Oven(3-Lit)	1	0.300	0.300
25	Pin Index Oxygen cylinder attached with machine 48-Cft	1	0.020	0.020
26	Micro Scope	1	0.300	0.300
27	Auto Clave 10x20 electric case	1	0.030	0.030
28	CT Scan 16 Slice	1	55.936	55.936
29	Anaesthesia Machine	1	1.210	1.210
30	Operation table (steel base with hydraulic foot pump)	1	0.465	0.465
31	Pedestal light for surgery with four reflector and stand	1	0.065	0.065
32	Surgical kit complete	5	0.040	0.200
33	Orthopaedic Surgical Kits Complete	5	0.052	0.260
Total				77.885

**BREAK-UP OF COST OF DEVELOPMENT OF MODEL WILDLIFE
BREEDING FARM**

COST OF ESTABLISHMENT

(Rs. in million)

Sr. No.	Name of Post	BPS	No. of Post	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1	Assistant Director Wildlife	17	1	-	-	-	-	0.400	0.920	1.058	2.378
2	Veterinary Officer	17	1	-	-	-	-	0.400	0.920	1.058	2.378
3	Pathologist	17	1	-	-	-	-	0.400	0.920	1.058	2.378
4	Office Assistant	16	1	-	-	-	-	0.300	0.690	0.793	1.783
5	Wildlife Supervisor	14	4	-	-	-	-	0.720	1.656	1.904	4.280
6	Computer Operator	12	2	-	-	-	-	1.710	3.933	4.522	10.165
7	Junior Clerk	11	2	-	-	-	-	0.324	0.746	0.858	1.928
8	Wildlife inspector	9	2	-	-	-	-	0.300	0.690	0.793	1.783
9	Lab. Assistant	7	2	-	-	-	-	0.280	0.644	0.740	1.664
10	Lab. Technician / Vet. Assistant	6	4	-	-	-	-	0.540	1.242	1.428	3.210
11	Field Compounder	6	4	-	-	-	-	0.540	1.242	1.428	3.210
12	Wildlife Watcher	5	5	-	-	-	-	0.690	1.587	1.825	4.102
13	Watcher	5	5	-	-	-	-	0.690	1.587	1.825	4.102
14	Driver	4	2	-	-	-	-	0.276	0.634	0.730	1.640
15	Animal Keeper	1	18	-	-	-	-	1.944	4.470	5.139	11.553
16	Baildar	1	10	-	-	-	-	1.080	2.483	3.269	6.832
17	Sweeper	1	10	-	-	-	-	1.080	2.483	3.269	6.832
18	Chowkidar	1	4	-	-	-	-	0.432	0.993	1.142	2.567
19	Naib Qasid	1	4	-	-	-	-	0.432	0.993	1.142	2.567
Total			82	-	-	-	-	12.538	28.833	33.981	75.352

**BREAK-UP OF COST OF DEVELOPMENT OF MODEL WILDLIFE
BREEDING FARM**

COMMODITIES & SERVICE

(Rs. in million)		
Sr. No.	Items	Total
1	Cost of Animals / Birds	266.433
2	Feed	45.000
3	Chemical & Medicines	5.000
4	P.O.L. Charges	7.400
5	Maintenance of machinery & equipments	2.300
6	Maintenance of vehicles etc.	3.000
7	WAPDA charges	1.800
8	Rate & Taxes	0.500
9	Transportation cages	1.600
10	Transportation charges	0.500
11	Stationery	0.750
12	Sinology / Directional Boards	0.850
13	Others	1.000
Total:		336.133

DEVELOPMENT OF MODEL WILDLIFE BREEDING FARM

SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	480.002
2	Machinery, tools, Stores and Equipment	77.885
3	Establishment	75.352
4	Commodities & Services	336.133
Total		969.372

BREAK-UP OF COST OF HATCHERY IN MURREE

ABSTRACT OF COST FOR HATCHARY 3416 SFT AT BANSRA GALI MURREE DISTRICT RAWALPINDI		
#	Description	Amount
1	Hatchery 3416 Sft	12,892,176
2	Boundary Fencing 3600 Rft	12,956,400
3	Total	25,848,576
4	PST 5%	1,292,429
5	Total	27,141,005
6	Cost in million	27.141
7	Cost per Sft	7945.26

**ROUGH COST ESTIMATE FOR HATCHARY 3416 SFT AT BANSRA
GALI MURREE DISTRICT RAWALPINDI**

#	Description	Plinth Area	B.P	P. H	S. I	E. I	Unit Rates	Amount
1	Construction of Hatchery	3416	170 3	75		90	1868	6381088
2	Bracket Fans	18					4500	81000
3	Electric wall mounted heaters	18					3000	54000
4	Extra for Retaining Wall 150 Rft	150					6300	945000
5	Extra for Breast Wall 80 Rft	80					3000	240000
6	Extra for Drain 100 Rft	100					3100	310000
7	Difference between deeper foundation v/s normal foundation	3416					180	614880
8	Difference between CGI Sheet roofing v/s RCC Slab	3416					550	1878800
9	Difference between DPC v/s Plinth beam	3416					138	471408
10	Concrete paver path 5.0' wide 2000 Sft	2000					208	416000
11	Extra for external WAPDA connection i/c HT/LT supply line							1500000
	Total							12892176

**ABSTRACT OF COST FOR PHEASANTRY 1250 SFT/ EACH, 4 NOS.
IN MURREE DISTRICT RAWALPINDI**

#	Description	Amount
1	Pheasantry 1250 Sft	5,894,000
2	Total	5,894,000
3	PST 5%	294,700
4	Total	6,188,700
5	Cost of 4 Nos.	24,754,800
6	Cost in million	24.755
7	Cost per Sft	4950.96

**ROUGH COST ESTIMATE FOR PHEASANTRY 1250 SFT IN MURREE
DISTRICT RAWALPINDI**

#	Description	Plinth Area	B.P	P. H	S. I	E. I	Unit Rates	Amount
1	Construction of Pheasantry	1250	170 3	75		90	1868	233500 0
2	Bracket Fans	10					4500	45000
3	Electric wall mounted heaters	10					3000	30000
4	Extra for Retaining Wall 120 Rft	70					6300	441000
5	Extra for Breast Wall Wall 80 Rft	70					3000	210000
6	Extra for Drain 100 Rft	80					3100	248000
7	Difference between deeper foundation v/s normal foundation	1250					180	225000
8	Difference between CGI Sheet roofing v/s RCC Slab	1250					550	687500
9	Difference between DPC v/s Plinth beam	1250					138	172500
10	Extra for external WAPDA connection i/c HT/LT supply line							150000 0
	Total							589400 0

COST OF HUMAN RESOURCES FOR MURREE HATCHERY

Sr. No.	Name of Post	BPS	No. of Post	2018-19	2019-20 (6-months)	2020-21	2021-22	2022-23	Total
1.	Veterinary Officer	17	1	-	-	0.800	0.920	1.058	2.778
2.	Hatchery Supervisor	14	1	-	-	0.360	0.414	0.476	1.250
3.	Hatchery Man	06	2	-	-	0.600	0.690	0.794	2.084
4.	Junior Clerk	01	1	-	-	0.324	0.373	0.428	1.125
5.	Chowkidar	01	2	-	0.216	0.497	0.572	0.657	1.942
6.	Animal Keeper	01	5	-	-	1.080	1.242	1.428	3.750
7.	Field Compounder	06	1	-	-	0.300	0.345	0.397	1.042
8.	Baildar	01	2	-	0.216	0.497	0.572	0.657	1.942
9.	Sweeper	01	2	-	0.216	0.497	0.572	0.657	1.942
10	Naib Qasid	01	1	-	-	0.216	0.248	0.286	0.750
Total:			18	-	0.648	5.171	5.948	6.838	18.605

MACHINERY, STORES & EQUIPMENTS – MURREE HATCHERY

(Rs. in million)			
Sr. No.	Items of Work	Qty	Cost
1	Double Cabin Pick-up 4x4	1	4.900
2	Incubator 300 eggs capacity	4	1.200
3	Incubator 200 eggs capacity	2	0.400
4	Motorcycle 125cc	2	0.300
5	Heating System	L.S.	4.500
6	UPS, 5 KVA	1	0.300
7	Generator, 5 KVA	1	0.600
8	Manual Lawn Mower	2	0.080
9	Brooders	20	0.300
10	Feeder & Drinkers	50 set	0.250
11	Benches	5	0.175
12	Dust Bin	5	0.050
13	Directional Boards		0.500
14	Close monitoring system day / night		6.000
15	Refrigerator full size	2	0.250
16	Deep Freezer	2	0.250
17	Computer corei7 with LCD, Printer, Scanner etc.	1	0.600
18	Water storage tank 500 gallon capacity	2	0.400
19	Electric Mechanical Cleaner	2	1.000
Total:			22.055

COMMODITIES AND SERVICES – MURREE HATCHERY

(Rs. in million)

Sr. No.	Items	Cost
1	Cost of Animals / Birds	47.000
2	Feed	7.000
3	Chemical & Medicines	2.300
4	P.O.L. Charges	5.400
5	WAPDA Charges	4.000
6	Publicity & Advertisement	0.500
7	Stationery	0.800
8	Rates & Taxes	0.800
9	Heating System	1.545
10	Transportation Cages	1.600
11	Maintenance charges for machinery & equipments	1.500
12	Transportation charges	0.500
13	Maintenance charges for vehicles / motorcycle	3.000
14	Others	1.000
Total:		76.945

CONSTRUCTION OF HATCHERY IN MURREE

SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	51.896
2	Machinery, tools, Stores and Equipment	22.055
3	Establishment	18.605
4	Commodities & Services	76.945
Total		169.501

**COST BREAK OF PRE-RELEASE PENS FOR PHEASANTS IN
MURREE HILLS**

**ABSTRACT OF COST FOR PRE-RELEASE PEN 6 NOS.
IN MURREE AREAS, DISTRICT RAWALPINDI**

Sr. No	Description	Amount
1	Construction of Pre-Release Pen using L-iron 2"x2"x1/4" rings around trees, China steel wire ropes 3/8" & 1/4" dia for roof & walls netting, G.I wire Chainlink 2"x2" mesh 10 SWG fixing with clumps 3/8" & 1/4" complete in respect.	4160600
2	Total	4160600
3	Add 5% P.S.T	208030
4	Add 3% Contingency charges	124818
5	Total	4493448
6	Say	4495333
7	Cost of 6 Nos.	26971998
8	Cost in million	26.972

PRE-RELEASE PEN

S.No	Description	No	Length	Breadth	Depth	Contents	Amount
1	Fabrication of heavy steel works, with angle, tees, flat iron, round iron and sheet iron for making trusses, girders, tanks, etc. including cutting, drilling, riveting, handling, assembling and fixing, but excluding erection in position. Erection and fitting in position iron trusses, staging of water tanks, etc.						
	Tree Rings L - iron 2"x2"x1/4"	300	x 7.5	x 3.19	2.205	= 3255.10	Kg
	For Pre-release Pen Door 10'x8'	3	x 156	x 3.19	2.205	677.06	Kg
	For fixing in base and footig in cement concrete 8' c/c 1'-6" deep	1	x 712.5	x 3.19	2.205	1030.78	Kg
	M.S flat 1.5"x1/4"	1	x 600	x 1.8	2.205	489.80	Kg
					Total:	= 5452.74	Kg
					@ 15068.35	%Kgs	821638
2	Providing and fixing of china steel wire rope (G.I) 3/8" and 1/4" dia for fixing of pole and crosses fixing of chain link i/d binding clips.						
	3/8"	7000				= 7000.00	Rft
					Total:	= 7000.00	Rft
					@ 63.60	P-Rft	445200
	1/4"	2000				= 2000.00	Rft
					Total:	= 2000.00	Rft
					@ 28.41	P-Rft	56820
3	Clumps for 3/8" and 1/4" dia wire rope	2000				= 2000.00	Nos
					Total:	= 2000.00	Nos
					@ 42.81	Each	85620

- 4 Providing and fixing of chain-link 2"x2" mash 10 SWG (G.I) including fixing on Steel Rope with clamps, complete in all respects.

$$1 \times 600 \times 8 = 4800.00 \text{ Sft}$$

$$1 \times 200 \times 100 = 20000.00 \text{ Sft}$$

Add for height / sagging 40% of 20000 Sft

$$\text{Total:} = \frac{8000.00}{32800.00} \text{ Sft}$$

@ **80.00** P-Sft 2624000

- 5 P/F of wooden shelter for birds inside Pre-Release Pen 4'x5'x4 ' height pen top of deodar wood 1/2 " thick.

Post (4 Nos) $16 \times 0.20 \times 0.20 \times 4.00 = 2.56 \text{ Cft}$

Planks $8 \times 5.00 \times 0.06 \times 4.00 = 9.60 \text{ Cft}$

$$4 \times 4.00 \times 0.06 \times 4.00 = 3.84 \text{ Cft}$$

Roof $4 \times 5.50 \times 0.06 \times 6.00 = 7.92 \text{ Cft}$

Total: = 23.92 Cft
@ **4263.85** P.Cft 101991

- 6 Cement concrete plain including placing, compacting, finishing and curing complete (including screening and washing of stone aggregate): Ratio 1: 2: 4

$$75 \times 1 \times 1 \times 1.50 = 112.50 \text{ Cft}$$

@ **22550.60** %Cft 25369

Total: 4160639
Or 4160600

COST OF HUMAN RESOURCES FOR PRE-RELEASE PENS MURREE HILLS

Sr. No.	Name of Post	BPS	No. of Post	2018-19	2019-20 (6-months)	2020-21	2021-22	2022-23	Total
1.	Chowkidar	01	5	-	0.540	1.242	1.428	1.643	4.853
2.	Animal Keeper	01	10	-	-	2.160	2.484	2.857	7.501
3.	Baildar	01	5	-	0.540	1.242	1.428	1.643	4.853
Total:			20	-	1.080	4.644	5.340	6.143	17.207

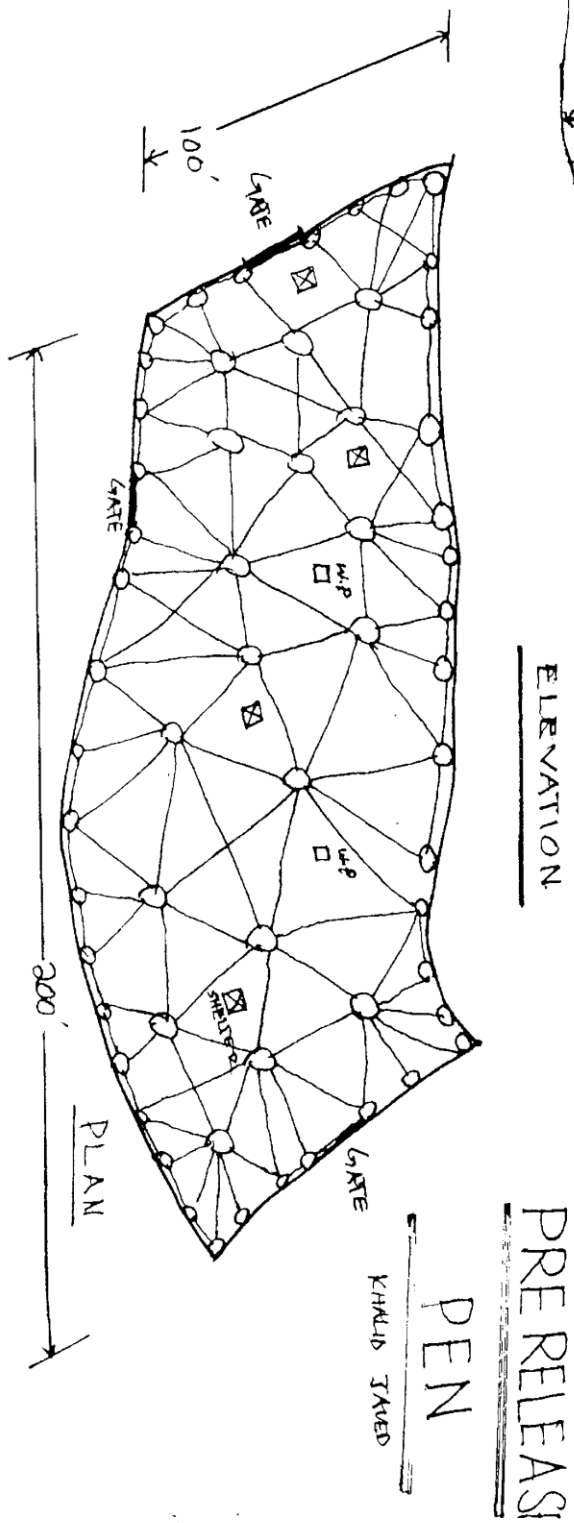
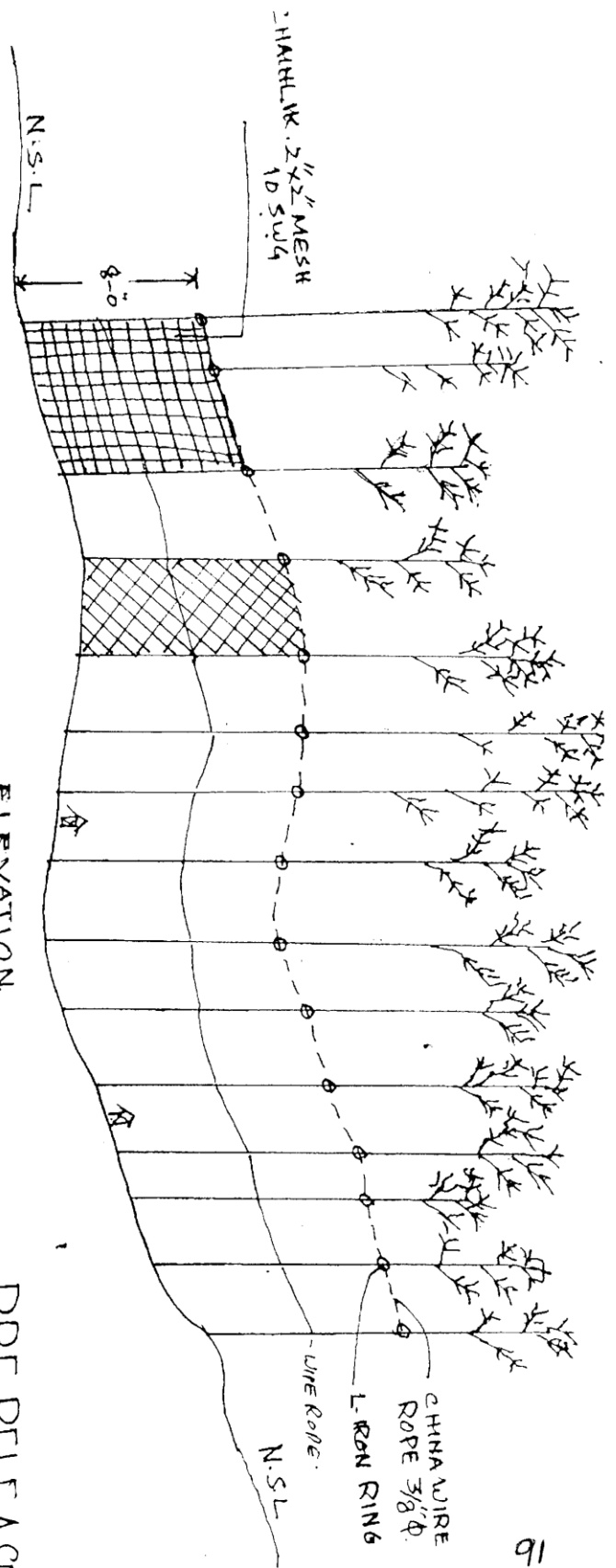
MACHINERY, STORES & EQUIPMENTS – PRE-RELEASE PENS
MURREE

(Rs. in million)

Sr. No.	Items of Work	Qty	Cost
1	Double Cabin Pick-up 4x4	1	4.900
2	Motorcycle 125cc	2	0.332
3	Generator 5KVA	1	0.600
4	Feeder & Drinkers	100	0.500
5	Tillage	LS	0.200
6	Rubber Pipe	LS	0.150
7	Canvas Pipe	LS	0.200
8	Tuff Tank Water Storage 500 gallon each	2	0.400
9	Rate & Taxes	LS	0.500
10	WAPDA Charges	LS	1.800
11	Hot & Cold Weather Charges	LS	0.968
12	UPS 5 KVA	1	0.300
Total:			10.850

COMMODITIES AND SERVICES – PRE-RELEASE PEN MURREE

(Rs. in million)		
Sr. No.	Items	Cost
1	Cost of Animals / Birds	5.000
2	Feed	2.500
3	Chemical & Medicines	1.000
4	P.O.L. Charges	8.000
5	WAPDA charges	1.500
6	Publicity & Advertisement	0.400
7	Rate & Taxes	0.800
8	Maintenance of Machinery	0.500
9	Maintenance of vehicles	1.500
Total:		21.200



**CONSTRUCTION OF PRE-RELEASE PENS FOR PHEASANTS IN
MURREE**

SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	26.972
2	Machinery, tools, Stores and Equipment	10.850
3	Establishment	17.207
4	Commodities & Services	21.200
Total		76.229

COST BREAK OF SAIDPUR HATCHERY

ESTIMATED COST FOR IMPROVEMENT / REHABILITATION OF SAID PUR HATCHERY		
#	Description	Cost
1	Improvement / Rehabilitation of Pheasantry 1250 Sft i/c replacement of damaged chainlink, treatment of floor, repair of plaster, provision of 500 gallon water tuff tank, replacement of E.I, PHP, internal and external distempering and weather shield painting etc. 1250 Sft @ 1200/ Sft	1.500
2	Improvement / Rehabilitation of small Bird Cages 4 Nos., 600 Sft i/c replacement of damaged chainlink, treatment of floor, repair of plaster, provision of 500 gallon water tuff tank, replacement of E.I, PHP, internal and external distempering and weather shield painting etc. 600 Sft @ 1200/ Sft	0.720
3	Improvement / Rehabilitation of Brooding Room 320 Sft i/c replacement of damaged windows, treatment of floor, repair of plaster, replacement of E.I, PHP, internal and external distempering and weather shield painting etc. 320 Sft @ 1200/ Sft	0.384
4	Improvement / Rehabilitation of Hatching Room, 180 Sft i/c replacement of damaged windows, treatment of floor, repair of plaster, replacement of E.I, PHP, internal and external distempering and weather shield painting etc. 180 Sft @ 1200/ Sft.	0.216
5	Improvement / Rehabilitation of store room 204 Sft, treatment of floor, repair of plaster, replacement of E.I, PHP, internal and external distempering and weather shield painting etc. 204 Sft @ 1200/ Sft	0.245

6	Improvement / Rehabilitation of medicine room 100 Sft treatment of floor, repair of plaster, replacement of E.I, PHP, internal and external distempering and weather shield painting etc. 100 Sft @ 1200 Sft	0.120
7	Construction of Boundary wall 9" thick and 8.0' high above DPC complete in all respect. 700 Rft @ 2500/ Rft	1.750
8	Construction of Office cum Inspection Hut 1000 Sft complete in all respect. 1000 Sft @ 5500/ Sft	5.500
9	Construction of Gate & Gate pillar 12.0' wide and 8.0' height i/c Podium 3000 sft @ 600/Sft	1.800
10	Concrete paver path 10' & 5' wide complete in all respect with toe wall, 7000 Sft @350 Sft	2.450
11	Provision of 25KVA Transformer with supply line, complete in all respect.	0.600
	Sub Total	15.285
	10% External development charges	1.528
	Sub Total	16.813
	Price variation 11.98%	2.014
	Total	18.827
	Add 5% PST	0.941
	G.Total	19.768

COST OF HUMAN RESOURCES OF SAIDPUR HATCHERY

Sr. No.	Name of Post	BPS	No. of Post	2018-19	2019-20 (6-months)	2020-21	2021-22	2022-23	Total
1.	Hatchery Supervisor	14	1	-	-	0.360	0.414	0.476	1.250
2.	Animal Keeper	01	2	-	-	0.432	0.497	0.571	1.500
3.	Field Computer	06	1	-	-	0.300	0.345	0.397	1.042
4.	Baildar	01	1	-	0.108	0.250	0.288	0.331	0.977
5.	Chowkidar	01	1	-	0.108	0.250	0.288	0.331	0.977
6.	Naib Qasid	01	1	-	-	0.216	0.248	0.286	0.750
7.	Sweeper	01	1	-	0.108	0.250	0.288	0.331	0.977
Total:			8	-	0.324	2.058	2.368	2.723	7.473

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MACHINERY, STORES & EQUIPMENTS OF SAIDPUR HATCHERY

(Rs. in million)

Sr. No.	Items of Work	Qty	Cost
1	Double Cabin Pick-up 4x4	1	4.900
2	Motorcycle 125cc	2	0.332
3	Generator 5 KVA	1	0.600
4	Incubator 300 eggs capacity	4	1.200
5	Incubator 200 eggs capacity	2	0.400
6	Hatchers 6 Nos. Brooders 20 Nos. Feeders & Drinkers 100 set	-	2.500
7	UPS 5 KVA	1	0.300
8	Benches	5	0.175
9	Dust Bin	5	0.050
10	Directional Boards / Sinology	LS	2.568
11	Close circuit monitory system day & night vision	1	6.000
12	Refrigerator full size	2	0.250
13	Deep Freezer full size	2	0.250
14	Computer alongwith accessories	1	0.600
15	Electric Mechanical Cleaner	2	1.000
Total:			21.125

COMMODITIES AND SERVICES OF SAIDPUR HATCHERY

(Rs. in million)

Sr. No.	Items	Cost
1	Cost of Birds	5.000
2	Feed	2.000
3	Chemical & Medicines	1.000
4	P.O.L. Charges	5.400
5	WAPDA charges	1.000
6	Publicity & Advertisement	0.700
7	Stationery	0.800
8	Rates & Taxes	0.800
9	Heating system	1.545
10	Transportation cages	1.600
11	Transportation charges	0.500
12	Maintenance charges for machinery & equipment	1.500
13	Maintenance charges for vehicles	3.000
14	Others	2.000
Total:		26.845

IMPROVEMENT / REHABILITATION OF SAIDPUR HATCHERY

SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	19.768
2	Machinery, tools, Stores and Equipment	21.125
3	Establishment	7.473
4	Commodities & Services	26.845
Total		75.211

**COST BREAK OF IN-SITU CONSERVATION AND RE-INTRODUCTION
OF BLACK BUCK IN CHOLISTAN**

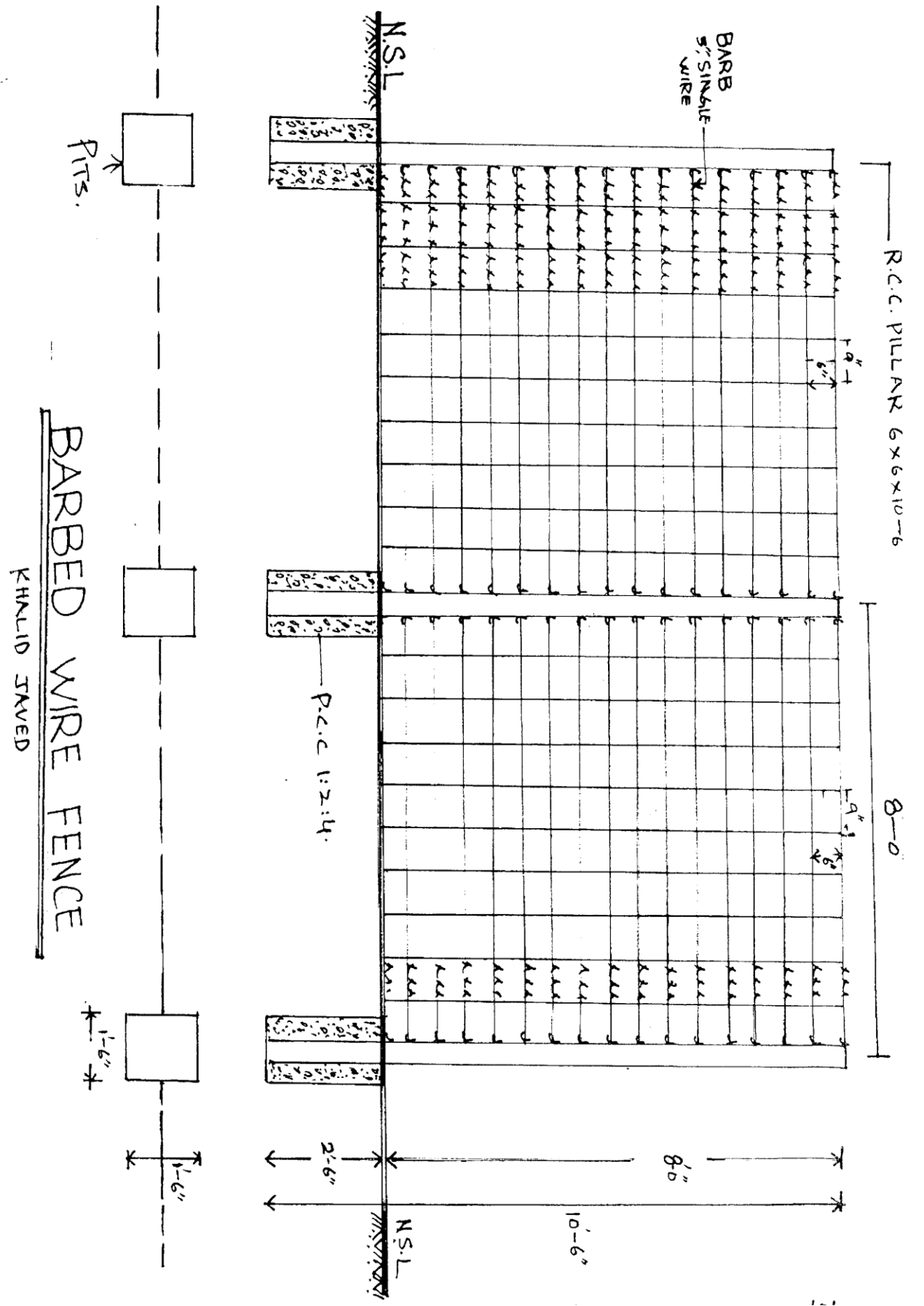
ABSTRACT OF COST BOUNDARY DEMARCATION I/C 4 NOS. WATERING POINTS OF WILDLIFE MODLE AREA 500 ACRES IN CHOLISTAN DISTRICT BAHAWALPUR		
#	Description	Amount
1	Barbed Wire Fencing area 500 acres / 22303 Rft	19225186
2	Water points 4 Nos.	301346
3	Total	19526532
4	3% contingency charges	585796
5	Total	20112328
6	Add PST 5%	1005616
7	G. Total	21117944
9	Cost in million	21.118

**ROUGH COST ESTIMATE BOUNDARY DEMARCATION I/C 4 NOS.
WATERING POINTS OF WILDLIFE MODLE AREA 500 ACRES IN
CHOLISTAN DISTRICT BAHAWALPUR**

S.No	Description	Nos	Measurement			Qty	Unit	Rate	Amount
			L	B	H/D				
1	Excavation in foundation of building, bridges and other structure i/c dag belling, dressing refilling around structure with excavated earth, watering and ramming lead upto one chain (30m) and lift upto 5' (1.5 m) in ordinary soil. Pits 8' c/c	2375	1.5	1.5	2.5	13359	%o Cft	6614.8	88370
	Foot wall	2375	6.5	2	1.5	46313	%o Cft	6614.8	306351
2	Cement concrete plain including placing, compacting, finishing and curing complete (including screening and washing of stone aggregate): Ratio 1: 2: 4	2375	1.5	1.5	2.5	13359	% Cft	22550.6	3012534
3	Reinforced cement concrete in roof slab, beams, columns lintels, girders and other structural members laid in situ or precast laid in position, or prestressed members cast in situ, complete in all respects:- Type B (nominal mix 1: 1½: 3)	2375	10.5	0.5	0.5	6234	P.Cft	385.7	2404598

4	Fabrication of mild steel reinforcement for cement concrete, including cutting, bending, laying in position, making joints and fastenings, including cost of binding wire and labour charges for binding of steel reinforcement (also includes removal of rust from bars):- Deformed bars (Grade-40)								
	V= 3/8" 4 Nos.	9500	10.5	0.37 8	2.20 5	1710 0	%Kg	12774. 3	2184397
	Ring = 1/4" 1 c/c = 1.5 x11= 16.50 Rft	2375	16.5	0.18 7	2.20 5	3323	%Kg	12774. 3	424537
5	P/Placing G.I Hooks 1/4" whlie casting RCC Posts 2375 x 11 = 26125 Nos.	2612 5				2612 5	Eac h	10	261250
6	Brick work 1:6 ratio other than building up to 10 ft height	2375	6.5	0.75	1.5	2315 6	%cft	17405. 8	3022865
7	Tega formed of pacca bricks on end, laid in and over cement sand mortor projecting to a height not more than 6" top of wall laid to lines,grades and shape 3" thick 1:3 ratio	3800 0				3800 0	%Rft	3895.6	1480328
8	Cement concrete plain including placing, compacting, finishing and curing complete (including screening and washing of stone aggregate): Ratio 1: 2: 4	1900 0	0.37 5		0.25	1781	% Cft	22550. 6	401682

9	Providing and fixing barbed wire 12 SWG 4 point Barb round one wire only 3" apart fencing, Vertically 9" c/c and Horizontal 6" c/c i/c fixing in G.I Hooks, straightening and tightening complete in all respects. (11x8 = 88 + 16 x8 =128 = 216 Rft in one span) 216 x 2375 / 300' x 20Lbs/2.205 = 15510 Kg					1551 0	P.Kg	180	2791800
Cost of 19000 Rft									1637871 3
Cost per Rft									862.000



ESTIMATE FOR CONSTRUCTION OF WATER POINT

S.No	Description	No	Length	Breadth	Depth	Contents	Amount
1	Excavation in foundation of building, bridges and other structure i/c dag belling, dressing refilling around structure with excavated earth, watering and ramming lead upto one chain (30m) and lift upto 5' (1.5 m) in ordinary soil.						
		1	x 25.00	x 5.50	x 1.00	=	137.5 Cft
	Pipe	1	x 50.00	x 1.50	x 2.00	=	150 Cft
						Total: =	287.5 Cft
						@ 6434.20 %oCft	1850
2	Cement concrete brick or stone ballast 1-1/2" to 2" (40 mm to 50 mm) gauge in foundation and plinth (b) Ratio 1:6:12						
		1	x 25.00	x 5.50	x 0.5	=	68.75 Cft
						Total: =	68.75 Cft
						@ 10728.75 %Cft	7376
3	Pacca brick work other than building upto 10ft. (3 m)height.Ratio 1:5						
		1	x 58.00	x 0.75	x 1.00	=	43.50 Cft
						Total: =	43.50 Cft
						@ 18061.25 %Cft	7857
4	Cement concrete plain including placing, compacting, finishing and curingcomplete (including screening andwashing of stone aggregate) Ratio 1: 2: 4						
		1	x 25.00	x 4.00	x 0.25	=	25.00 Cft
		1	x 58.00	x 0.75	x 0.25	=	10.88 Cft
						Total: =	35.88 Cft
						@ 22832.05 %Cft	8192

- 5 Laying floor of approved coloured glazed tiles $\frac{1}{4}$ " (6 mm) thick, laid in white cement and pigment on a bed of $\frac{3}{4}$ " (20 mm) thick cement mortar 1:2.

	1	x	25.00	x	4	=	100.00	Sft
Top of wall	1	x	58.00	x	0.75	=	43.50	Sft
						Total:	= 143.50	Sft
						@	15922.45	% Sft 22849

- 6 Coloured glazed tile dado (6"x6" $\frac{1}{4}$ ") (6mm) thick in pigment over 1:2 cement, sand mortar $\frac{3}{4}$ " (20mm) thick, including finishing.

	1	x	58.00	x	1.5	=	87.00	Sft
						Total:	= 87.00	Sft
						@	17098.75	% Sft 14876

- 7 Providing and laying R.C.C. pipe, moulded with cement concrete 1:1½:3, with spigot socket or collar joint, etc. 6"

	1	x	50.00	=	50.00	Rft
				Total:	= 50.00	Rft
				@	190.50	P.Rft 9525

- 8 Constructing gully grating chamber, 12"x12", (300x300mm) complete in all respects concrete Gully trap.

	1	=	1	No
		Total:	= 1	No
		@	2811.65	Each 2812
				Total: 75336
				301346

Cost of 4 Nos.

ABSTRACT OF COST FOR AFFORESTATION		
#	Description	Amount
1	Afforestation	15540000
2	Total	15540000
3	3% contingency charges	466200
4	Total	16006200
5	PST 5%	800310
6	Total of 50 Acres area (10% of the total acres)	16806510
7	Cost per Acre	336130
8	Cost in million	16.807

Rough cost estimate for Afforestation in Wildlife Modle area 500Acre

S.No	Description	Nos	Measurement			Qty	Unit	Rate	Amount
			L	B	H/D				
1	Providing and planting of local species plants 10% of the total area.	1	435			435			
	Add 10% mortality	1	44			44			
						479			
	50 Acres					23950	Eac h	150	3592500.00
2	Planting of shrubs / low height plants around in side boundary fence 3-rows 20'c/c					2850	Eac h	150	427500.00
3	Watering, maintainance for 24 months 24m x 4w x 2 turn =192 turn 50acre x 2tank / acre x192turn = 19200 Tank Diesel cost (05 ltr/trip) for tractor owned by Deptt.								
	19200 x 5 Litter					96000	ltr	120	11520000.00
									15540000.00

ABSTRACT OF COST FOR INSTALLATION OF SPECIAL HAND PUMP		
#	Description	Amount
1	Installation of hand pump	113320
2	Total	113320
3	3% contingency charges	3400
4	Total	116719
5	PST 5%	5836
6	Cost of 1 NO	122555
7	Cost of 4 Nos	490221
8	Cost in million	0.490

Rough cost estimate for installation of Special Hand Pump									
S. No	Description	Nos	Measurement			Qty	Unit	Rate	Amount
			L	B	H/D				
1	Providing and fixing Hand Pump machine 4"i/d heavy quality 10' long. 4' above ground level and 6' below NSL i/c handle and discharge 1-1/2".	1	10			10	P-Rft	1200	12000.00
2	Boring for tubewell in all types of soil except shingle and rock, from ground level to 200 ft. (30 m) depth, including sinking and withdrawing of casing pipe, complete:- 6"i/d 0 to 100'	1	100			100	P-Rft	248.6	24860
	.	1	100			100	P-Rft	387.3	38730
3	Providing and installing P.V.C. blind pipe, B.S.S. Class 'D', in tubewell bore hole, including sockets and solvents and jointing with strainer, etc. complete. 3"i/d	1	180			180	P-Rft	188.1	33858
4	Providing and installing P.V.C. Bail/End plug, in tubewell bore hole:- 3"i/d B.S.S. Class 'D'	1				1	Each	91.7	91.7
5	Providing and installing P.V.C. strainer B.S.S. Class 'D', in tubewell bore hole, including sockets and solvent, etc. complete 3"i/d	1	20			20	P-Rft	189	3780
									113320

**ABSTRACT OF COST FOR INSTALLATION OF SOLLAR
SYSTEM 4 NOS. FOR PRE-RELEASE PENS FOR BLACKBUCK
IN CHOLISTAN**

#	Description	Amount
1	Installation of Solar system	250000
2	Total	250000
3	3% contingency charges	7500
4	Total	257500
5	PST 5%	12875
6	Cost of 1 NO	270375
7	Cost of 4 Nos	1081500
8	Cost in million	1.082

Rough cost estimate for installation of solar system for check post									
S.No	Description	Nos	Measurement			Qty	Unit	Rate	Amount
			L	B	H/D				
1	Providing and installation of A-grade 600 watt solar pannels ,one dry battery 200 AMP i/c frames ,one KVA hybird invertor ,breakers ,protection wires, complete in all respect including installation at site .	1				1	Each	250000	250000
									250000

CONSTRUCTION OF OFFICE WITH BOUNDARY WALL AND CHECK POSTS

(Rs in million)

Sr. No	Item	Cost
1.	Construction of Office complex 1000 Sft i/c garages complete in all respect i/c external development @ Rs. 4500 /Sft	4.500
2.	Construction of Compound wall 400 Rft, 9" thick 6' height from DPC level i/c Razor wire 1.5' dia circle 4" C/C @ Rs. 2600 / Rft	1.040
3.	Constriction of Check Posts i/c solar system, hand pump, furniture & fixture etc. 2 Nos. 1000 sft/each complete in all respect including external development @ 3350 / Sft	6.700
Total		12.240

Cost of Human Resources for Blackbuck Re-introduction in Cholistan

Sr. No.	Name of Post	BPS	No. of Post	2018-19	2019-20 (6-months)	2020-21	2021-22	2022-23	Total
1.	Veterinary Officer	17	1	-	0.400	0.920	1.058	1.217	3.595
2.	Wildlife Supervisor	14	2	-	0.360	0.828	0.952	1.095	3.235
3.	Junior Clerk	11	1	-	0.162	0.373	0.429	0.493	1.457
4.	Wildlife Inspectors	09	4	-	0.600	1.380	1.587	1.825	5.392
5.	Wildlife Watchers	05	12	-	1.656	3.808	4.379	5.036	14.879
6.	Baildar	01	4	-	0.432	0.994	1.143	1.315	3.884
7.	Naib Qasid	01	1	-	0.108	0.250	0.288	0.331	0.977
8.	Chowkidar	01	1	-	0.108	0.250	0.288	0.331	0.977
9.	Driver	04	4	-	0.552	1.269	1.460	1.679	4.960
Total:			30	-	4.378	10.072	11.584	13.322	39.356

MACHINERY, STORES & EQUIPMENTS – CHOLISTAN MODEL AREA

(Rs. in million)

Sr. No.	Items of Work	Qty	Cost
1	Double Cabin Pick-up 4x4	2	9.800
2	Motorcycle 125cc	6	0.900
3	Tractor 75 HP with trolley, water bowzer etc.	2	8.000
4	Generator 5 KVA	1	0.600
5	Animal transportation cages	6	0.600
6	Emergency Portable Lights	10	0.100
7	UPS 5 KVA with dry batteries	1	0.300
8	Computer corei7 with full accessories, printer, scanner etc.	1	0.500
9	Electric Water Cooler 50 gallon	2	0.200
10	Tranquilizing gun	2	1.500
11	Fire Fighting Equipments	L.S.	0.500
12	Dust Bins	10	0.250
13	Desert Room Cooler	6	0.300
14	Sinology / Directional Boards	L.S.	5.000
15	Animal Rescue Kits	1	0.800
16	Manual Lawn Mower	4	0.160
17	Tillage	L.S.	0.200
18	Tuff Tank (Water Storage)		0.200
19	Rubber Pipe	L.S.	0.100
20	Canvas Pipe	L.S.	0.100
21	Installation and Commissioning of day & night close circuit watch & ward system	1	3.000
22	Deep Freezer	2	0.200
23	Refrigerator	2	0.200
24	Water Dispenser	4	0.200
25	R.O. Plant		1.500
26	Visitor Shelters Canopy Hexagonal stone (rubber wood recycled material with plastic)	5	4.790
Total:			40.000

COMMODITIES AND SERVICES – CHOLISTAN MODEL AREA

(Rs. in million)		
Sr. No.	Items	Cost
1	Cost of Animals / Birds	18.000
2	Cost of feed	6.000
3	P.O.L. Charges	7.000
4	Maintenance charges of vehicles	2.100
5	Stationery	0.400
6	Publicity & Advertisement charges	0.400
7	Hot & Cold Weather charges	0.500
8	Others	0.800
Total:		35.200

**DEVELOPMENT OF PRE –RELEASE PENS FOR REINTRODUCTION OF
BLACKBUCK IN CHOLISTAN**
SUMMARY OF COST

(Rs. in million)

Sr. No	Items	Total
1	Conservancy & Works	51.737
2	Machinery, tools, Stores and Equipment	40.000
3	Establishment	39.356
4	Commodities & Services	35.200
Total		166.293

IMPROVEMENT AND RESTORATION OF NAMAL LAKE

ANNEXURE- L

CONSEVANCY & WORKS

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	GIS based boundary Delineation and installation of boundary pillars	-	-	-	3.500	-	-	2.000	5.500
2.	Construction of information / interpretation center i/c site office / souvenir shop, 4200 Sft @ 5550/ Sft	-	-	-	12.939	4.894	-	5.477	23.310
3.	Bird Watching Towers with birds view facility, 4No complete in all respect	-	-	-	-	2.370	2.370	4.740	9.480
4.	Construction of Wildlife check posts 1000 Sft 3Nos @ 4246/- p. Sft i/c solar system complete in all respects	-	-	-	4.246	4.246	4.246	-	12.738
5.	Construction of Thatched bird watching hut 3 Nos. 500 Sft @ 3500/- P. Sft	-	-	-	0.300	0.300	0.400	2.000	3.000
6.	Installation of electric Supply line HP/ LT line i/c 100 KV transformer & wapda connection	-	-	-	1.800	-	-	1.000	2.800
7.	Installation of submersible pump i/c boring, levering complete in all respect	-	-	-	-	1.200	-	0.695	1.895
8.	Construction of water supply line 1800 Sft i/c water supply tank and lift pump	-	-	-	-	1.501	-	1.199	2.700
Total:		-	-	-	22.785	14.511	7.016	17.111	61.423

IMPROVEMENT AND RESTORATION OF NAMAL LAKE
MACHINERY, STORES & EQUIPMENTS

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Double Cabin Pick- up, 2500cc with fabricated hood, local assembled 4x4, 1No.,@ Rs. 4.900m/each	-	-	-	4.900	-	-	-	4.900
2.	Motorcycles 125 CC Honda Deluxe,8Nos., @Rs. 166000/each	-	-	-	0.664	-	0.664	-	1.328
3.	Binoculars Nikon 16x50, 10Nos. ,@ Rs. 50000/each	-	-	-	-	0.200	-	0.300	0.500
4.	Emergency Solar rechargeable lights 10 Nos. ,@ Rs. 16500/each	-	-	-	-	0.165	-	-	0.165
5.	Generator 10 KVA, 1No., @ Rs.1.500m	-	-	-	-	1.500	-	-	1.500
6.	2 Desktop Computer, 8 th generation latest model ,along with printer , Scanner & UPS complete in all respect,@ Rs. 0.450m/each	-	-	-	-	-	0.900	-	0.900
7.	Purchase of one Tractor along with accessories	-	-	-	-	2.500	-	-	2.500
8.	Purchase of one motor boat 75 HP engine, 12 seater	-	-	-	-	-	2.872	-	2.872
9.	Two wooden boats	-	-	-	-	1.500	-	-	1.500
10.	Multimedia projector with screen	-	-	-	-	-	0.450	-	0.450
11.	Spotting scopes 5Nos.	-	-	-	-	-	-	0.500	0.500
Total:		-	-	-	5.564	5.865	4.886	0.800	17.115

IMPROVEMENT AND RESTORATION OF NAMAL LAKE

COST OF ESTABLISHMENT

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Assistant Director Wildlife, One BS-17					1.058	1.217	1.399	3.674
2.	One Education Officer BS-17					1.058	1.217	1.399	3.674
3.	Wildlife Supervisor, one ,BS 15	-	-	-	-	0.180	0.414	0.476	1.070
4.	Junior Clerk, One, BS11	-	-	-	-	0.162	0.373	0.423	0.958
5.	Wildlife Inspector, Two, BS 9	-	-	-	-	0.300	0.690	0.793	1.783
6.	Wildlife Watcher, Sixteen, BS 5	-	-	-	-	2.208	5.078	5.840	13.126
7.	Driver, Two, BS 4	-	-	-	-	0.276	0.634	0.730	1.640
8.	Baildar, Five, BS1	-	-	-	-	0.540	1.242	1.428	3.210
9.	Sweeper ,Two,BS1	-	-	-	-	0.216	0.496	0.571	1.283
10.	Chowkidar,Two,BS1	-	-	-	-	0.216	0.496	0.571	1.283
11.	Naib Qasid,One,BS1	-	-	-	-	0.108	0.248	0.285	0.641
Total:		-	-	-	-	6.322	12.105	13.915	32.342

IMPROVEMENT AND RESTORATION OF NAMAL LAKE

COMMODITIES & SERVICES

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Development of management plan and implementation strategy of Namal Lake based on the guidelines of Ramsar Convention	-	-	-	3.500	-	-	-	3.500
2.	Watershed Management plan of catchment areas of Namal Lake	-	-	-	3.500	-	-	-	3.500
3.	Habitat enrichment through seed spread costing and planting	-	-		1.000	1.000	1.500	1.000	4.500
4.	Mass awareness and community based protection to raise their livelihood	-	-	-	1.500	2.00	2.500	6.000	12.000
5.	Provision of directional boards & signage	-	-	-	0.300	0.300	0.400	1.000	2.000
6.	Development of 3-D Model large size of Namal lake	-	-	-	-	1.500	-	-	1.500
7.	Animals / Birds Model showing ecological linkage	-	-	-	-	4.500	-	-	4.500
8.	Printing of brochures, information	-	-	-	1.000	1.000	-	1.500	3.500
9.	Contingent paid staff for community livelihood	-	-	-	1.500	1.500	1.500	3.000	7.500
10.	POL for vehicles , motorcycle and generator	-	-	-	1.500	2.000	2.000	4.300	9.800
11.	Furniture & fixture for information center	-	-	-	-	2.000	3.600	-	5.600
12.	Rate & Taxes	-	-	-	0.300	0.200	0.200	0.300	1.000
13.	Firefighting equipment's	-	-	-	-	0.500	0.500	-	1.000
14.	Publicity advertisement and mass awareness	-	-	-	0.500	0.500	0.300	0.600	1.900
15.	Plantation of plants	-	-	-	-	0.900	0.500	-	1.400
16.	Maintenance of machinery., vehicles	-	-	-	-	0.700	0.800	1.000	2.500
17.	Office stationary	-	-	-	0.200	0.500	1.000	1.800	3.500
18.	Others / unforeseen	-	-	-	1.000	1.500	2.000	3.500	8.000
Total:		-	-	-	15.800	20.600	16.800	24.000	77.200

IMPROVEMENT AND RESTORATION OF NAMAL LAKE

SUMMARY OF COST

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Conservancy and works	-	-	-	22.785	14.511	7.016	17.111	61.423
2.	Machinery, Stores & Equipment	-	-	-	5.564	5.865	4.886	0.800	17.115
3.	Cost of establishment	-	-	-	-	6.322	12.105	13.915	32.342
4.	Commodities and services	-	-	-	15.800	20.600	16.800	24.000	77.200
Total:		-	-	-	44.149	47.298	40.807	55.826	188.080

DEVELOPMENT OF WILDLIFE RESERVE AT HEAD BALLOKI

ANNEXURE- M

CONSERVANCY & WORKS

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Construction of Boundary Fence 23813 Rft, using M.S. L-iron box 1-1/2" x 1-1/2" x 1/4" post, frame of M.S. L-iron box 1-1/2" x 1-1/2" x 1/4", M.S. flat 1-1/2"x 1/4", hot dipped galvanized wire Chain-link 2" x 2" mesh 10 SWG, fixed with frame using nut bolts, cement concrete foundation 1:2:4 ratio 1-1/2' x 1-1/2' x 5',for fixing post and painting of frame work complete in all respect. @3000/P.Rft	-	-	-	28.000	30.342	-	13.097	71.439
2.	Construction of Watch Tower 28' high, 100 Sft top covering with fiber glass canopy on M.S square pipe frame i/c living area for duty staff 273.25 Sft, Septic Tank, Soakage Pit, Solar system and Hand pump complete in all respect, 04 Nos.@ 2.650m / each	-	-	-	-	9.480	-	1.120	10.600
3.	Construction of Supervisor Office, 1000 Sft, Septic Tank, Soakage Pit, Solar system and Hand pump complete in all respect,@ Rs. 4515/Sft	-	-	-	4.515	-	-	-	4.515
4.	Providing and fixing of rectangular Steel pipe Railing (wooden Jaffrey type),Picnic Resort 2.75' high i/c toe wall 2.0' above toe wall, 1880Rft i/c painting complete in all respect@Rs.2241.90/Rft	-	-	-	2.369	-	-	1.846	4.215

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
5.	Construction of Cafeteria, 2102 Sft including platform for open sitting area complete in all respect,@ Rs. 2099.90/Sft	-	-	-	4.414	-	-	-	4.414
6.	Construction of Tourist Huts, 5Nos. 625 Sft each complete in all respect,@ Rs. 3674.88/Sft	-	-	-	-	5.000	6.484	-	11.484
7.	Construction of Public Toilet 2Sets(Ladies & Gents) 275 Sft each complete in all respect,@ Rs. 3674.55/Sft	-	-	-	2.021	-	-	-	2.021
8.	Construction of Cement Concrete Paver Track, 4000 Rft 5'to10' wide complete in all respect,@ Rs. 250/Sft	-	-	-	2.000	3.000	-	-	5.000
9.	Development of Lawn / Landscaping, 3 Acres including ploughing, leveling, making lawns, turfing lawns with carpet Korean grass and planting of ornamental plants and maintenance for ninety days complete in all respect, @ Rs. 0.473m/Acre	-	-	-	-	0.500	0.918	-	1.418
10.	Providing and fixing of garden lights, 25 Nos. using Galvanized pipe medium quality 1-1/2" dia 8' high above ground level with LED Light of approved design, i/c service cable complete in all respect, @ Rs. 31500/each	-	-	-	-	0.787	-	-	0.787

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
11.	Providing and fixing of Search Lights, 05 Nos. using Galvanized pipe Heavy quality 4" dia, 3" dia 2" dia pole and 1-1/2 dia arms for fixing of lights 14' high above ground level with LED Light of approved design, i/c service cable complete in all respect, @ Rs. 131000/each	-	-	-	-	0.655	-	-	0.655
12.	Construction of Electric supply line 3000 Rft with HT, LT line pole and transformer 100 KVA, completed in all respect.	-	-	-	-	1.800	-	-	1.800
13.	Provision and Fixing of Children Amusement Facilities i.e. Picnic Area 5 Nos. of different shape See Saw 5 Nos. and Puzzels 2 Nos. etc. made of plastic wood recycled material complete in all respect.	-	-	-	-	2.000	2.883	-	4.883
14.	Installation of Submersible Pump 2 Nos., 7.5HP i/c boring, lowering, electric panel, service cable and M.S. steel sheathed covering complete in all respect, @ Rs. 0.600m/each	-	-	-	-	1.200	-	-	1.200
15.	Construction of water supply line / water hydrant system 1800 Rft. i/c excavation inspection, chamber, Polypropylene pipe, water Guns with stand, Sprinklers, Refilling of earth work complete in all respect, @ Rs. 834/Rft	-	-	-	-	0.700	0.801	-	1.501
Total:		-	-	-	43.319	55.464	11.086	16.063	125.932

DEVELOPMENT OF WILDLIFE RESERVE AT HEAD BALLOKI

MACHINERY, STORES & EQUIPMENTS

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Double Cabin Pick- up, 2500cc with fabricated hood, local assembled 4x4, 1No.,@ Rs. 4.900m/each	-	-	-	4.900	-	-	-	4.900
2.	Motorcycles 125 CC Honda Deluxe,10 Nos.,@Rs. 166000/each	-	-	-	1.650	-	-	-	1.650
3.	Binoculars Nikon 16x50, 10Nos. ,@ Rs. 50000/each	-	-	-	-	0.500	-	-	0.500
4.	Drone Camera with accessories Quad copter, Full HD (1080P) Still / Video recording camera (12MP minimum), flight range 5Km + flight duration 20-minutes, memory 64-GB minimum with video transmitter & Backup etc. 4Nos. ,@ Rs. 0.650m/each	-	-	-	-	2.600	-	-	2.600
5.	Emergency Solar rechargeable lights 10 Nos. ,@ Rs. 16500/each	-	-	-	-	0.165	-	-	0.165
6.	Generator 5 KVA, 1No. ,@ Rs. 0.400m/each	-	-	-	-	0.400	-	-	0.400
7.	One Desktop Computer,8 th generation latest model ,along with printer , Scanner & UPS complete in all respect,@ Rs. 0.450m/each				0.450	-	-	-	0.450
8.	Lawn mover engine mounted large size 36" Blade,@ Rs. 0.425m/each				-	0.425	-	-	0.425
9.	Manual lawn mover, 24" Blade good quality 3 Nos. ,@ Rs. 40000/each				-	0.120	-	-	0.120
10.	Purchase of tillage				-	0.140	-	-	0.140
Total:					7.000	4.350	-	-	11.350

DEVELOPMENT OF WILDLIFE RESERVE AT HEAD BALLOKI

COST OF ESTABLISHMENT

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Wildlife Supervisor (BS-15), 1 No.	-	-	-	-	0.180	0.414	0.476	1.070
2.	Junior Clerk (BS-11), 1 No.	-	-	-	-	0.162	0.373	0.429	0.964
3.	Wildlife Inspector (BS-9), 2 Nos.	-	-	-	-	0.300	0.690	0.793	1.783
4.	Wildlife Watcher (BS-5), 24 Nos.	-	-	-	-	3.312	7.617	8.760	19.689
5.	Driver, (BS-4) 1 No.	-	-	-	-	0.138	0.317	0.365	0.820
6.	Green Man / Baildar (BS-1), 5 Nos.	-	-	-	-	0.540	1.242	1.428	3.210
7.	Sweeper (BS-1), 3 Nos.	-	-	-	-	0.324	0.745	0.857	1.926
8.	Chowkidar (BS-1), 2 Nos.	-	-	-	-	0.216	0.496	0.570	1.282
9.	Naib Qasid (BS-1) 1 No.	-	-	-	-	0.108	0.248	0.285	0.641
Total:		-	-	-	-	5.280	12.142	13.963	31.385

DEVELOPMENT OF WILDLIFE RESERVE AT HEAD BALLOKI

COMMODITIES & SERVICES

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Purchase of Furniture & Fixture	-	-	-	-	-	-	0.550	0.550
2.	POL Charges for vehicle, motorcycle, lawn movers & generator .	-	-	-	1.000	1.500	1.500	5.600	9.600
3.	Contingent Paid Staff	-	-	-	1.000	1.250	1.500	3.750	7.500
4.	Planting of Plants 2-1/2' to 3' high ,4000 Nos, of different species ,@ Rs. 350/each	-	-	-	-	0.500	0.600	0.300	1.400
5.	Office stationary	-	-	-	0.500	0.750	1.000	2.750	5.000
6.	Publicity & Advertisement, directional boards i/c mass awareness	-	-	-	1.500	2.000	2.250	5.500	11.250
7.	Rate & Taxes	-	-	-	0.500	-	-	-	0.500
8.	Others / unforeseen	-	-	-	0.500	0.750	1.000	3.500	5.750
9.	Firefighting equipment's	-	-	-	-	0.500	0.500	-	1.000
Total:		-	-	-	5.000	7.250	8.350	21.950	42.550

DEVELOPMENT OF WILDLIFE RESERVE AT HEAD BALLOKI

SUMMARY OF COST

Sr #	Name of Work	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	Total
1.	Conservancy and works	-	-	-	43.319	55.464	11.086	16.063	125.932
2.	Machinery, Stores & Equipment	-	-	-	7.000	4.350	-	-	11.350
3.	Cost of establishment	-	-	-	-	5.280	12.142	13.963	31.385
4.	Commodities and services	-	-	-	5.000	7.250	8.350	21.950	42.550
Total:		-	-	-	55.319	72.344	31.578	51.976	211.217

Cost Break-up of Wildlife Checkposts



PROVINCIAL BUILDINGS CIRCLE
DERA GHAZI KHAN

PROVINCIAL BUILDINGS DIVISION
MUZAFFARGARH

DETAILED ESTIMATE FOR REPAIR &
RENOVATION OF WILD LIFE OFFICE AT
KOT ADDU

ESTIMATED COST =335500/-

PROVINCIAL BUILDINGS SUB DIVISION MUZAFFARGARH

ROVINCE.	PUNJAB
CIRCLE.	PROVINCIAL BUILDINGS CIRCLE DERA GHAZI KHAN
DIVISION.	PROVINCIAL BUILDINGS DIVISION MUZAFFARGARH
SUB DIVISION.	PROVINCIAL BUILDINGS SUB DIVISION MUZAFFARGARH
NAME OF WORK.	<u>DETAILED ESTIMATE FOR REPAIR & RENOVATION OF WILD LIFE OFFICE AT KOT ADDU</u>
MAJOR HEAD.	
MINOR HEAD.	
ESTIMATED COST.	Rs. 335500/-

**DETAILED ESTIMATE FRAMED IN THE OFFICE OF THE EXECUTIVE ENGINEER,
PROVINCIAL BUILDINGS DIVISION, MUZAFFARGARH FOR THE WORK
"REPAIR & RENOVATION OF WILD LIFE OFFICE AT KOT ADDU"**

History:

The Detailed estimate is prepared as desired by the client department, Muzaffargarh, amounting to Rs: 335500/- for technical sanction.

Specification.

The work will be carried out strictly according to the P.W.D specification and entire satisfaction of the Engineer incharge.

Carrying out of work.

The work will be executed through approved contractor of the Buildings Department.

Rates:

The rates provided in this estimate are based on M.R.S 1st quarter 2016

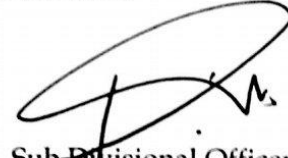
Cost:

The total cost of this estimate is comes to Rs: 335500/-

Time:

It will take about 1 Month to complete the work.


Sub Engineer


Sub Divisional Officer
Provincial Buildings Sub Division
Muzaffargarh

**DETAILED ESTIMATE FOR REPAIR & RENOVATION OF WILD LIFE
OFFICE AT KOT ADDU**

- 1 Dismantling of Cement concrete plain i/c placing
compacting curring ratio 1:2:4

Room	1 x	12 x	13.5 x	0.125	=	20 Cft	
	1 x	12 x	16 x	0.125	=	24 Cft	
	1 x	12 x	14 x	0.125	=	21 Cft	
Gallary	1 x	13 x	6 x	0.125	=	10 Cft	
Ver	1 x	16 x	7 x	0.125	=	14 Cft	
Toilet	2 x	6 x	8 x	0.125	=	12 Cft	
Total					=	101 Cft	
@					5,227.20	% Cft	5279

- 2 S/F sand under floor or plugging in wells

Room	1 x	12 x	13.5 x	0.333	=	54 Cft	
	1 x	12 x	16 x	0.333	=	64 Cft	
	1 x	12 x	14 x	0.333	=	56 Cft	
Gallary	1 x	13 x	6 x	0.333	=	26 Cft	
Ver	1 x	16 x	7 x	0.333	=	37 Cft	
Toilet	2 x	6 x	8 x	0.333	=	32 Cft	
Total					=	269 Cft	
@					1458	% Cft	3922

- 3 P/L watering and ramming brick ballast 1 1/2" to 2"
gauge with 25% sand mixed in F & P

Room	1 x	12 x	13.5 x	0.333	=	54 Cft	
	1 x	12 x	16 x	0.333	=	64 Cft	
	1 x	12 x	14 x	0.333	=	56 Cft	
Gallary	1 x	13 x	6 x	0.333	=	26 Cft	
Ver	1 x	16 x	7 x	0.333	=	37 Cft	
Toilet	2 x	6 x	8 x	0.333	=	32 Cft	
Total					=	269 Cft	
@					3477.1	% Cft	9353

- 4 1 1/2" (40 mm) thick mosaic flooring, consisting of 1/2" (13 mm)
mosaic topping of one part of cement and marble powder in the ratio
of 3:1 and two parts of marble chips laid over 1" (25 mm) thick floor of
1:2:4 cement concrete, including rubbing and polishing complete with
finishing :- (a) using grey cement

Room	1 x	12 x	13.5	=	162 Sft	
	1 x	12 x	16	=	192 Sft	
	1 x	12 x	14	=	168 Sft	
Gallary	1 x	13 x	6	=	78 Sft	
Ver	1 x	16 x	7	=	112 Sft	
Toilet	2 x	6 x	8	=	96 Sft	
Total				=	808 Sft	
@				8,268.70	% Sft	66811

- 5 Providing and fixing marble strip of any shade for dividing the
mosaic flooring into panels sSize 1 1/2" x 3/8" (40 x 10 mm)

70 % of above item No. 8

808 x	70 /	100	=	<u>566</u> Rft	
Total			=	566	Rft
@	6.6	P/Rft			3733

- 6 Contruction of Boundary Wall 6' height and 9" thick

						=	75 Rft		
						Total	=	75 Rft	
7 Distempering 2 coats on old surface i/c scraping						@	2120	P/Sft	159000
Room	2 x	2 x(	12 x	13.5)x	11 =	1122 Sft			
	1 x	2 x(	12 x	16)x	11 =	616 Sft			
Ver	1 x	2 x(	12 x	14)x	11 =	572 Sft			
Gallary	1 x	2 x(	16 x	7)x	11 =	506 Sft			
Toilet	1 x	2 x(	13 x	6)x	11 =	418 Sft			
	2 x	2 x(	6 x	8)x	11 =	616 Sft			
						Total	=	3850 Sft	
						@	337.3	% Sft	12986
8 White wash 2 coats on old surface i/c scraping of old white wash									
	1 x	12 x	13.5		=	162 Sft			
	1 x	12 x	14		=	168 Sft			
	1 x	12 x	16		=	192 Sft			
	1 x	13 x	7		=	91 Sft			
	1 x	16 x	7		=	112 Sft			
	2 x	6 x	8		=	96 Sft			
						Total	=	821 Sft	
						@	289.6	% Sft	2378
9 Providing and fitting glazed earthen ware water closet squatter type (Orisa pattern), combined with foot rest. white									
							=	1 No.	
						Total	=	1 No.	
						@	1,159.20	Each	1159
10 Providing and fitting "P" trap:- 10 cm (4") glazed.									
							=	1 No.	
						Total	=	1 No.	
						@	124.25	Each	124
11 Providing and fitting plastic made low down flushing cistern 1363 litre (3 gallons) capacity, including bracket set, copper connection, etc. complete. White									
							=	1 No.	
						Total	=	1 No.	
						@	1,118.75	Each	1119
12 Providing and fitting glazed earthen ware wash hand basin 56x40 cm (22"x16") including bracket set, waste pipe and waste coupling, etc. i) white, with pedestal									
							=	1 No.	
						Total	=	1 No.	
						@	2,426.10	Each	2426
13 Providing and fixing chromium plated bib cock:- 1/2" dia									
							=	3 No.	
						Total	=	3 No.	
						@	328.9	Each	987
14 Providing and fixing chromium plated shower rose:- i) 1.5x10 cm (1/2"x4")									
							=	1 No.	
						Total	=	1 No.	
						@	328.9	Each	329
15 Providing and fixing chromium plated stop cock, heavy:- 1/2" dia									
							=	3 No.	
						Total	=	3 No.	
						@	178.9	Each	537
16 Providing, laying, cutting, jointing, testing and disinfecting G.I. pipeline in trenches, with socket joints, using G.I.									

pipes of B.S.S. 1387-1967 complete in all respects, with
specials and valves.
Medium Quality ½" i/d (15 mm) 2.65mm thick

ii) ¾" i/d (20 mm) 2.65mm thick

Total	=	50 Rft	
@	66.65	P/rft	3333

17 P/F goldamatic ejector pump 0.5 BHP electric motor etc
complete as approved by the Engineer incharge

Total	=	150 Rft	
@	84	P/rft	12600

18 P/F of fiber glass tank 200 gallon capacity etc complete as
approved by the Engineer incharge

Total	=	1 No.	
@	35800	Each	35800

Total	=	200 Gallon	
@	68	P/Gln	13600

Total Rs: 335476

Say Rs: 335500


Sub Engineer


Sub Divisional Officer
Provincial Buildings Sub Division
Muzaffargarh


for Executive Engineer
Provincial Buildings Division
Muzaffargarh



PROVINCIAL BUILDINGS CIRCLE
DERA GHAZI KHAN

PROVINCIAL BUILDINGS DIVISION
MUZAFFARGARH

DETAILED ESTIMATE FOR M & R TO CENTURY
POST OF WILD LIFE HEAD PUNJNAD TEHSIL ALI
PUR DISTRICT MUZAFFARGARH

ESTIMATED COST

=71300/-

PROVINCIAL BUILDINGS SUB DIVISION MUZAFFARGARH

PROVINCE.	PUNJAB
CIRCLE.	PROVINCIAL BUILDINGS CIRCLE DERA GHAZI KHAN
DIVISION. 1	PROVINCIAL BUILDINGS DIVISION MUZAFFARGARH
SUB DIVISION.	PROVINCIAL BUILDINGS SUB DIVISION MUZAFFARGARH
NAME OF WORK.	<u>DETAILED ESTIMATE FOR M & R TO CENTURY POST OF WILD LIFE HEAD PUNJNAD TEHSIL ALI PUR DISTRICT MUZAFFARGARH</u>
MAJOR HEAD.	
MINOR HEAD.	
ESTIMATED COST.	Rs. 71300/-

**DETAILED ESTIMATE FRAMED IN THE OFFICE OF THE EXECUTIVE ENGINEER,
PROVINCIAL BUILDINGS DIVISION, MUZAFFARGARH FOR M & R TO
CENTURY POST OF WILD LIFE HEAD PUNJNAD TEHSIL ALI PUR DISTRICT
MUZAFFARGARH**

History:

The M & R estimate is prepared as desired by the, client department, amounting to Rs: **71300/-** for technical sanction.

Specification.

The work will be carried out strictly according the P.W.D specification and entire satisfaction of the Engineer incharge.

Carrying out of work.

The work will be executed through approved contractor of the Buildings Department.

Rates:

The rates provided in this estimate are based on M.R.S 1st quarter 2016.

Cost:

The total cost of this estimate is comes to Rs: **71300/-**

Time:

It will take about 30 days to complete the work.


Sub Engineer


Sub Divisional Officer
Provincial Buildings Sub Division
Muzaffargarh

**DETAILED ESTIMATE FRAMED IN THE OFFICE OF THE EXECUTIVE ENGINEER,
PROVINCIAL BUILDINGS DIVISION, MUZAFFARGARH FOR M & R TO
CENTURY POST OF WILD LIFE HEAD PUNJNAD TEHSIL ALI PUR DISTRICT
MUZAFFARGARH**

History:

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Cost:

The total cost of this estimate is comes to Rs: **71300/-**

Time:

It will take about 30 days to complete the work.


Sub Engineer


Sub Divisional Officer
Provincial Buildings Sub Division
Muzaffargarh

6 Mosaic dado or skirting with one part of cement and marble powder in the ratio of 3:1 and two parts of marble chips, laid over 1/2" (13 mm) thick cement plaster 1:3, including rubbing and polishing, complete with finishing: (a) using grey cement: ii) 1/2" (13 mm) thick

$$\begin{array}{rcl}
 2 \times & 2 \times (& 10 + \\
 & & 12) \times 0.5 = \frac{44 \text{ Sft}}{44 \text{ Sft}} \\
 \text{Total} & = & 8,792.90 \% \text{ Sft} \\
 @ & & 3869
 \end{array}$$

11 Glazing with panes (16 oz. to 18 oz.) including cost of putty

$$\begin{array}{rcl}
 8 \times & 1.5 \times & 2 \\
 & & \text{Total} = \frac{24 \text{ Sft}}{24 \text{ Sft}} \\
 @ & & 58.65 \text{ P/Sft} \\
 & & 1408
 \end{array}$$

12 Supply and erection of M.S. sheet box of 16 SWG, 10 cm (4") deep, with 4.75 mm thick (3/16") bakelite sheet top, for recessed wiring, including making holes for regulators switches, plugs, etc. 20 x 25 cm (8"x10")

$$\begin{array}{rcl}
 & = & \frac{2 \text{ Nos}}{2 \text{ Nos}} \\
 \text{Total} & = & 340.1 \text{ Each} \\
 @ & & 680
 \end{array}$$

ii) 7"x4"

$$\begin{array}{rcl}
 & = & \frac{2 \text{ Nos}}{2 \text{ Nos}} \\
 \text{Total} & = & 182.95 \text{ Each} \\
 @ & & 366
 \end{array}$$

13 Supply and erection of PVC pipe for wiring on surface including clamps inspection boxes, pull boxes, bends, tees, repairing surface, etc., complete with all specials:- 20 mm i/d

$$\begin{array}{rcl}
 & = & \frac{100 \text{ Rft}}{104 \text{ Rft}} \\
 \text{Total} & = & 19 \text{ P/Rft} \\
 @ & & 1976
 \end{array}$$

14 Supply and erection of tube light, including rod, choke, starter with frame, flexible wire, including connection from ceiling rose, etc., complete single rod (40 watts) with one choke and one starter

$$\begin{array}{rcl}
 & = & \frac{12 \text{ Nos}}{12 \text{ Nos}} \\
 \text{Total} & = & 635.75 \text{ Each} \\
 @ & & 7629
 \end{array}$$

15 Supply and erection of single core PVC insulated copper conductor cables, in pre-laid PVC pipe/M.S. conduit/G.I. pipe/wooden strip batten/wooden casing and capping/G.I. wire/trenches (rate for cables only):- a) 250/440 volts, PVC insulated: 3/0.74 mm (3/0.029")

$$\begin{array}{rcl}
 & = & \frac{150 \text{ Rft}}{150 \text{ Rft}} \\
 \text{Total} & = & 10.6 \text{ P/Rft} \\
 @ & & 1590
 \end{array}$$

ii) 7/0.74 mm (7/0.029")

$$\begin{array}{rcl}
 & = & \frac{100 \text{ Rft}}{100 \text{ Rft}} \\
 \text{Total} & = & 14.9 \text{ P/Rft} \\
 @ & & 1490
 \end{array}$$

16 Supply and erection of switches 5 Amp. piano type

$$\begin{array}{rcl}
 & = & \frac{10 \text{ Nos}}{10 \text{ Nos}} \\
 \text{Total} & = & 31.3 \text{ Each} \\
 @ & & 313
 \end{array}$$

17 Supply and erection of 3 pin. 5 Amp wall socket

$$\begin{array}{rcl}
 & = & \frac{8 \text{ Nos}}{8 \text{ Nos}} \\
 \text{Total} & = & 52.8 \text{ Each} \\
 @ & & 422
 \end{array}$$

18 Supply and erection of ceiling rose, bakelite

$$\begin{array}{rcl}
 & = & \frac{8 \text{ Nos}}{8 \text{ Nos}} \\
 \text{Total} & = & 34.35 \text{ Each} \\
 @ & & 275
 \end{array}$$

19 Supply and erection of button holder. i) bakelite large size

$$\begin{array}{rcl}
 & = & \frac{8 \text{ Nos}}{8 \text{ Nos}} \\
 \text{Total} & = & 27.9 \text{ Each} \\
 @ & & 223
 \end{array}$$

20 Removing cement or lime plaster from walls

$$\begin{array}{rcl}
 2 \times & 2 \times (& 10 + \\
 1 \times & 2 \times (& 22 + \\
 & & 12) \times 2 = \frac{176 \text{ Sft}}{120 \text{ Sft}} \\
 & & 8) \times 2 =
 \end{array}$$

1 x 2 x(5 + 4)x 2 = 36 Sft
 Total = 332 Sft
 @ 198 % Sft 657

21 1/2" thick cement plaster on wall upto 20' height ratio 1:4

Take same qty of item No. 20

Total = 332 Sft
 = 332 Sft
 @ 1493.6 % Sft 4959

Say Rs: 71252

Say Rs: 71300


 Sub Engineer


 Sub Divisional Officer
 Provincial Buildings Sub Division
 Muzaffargarh


 Sub Divisional Officer
 Provincial Buildings Sub Division
 Muzaffargarh

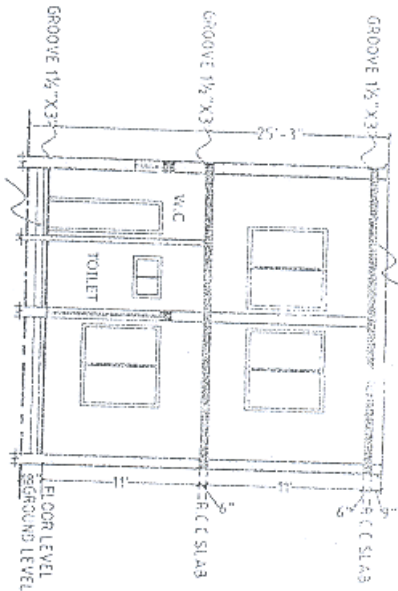
**ABSTRACT OF COST FOR CHECK POSTS 4 NOS 1000 SFT EACH IN
MURREE AREAS, DISTRICT RAWALPINDI**

#	Description	Amount
1	Check post 1000 Sft	3,870,000
2	Total	3,870,000
3	PST 5%	193,500
4	Total	4,063,500
5	Cost of 4 Nos	16,254,000
6	Cost in million	16.254
7	Cost per Sft	4063.50

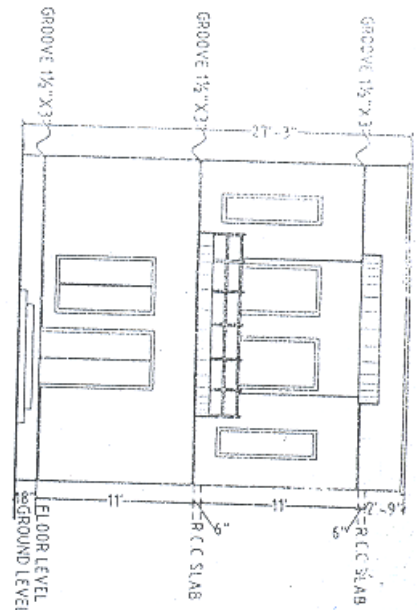
**ROUGH COST ESTIMATE FOR CHECK POST 1000 SFT IN MURREE
AREAS, DISTRICT RAWALPINDI**

#	Description	Plinth Area	B.P	P.H	S.I	E.I	Unit Rates	Amount
1	Construction of Check Post (Ground Floor)	500	1703	75		90	1868	934000
2	Construction of Check Post (First Floor)	500	1427	75		90	1592	796000
3	Extra for providing and installation of Goldamatic water pump 2 HP i/c borong upto 250 ft and 500 Gallon tuff tank	1					175000	175000
4	Soakage pit i/c 100 Rft Sewer line 9" i/d complete in all respect	1					330000	330000
5	Extra for Retaining Wall 80 Rft	80					6300	504000
6	Extra for Breast Wall Wall 60 Rft	60					3000	180000
7	Extra for Drain 70 Rft	70					3100	217000
8	Difference between deeper foundation v/s normal foundation	500					180	90000
9	Difference between CGI Sheet roofing v/s RCC Slab	500					550	275000
10	Difference between DPC v/s Plinth beam	500					138	69000
11	Extra for external Wapda connection							300000
	Total							3870000

ROOF SPECIFICATION AS PER
BUILDING DEPARTMENT



FLOOR SPECIFICATION AS PER
BUILDING DEPARTMENT
SECTION A-A

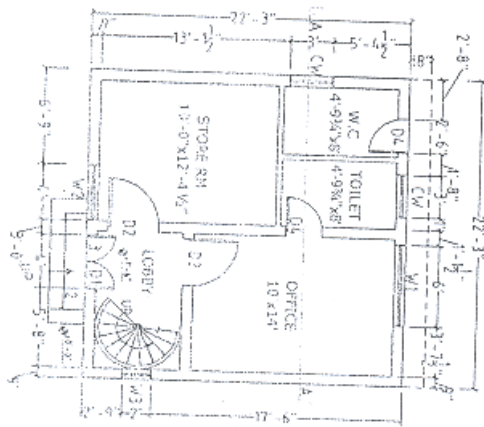


FRONT ELEVATION

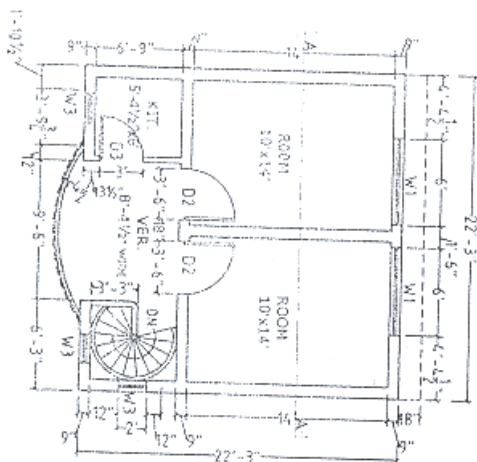
SCHEDULE OF DOORS/WINDOWS

S/No	TYPE	SIZE	SILL	DESCRIPTION
1	D1	4'-0" X 8'-0"	---	WOODEN FLUSH
2	D2	3'-6" X 8'-0"	---	DOORS IN IRONFRAM
3	D3	3'-0" X 8'-0"	---	DOORS IN IRONFRAM
4	D4	2'-6" X 8'-0"	---	DOORS IN IRONFRAM
WINDOWS				
5	W1	6'-0" X 5'-6"	2'-6"	ALUMINUM FRAM
6	W2	4'-0" X 5'-6"	2'-6"	GLAZED WINDOWS
7	W3	2'-0" X 7'-0"	1'-0"	GLAZED WINDOWS
8	W4	3'-0" X 2'-0"	5'-0"	GLAZED WINDOWS

GROUND FLOOR PLAN



FIRST FLOOR PLAN



TOR(S) FOR WILDLIFE SECTOR REVIEW & DEVELOPMENT OF PROVINCIAL WILDLIFE CONSERVATION STRATEGY, IMPLEMENTATION PLAN AND PROTECTED AREAS MANAGEMENT PLANS

The Punjab province covers an area of 20.6 million hectares, that constitute 23.45% of land mass of Pakistan and the areas where wildlife can find their habitat is 40% of the total land area of the Punjab. The protected areas such as wildlife sanctuaries, game reserves, national parks, wildlife parks / breeding centers and zoos notified under wildlife act are spreading over about 16% of total land mass of the province of Punjab. But the wildlife population and their habitats are suffering at the hands of human beings who are their longest associates. The population of wildlife is decreasing day by day due to various factors such as social factors, economic factors, political factors, demographic factors, environmental factors including: drought seasons, floods, deforestation, conversion of habitat into agricultural use, industrial use of habitat, greenhouse gases emissions, excessive use of pesticides and human intervention in natural habitat.

The purpose of this study is to conduct a sectoral study of wildlife resources their habitat and factors limiting propagation of wildlife both in natural habitat as well as in captivity, identification of gaps, to devise a comprehensive wildlife policy and suggest amendments in Wildlife Act and relevant rules in the light of study report and to meet the emerging challenges. The study will also focus on the development of protected areas system plans for three identified representative ecological zones i.e Wetland areas, Cholistan and Salt Range of Punjab. The protected area plans so prepared would be helpful to introduce endangered and recently extinct native wildlife species in their relevant habitats as well as management of protected areas on scientific lines

The study will also provide guidelines to improve fundamental principles and rules for establishment of CBOs in the wildlife potential areas and involve local community in the protection of endangered wildlife species so they feel themselves as their custodians and protectors of wildlife. The consultants would be hired following the guidelines for selection of consultants of PPRA Rules, Government of Punjab. The sector review study including development of provincial wildlife policy and development of protected areas system plans would cover, but not limited, the following broader analytical review of:

a) Sector Review, Wildlife Conservation Strategy and implementation plan

- i. Existing scenario of wildlife resources in the province.
- ii. Existing habitat conditions – their categories and different pressures on habitat such as grazing, dependence of adjoining communities on habitat for their livelihood etc.
- iii. Biodiversity count of province
- iv. Factors effecting wildlife status/decrease in population both indigenous and exotic such as:
 - a. Social factors
 - b. Economic factors
 - c. Political factors
 - d. Demographic factors
- v. Environmental factors including Drought seasons, floods, deforestation, conversion of habitat into agricultural use, industrial use of habitat, greenhouse gases emissions, excessive use of pesticides and human intervention in natural habitat Study of entire protected areas such as:
 - a. Wildlife sanctuaries
 - b. Game reserves
 - c. National parks including Wildlife Parks / Breeding Centres / Zoos
 - d. Potential of floral and faunal
 - e. Management Issues

- vi. Study of existing legislation such as:
 - a. Wildlife Act and Rules framed there under
 - b. Policy review and suggestions for improvement measures.
- vii. Study of illegal hunting and poaching pressure
- viii. Measures to reduce illegal hunting and poaching
- ix. Analytical review of capacity of wildlife department with reference to wildlife protection, management, conservation and preservation in the province.
- x. Factors limiting capacity of wildlife department to enforce legislation and corrective measures
- xi. Failure and success stories of wildlife department with reference to wildlife management focusing:
 - a. In-situ conservation
 - b. Ex-situ conservation
- xii. Critical analysis and review of private wildlife breeding farms and suggestion to improve wildlife in private sector.
- xiii. Analytical review of implementation with respect to international conventions to which Pakistan is signatory and national policies etc.
- xiv. Recommendations and action plan to improve wildlife status in the province covering all above mentioned areas.
- xv. The sectoral review, Conservation Strategy and implementation plan would be a self-contained and well elaborated document which would be prepared as per best international practices and on acceptable format.

b) Protected Areas Management plans

- i. Survey of selected areas with reference to floral and faunal resources.
- ii. Study of wildlife population resources both indigenous and exotic
- iii. Existing land use practices, analytical study of best international practices with reference to management planning.
- iv. Proposal to improve land use practices.
- v. GIS based mapping of area selected for management planning with clear identification and demarcation of boundaries.
- vi. Involvement of local communities and develop a mechanism to potentially involve local population to ensure sustainable management of wildlife.
- vii. Identification of root causes and potential threats to the area selected for management plans and course correctives.
- viii. Devise plan for reintroduction of native wildlife species.
- ix. Devise plan for improvement of habitat, develop suitable and conducive wildlife refuge areas, especially for-seeing natural calamities, disasters, droughts and any other abnormal happenings.
- x. Designing HR models to ensure optimal utilization of natural resources of area selected for management planning.
- xi. Plan and develop implementation strategy of interventions proposed for management planning and corresponding financial outlay.
- xii. Develop management plans covering above said factors
- xiii. The Protected Areas Management Plans would be developed as per best international standard on acceptable format.

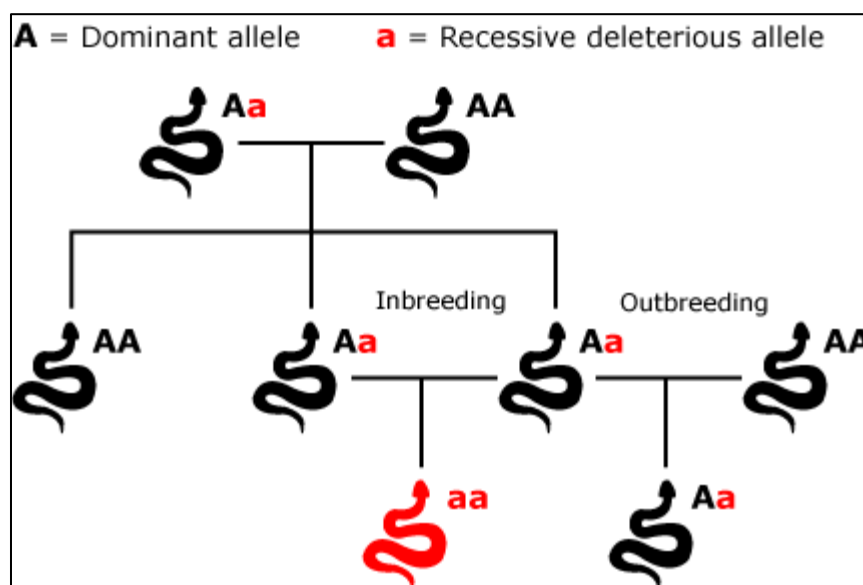
BRIEF NOTE ON IN-BREEDING

INBREEDING ISSUE AT ZOO / WILDLIFE PARKS OF PUNJAB

Inbreeding is the mating together of closely related animals (within species), for example mother/son, father/daughter, sibling/sibling matings and half-sibling/half-sibling. Inbreeding within a population of species can lower the population's ability to survive and reproduce which is known as '**Inbreeding Depression**'.

The explanation for inbreeding depression lies in the evolutionary history of the population. Over time, natural selection weeds deleterious alleles out of a population — when the dominant deleterious alleles are expressed, they lower the carrier's fitness, and fewer copies wind up in the next generation. But recessive deleterious alleles are "hidden" from natural selection by their dominant non-deleterious counterparts. An individual carrying a single recessive deleterious allele will be healthy and can easily pass the deleterious allele into the next generation.

When the population is large, this is generally not a problem — the population may carry many recessive deleterious alleles, but they are rarely expressed. However, when the population becomes small (**like in the case of Zoo and Wildlife Parks especially**), close relatives end up mating with one another, and those relatives likely carry the same recessive deleterious alleles. When the relatives mate, the offspring may inherit two copies of the same recessive deleterious allele and suffer the consequences of expressing the deleterious allele, **as shown in the example below**. In the case of the Swedish adders, that meant stillborn offspring and deformities.



IN-BREEDING IN ZOOS / WILDLIFE PARKS

Zoos and Wildlife Parks are facing inbreeding issues as they always have limited stock of different species. This make the captive stock most vulnerable to the impacts of inbreeding accordingly. Many disease-related problems can also arise in the captive inbreed fauna of Zoos and Wildlife Parks. Animals not exposed for generations to diseases found in the wild may have reduced resistance to them. Many captive Arabian oryx of Middle East were found to have tuberculosis which could have proved disastrous if they had been released to the wild. Hundreds of captive-bred black-footed ferrets died from disease after release.

Looking at the conservation science of captive breeding a clear picture emerges. The best animals for restocking wild populations are those from highly endangered species born in the wild (or, failing that, to wild-born parents), and kept in their natural habitat and social groups. The worst candidates are those species not in immediate threat of extinction, bred for generations in captivity, in environmental conditions very different from their natural habitat, especially those subjected to frequent relocation (which disrupts social grouping). Unfortunately these are precisely the animals produced in the main by the international zoo community – the alleged ‘ark’ for the preservation of species.

Punjab Scenario:

The Punjab Wildlife & Parks Department is also facing severe problems of in-breeding due to same factors as narrated above. Since the Zoos and Wildlife Parks in Punjab have limited parent stock of different species, they are facing in-breeding issues in big cats, ungulates as well as pheasants and peafowls. Resultantly, the off-springs of the species are more vulnerable to tuberculosis and other diseases. Deformities in pheasants / peafowls is common whereas ungulates are also facing problems of lower resistance and poor breeding results. Most of the cubs of animals are died in early age due to the impacts of in-breeding.

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MONITORING & EVALUATION PLAN

Monitoring & Evaluation Mechanism	Data for Monitoring & Evaluation
○ Field monitoring visits / reports generation ○ Monthly Monitoring through ADP Progress Reports by PM&E Unit Wildlife & Parks Department. ○ Monitoring (physical and financial progress) by Secretary FW&F Department through PC-III. ○ Monitoring through ADP Review meetings by Planning & Development Department. ○ Periodic monitoring / evaluation by DG M&E, Planning & Development Department	• PC-I projects • ADP progress reports • Expenditure reports • Inspection Notes, Budget allocated and released • Detail of physical works done at site & procurements made. • Recruitment process / list of staff to be hired. • Special reports.

GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB**WORK PLAN / ACTIVITY PLAN****ACTIVITY PLAN FOR INFRASTRUCTURE DEVELOPMENT / REHABILITATION**

(Rs. in million)

Sr #	Name of Work	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
1.	Rehabilitation / Wildlife Check posts 2 Nos.	0.450							
2.	Development of Wildlife Check posts i/c provision of allied facilities. i. Salt Range 04 Nos. ii. D.G. Khan 04 Nos. iii. Murree 04 Nos. iv. Kahuta 01 No. v. Attock 03 Nos. vi. Cholistan 06 Nos. vii. Total: 22 Nos.	89.408							
3.	Human Resource Charges of Protection Staff for Check posts: one Wildlife Inspector and three Wildlife Watchers for each check post.	80.066							
4.	Conservancy & Works of Ara-Basharat National Park	1967.952							
5.	Machinery, Tools, Stores & Equipment of Ara-Basharat National Park	346.687							
6.	Establishment Charges of Ara-Basharat National Park	258.808							

Sr #	Name of Work	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
7.	Commodities & Services Charges of Ara-Basharat National Park	510.895							
8.	Development of Model Wildlife Breeding Farm – Conservancy & Works, Machinery, Store & Equipment, Commodities & Services and Cost of Establishment.	969.372							
9.	Construction of Hatchery in Murree for supplementation & propagation of pheasants in respective ecological zones.	51.896							
10.	Construction of Pre-release Pens for Pheasants in Murree Hill, 4 Nos.	26.972							
11.	Development of Pre-release pens over 500 acres for reintroduction of Blackbuck in Cholistan alongwith allied facilities i.e. habitat enrichment, water ponds etc.	51.737							
12.	Improvement / Rehabilitation of Saidpur Hatchery i/c provision of allied facilities.	19.768							
13.	Human Resource Charges for Model Wildlife Area in Cholistan	39.356							
14.	Human Resource Charges for Hatcheries at Murree, Saidpur and Pre-release Pens in Murree Hills.	43.285							

Sr #	Name of Work	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
15.	Commodities & Services for Cholistan model Area.	35.200							
16.	Machinery & Equipments for Cholistan model Area.	40.000							
17.	Machinery & Equipments for Murree & Saidpur Hatcheries and Pre-release Pens in Murree Hills.	54.030							
18.	Provision of logistic support to wildlife checkpoints i.e. 44 Nos. Motorcycles 125CC Honda Delux @ Rs.0.150/each, two motorcycle for each Checkpost.	6.600							
19.	Commodities & Services for Murree & Saidpur Hatcheries and Pre-release Pens in Murree Hills.	124.990							
20.	Conservancy & Works for improvement & restoration of Kheri Murat National Park.	178.167							
21.	Machinery, Stores & Commodities for improvement & restoration of Kheri Murat National Park.	54.550							
22.	Cost of Establishment for improvement & restoration of Kheri Murat National Park.	69.742							
23.	Conservancy & Works for improvement & restoration of Namal Lake.	61.423							

Sr #	Name of Work	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
24.	Machinery, Stores & Equipments for improvement & restoration of Namal Lake.	17.115							
25.	Cost of Establishment for improvement & restoration of Namal Lake.	32.342							
26.	Commodities & Services for improvement & restoration of Namal Lake.	77.200							
27.	Conservancy & Works for improvement & restoration of Head Balloki.	125.932							
28.	Machinery, Stores & Equipments for improvement & restoration of Head Balloki.	11.350							
29.	Cost of Establishment for improvement & restoration of Head Balloki.	31.385							
30.	Commodities & Services for improvement & restoration of Head Balloki.	42.550							

GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

WORK PLAN / ACTIVITY PLAN

ACTIVITY PLAN FOR DEVELOPMENT OF GIS LAB & REGIONAL NODES

(Rs. in million)

Sr #	Item of Work / Particulars	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
1.	Improvement / Rehabilitation of Central GIS Lab i/c cost of machinery / equipments and internal improvement works	56.018							
2.	Human Resources Charges for Central Lab.	26.945							
3.	Development of Regional Nodes of GIS Lab at 8 (eight) Regional Headquarters	70.196							
4.	Human Resources Charges for Regional Nodes	51.832							

GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

WORK PLAN / ACTIVITY PLAN

**ACTIVITY PLAN FOR CAPACITY BUILDING – TRAININGS, WORKSHOPS, SEMINARS, DEVELOPMENT OF PROTECTED AREAS
MANAGEMENT PLANS ETC.**

(Rs. in million)									
Sr #	Item of Work / Particulars	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
1.	Training courses for officers & officials.	15.375							
2.	Workshops (3 Nos.) for Capacity Building.	6.750							
3.	Eco-awareness programme for students.	15.985							
4.	Development of Wildlife Surveys / Census facilities at district level – provision of equipment etc.	42.210							
5.	Sector Review & Formulation of Provincial Wildlife Conservation Strategy and Implementation Plan	5.250							
6.	Development of Protected Areas management plans for three selected areas.	11.000							

GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

WORK PLAN / ACTIVITY PLAN

ACTIVITY PLAN FOR PROVISION OF INCENTIVIZED FACILITIES TO PRIVATE BREEDING FARMERS, MANAGEMENT OF CAPTIVE WILDLIFE STOCK AND MASS AWARENESS PROGRAMME ETC.

(Rs. in million)									
Sr #	Item of Work / Particulars	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
1.	Incentivized facility / training to Private Wildlife Breeding Farms.	1.800							
2.	Management of Captive Wildlife Stock i.e. Tagging / Micro Chipping and Provision of equipment & medicines.	48.000							
3.	Mass Awareness Camping i/c Seminars / Workshops / Walks and Collaboration with Universities, NGOS, INGOS to promote research on Biodiversity conservation and short consultancies for developing mass awareness material.	37.560							

GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

WORK PLAN / ACTIVITY PLAN

ACTIVITY PLAN FOR PROJECT MANAGEMENT UNIT (PMU)

(Rs. in million)

Sr #	Title of Post / Particulars	BPS	No.	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
1.	Project Director	19	1	8.746							
2.	Accountant	17	1	4.994							
3.	Personal Assistant cum Computer Operator	16	1	3.741							
4.	AutoCAD Draftsman	14	1	2.066							
5.	Civil Draftsman	14	1	2.066							
6.	Driver	4	1	1.917							
7.	Office Boy / Naib Qasid	1	1	1.344							
8.	One Double Cabin Hilux Pick-up 4x4 (local assembled)		1	4.850							
9.	T.A		LS	1.250							
10.	POL & Maintenance Charges		LS	7.770							
11.	Repair & Maintenance of machinery & Equipments		LS	10.000							
12.	Repair & Maintenance of Vehicle & Motorcycles		LS	10.000							
13.	Contingent paid staff		LS	10.000							

Sr #	Title of Post / Particulars	BPS	No.	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
14.	Motorcycle 125cc Honda Delux @ Rs. 0.150/each, 2 Nos.		LS	0.300							
15.	Office Stationery		LS	1.600							
16.	Publicity & Advertisement		LS	1.750							
17.	Exposure visit charges		LS	7.756							
18.	Others		LS	2.300							

GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE RESOURCES IN PUNJAB

WORK PLAN / ACTIVITY PLAN

ACTIVITY PLAN FOR SUMMARY OF COST

(Rs. in million)									
Sr #	Title	Total	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
1.	Infrastructure Development / Rehabilitation.	5419.228							
2.	GIS Lab & Regional Nodes	204.991							
3.	Training, Workshops, Seminars, Development of Protected Areas System Management Plans etc.	96.570							
4.	Incentivized Facilities to Private Breeding Farmers, Management of Captive Wildlife Stock and Mass Awareness Programme etc.	87.360							
5.	Project Management Unit (PMU).	82.450							

RISK MITIGATION PLAN

Sr. No.	Wildlife Components / Interventions	Quantity / Units	Risks
i.	G.I.S. Lab at Head Office	1 No.	No risk is involved in the implementation of this project. Timely approval of project procurements, training, hiring of staff and release of funds by competent authority may be ensured.
ii.	G.I.S. Nodes at Regional level	8 Nos.	
iii.	i. Rehabilitation / Improvement of Wildlife Check posts ii. New Checkposts	02 Nos. 22 Nos.	
iv.	Impart training to Private Wildlife Breeding Farmers	100 Nos.	
v.	Capacity Building of Officers / Officials through short training courses / exposure visits	• 15-Officers training / Short courses in wildlife management • 20-Officers training / Short courses in project management. • 60-Staff training	
vi.	Management of Captive Wildlife Stock	• 10 Nos. Wildlife Parks • 3 Nos. Zoos • 1 No. Safari Zoo	
vii.	Workshops on Wildlife Survey / Census / Wetlands management / Protected areas management	3-Workshops	
viii.	Wildlife Sector Review & Formulation of Provincial Wildlife Policy	1 No.	
ix.	Development of Protected Areas System Plans	3 Nos.	
x.	Mass awareness programme	• 05- seminars/workshop/ walks i/c development of website & Facebook page • Eco-awareness programme for students. • 01-Wildlife documentary • Collaboration with Media Partners/NGOS/ INGOS / Universities	
xi.	Human Resources / Project Management Unit	1 No.	

Environmental Impact Analysis

This is purely an environmental project. Implementation of the project would have favorable impacts on the environment of the area because wildlife is an integral part of eco-systems. In 21st century by the establishment of factories / industrial units and discharge of vehicles has deteriorated the environment. By establishing this project, the environment will be improved by conserving flora and fauna of the area. Vegetation cover will be increased. Insectivore species will flourish to ensure Biological control of pests in place of toxic sprays. It will be helpful for improvement of habitat in different potential areas for protection of wildlife. Selected protected areas of the Punjab will be managed properly and saved for wildlife and thus having overall positive impact on natural environment of the province.

Since the objectives of the project are to manage natural resources, especially development of model wildlife areas, management of protected areas, impart training to wildlife staff, promote eco-tourism etc., therefore potential impacts of the proposed project on the area's geomorphology, surface and ground water resources, air quality, biological resources and socio-cultural environment is environment friendly and favourable.

However, mitigation measures w.r.t. vegetation covers especially plantation to improve habitat conditions is a part of the project which will help to improve overall environmental status of areas selected for project activities.

Economic / Financial Analysis

This is purely an environmental project and no direct financial benefits are expected with the implementation of the project. The Punjab Wildlife & Parks Department is responsible for protection, preservation, conservation and management of wildlife in Punjab province.

The project will have following indirect benefits.

- Improved and better protection, preservation, conservation and management of wildlife
- Improved management of wildlife and their habitat through
 - Rehabilitation of natural habitat
 - Wildlife propagation through captive breeding
 - Eco- Tourism promotion in the province
- Mass education and awareness about the importance of wildlife
- Impart research and training in relevant disciplines
- Strengthening liaison with national and international conservation agencies
- Controlling illegal hunting and poaching of wildlife through infrastructure rehabilitation.
- Scientific management of protected areas and resultant improvement of flora & fauna.
- Protection and restoration of degraded areas.
- Improved legislation in terms of wildlife policy.
- Involvement of local communities for wildlife conservation.
- New employment opportunities would be generated.
- Training activity will improve the performance of wildlife staff.
- Gene pool preservation through re-stocking / blood exchange.
- Socio-economic uplift of adjoining areas would be enhanced.
- GIS-based management of natural resources would be encouraged.

PROFORMA FOR DEVELOPMENT PROGRAME 2018-19

(Rs. in million)

S r #	Project code (LO. No)		G.S. No. 2018 -19	Name of Scheme	Distri ct	Tehsil	Constitue ncy/ PP No.	App./ Revisio n Date	Estimated Cost		Major Components	Major Targets	Exp. up to June 2018	(ADP 2018-19 Provision)						Grand total	Proj ectio n for 2019 -20	Projectio n for 2020-21	Throw Forward beyond June, 2021
	Cap.	Rev.							Local					Foreign Aid		Total							
									Cap	Rev				Cap	Rev	Cap	Rev						
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
1	LO 1700 5359	LO 1700 7414	5756	Green Pakistan Programme – Revival of Wildlife Resources in Punjab	All Punjab	All Punjab	All Punjab	17.1.17	NIL	5890.599 (50% share of ADP)	Civil Works, Machinery & Equipment, Purchase of animals/birds Recruitment of Staff	- Improvement/ Rehabilitation of Check posts. - Establishment of GIS Central Lab & Regional Nodes - Trainings to officials / officers, Wildlife Private Breeding Farms - Wildlife Sector Review Analysis through consultants - Workshops, Seminars - Machinery, store & equipments - Staff recruitment - Commodities & services	15.190	-	29.10 6	Nil	Nil	-	29.10 6	ADP 29.106 PSDP 29.106	ADP 230.8 39 PSDP 230.8 39	ADP 722.008 PSDP 722.008	ADP 1963.640 PSDP 1963.641

PERFORMA FOR DETERMINING THE ALIGNMENT OF DEVELOPMENT SCHEMES WITH THE PUNJAB GROWTH STRATEGY 2018-19

Project Title	Project Cost	Current spending	Start & end date	District	PPP/ Private sector investment	Which categories the project falls in?				Social inclusion	Social outcomes (health, education, sanitation etc.)	Capacity Building/HR	Employment	Does the project have any impact on Export?	If the scheme dose not fit in to any category - state what it addresses
						Investment climate improvement/facilitation of private sector	Relieving energy shortages	Improvement of quality and quantity of infrastructure	Better functioning cites and urban clusters						
Green Pakistan Programme – Revival of Wildlife Resources in Punjab	5890.599	NIL	1st July 2016 to 30th June 2023	All Punjab	-	-	-	Yes	-	Yes	-	Yes	Yes	-	Wildlife Conservation and Management

DEVELOPMENT AND IMPROVEMENT OF CENTRAL GIS LABORATORY AT HEAD OFFICE, LAHORE

A GIS node was established at Head Office Lahore for the collection and development GIS and Remote Sensing Datasets of the Wetlands of Punjab. This node will be upgraded as a Central GIS Laboratory/Information and Communication Technology Center of Punjab Wildlife & Parks Department to cater all the vector and raster data regarding wildlife of Punjab Province in addition to the datasets of wetlands of Punjab.

Cost of Infrastructure Development and Machinery / Equipment

(Rs. in million)

Sr. No.	Items of Work	Qty	Rate/ Unit	Total
i.	Glass partition of server room, manager room	LS		0.248
ii.	Development of server table, server racks, manager's room racks and table, moveable drawers with improvement of tables of main lab	LS		0.812
iii.	Development of central table with racks for digitization and keeping of topo-sheets and other GIS / RS related hard copies	LS		0.100
iv.	Computer chairs for Server Room and Manager Room	4	0.025	0.100
v.	Computer chairs for main lab.	6	0.010	0.060
vi.	3 Seater Bench with steel frame	2	0.034	0.068
vii.	False ceiling with lighting and other electric work	LS		1.144
viii.	Desktop Computers, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multiformat DVD Writer or higher specs, with standard keyboard and mouse, equivalent or above	4	0.150	0.600
ix.	LED touch screens 24 to 30 inches, 16:9 aspect ratio, 1920x1080, HDMI & VGA Connectivity	5	0.050	0.250
x.	LED Screen 60 inches for display of maps, 3840x2160, built in wifi, wifi direct, 3xHDMI 2xUSB 1xEthernet ports.	1	0.350	0.350
xi.	Laptop , Core i7 7 th generation, 16GB Ram DDR3, 15 inch or higher display, 1TB SATA HDD 7200rpm Hard Drive, Blue Ray DVD Drive or higher, Gigabit Ethernet controller LAN, equivalent or above	2	0.175	0.350
xii.	Server Intel Xeon processor E5 2600 v4, RAM 64GB DDR4, 2400MT/s DIMM, 2TB 15000 RPM SATA Hard Drive, Ethernet controller 2x10Gbps, equivalent or above	2	0.500	1.000
xiii.	External Hard Drives for Data Storage and backup 8TB, transfer speed 220MB/s, USB 3.0 & 2.0 connectivity	1	0.080	0.080
xiv.	External Hard Drives for Data Storage and backup 3TB, transfer speed 220MB/s, USB 3.0 & 2.0 connectivity	2	0.030	0.060
xv.	External DVD/CD Writer	1	0.025	0.025
xvi.	Garmin GPS receiver units Map 64S or higher version	6	0.100	0.600
xvii.	GPS Camera 20 megapixel	1	0.100	0.100
xviii.	Multimedia with screen preferably Hitachi, CP-S 335 Panasonic or equivalent	1	0.160	0.160
xix.	UPS 5 KVA with dry batteries for servers	2	0.375	0.750
xx.	UPS 10 KVA with dry batteries for lab	1	0.605	0.605

Sr. No.	Items of Work	Qty	Rate/ Unit	Total
xxi.	Laser Printer HP Laserjet M225DN MFP equivalent or above	1	0.060	0.060
xxii.	Color Printer HP Laserjet 5225 A3 Size equivalent or above	1	0.300	0.300
xxiii.	Plotter, HP DESIGNJET T790 ePrinter 44-inch with extra cartridges	1	0.650	0.650
xxiv.	Networking accessories for Networking of the lab Including, Cables, ducts, networking switches and networking charges	LS	0.500	0.500
xxv.	AC, Split type DC inverters, 1.5 ton, server room, manger room and lab	4	0.100	0.400
xxvi.	ArcGIS Server / Softwares	1	16.000	16.000
xxvii.	ArcGIS Desktop with extensions / Softwares	1	6.000	6.000
xxviii.	High Performance 360 view camera	1	1.371	1.371
xxix.	Portable 360 Camera	9	0.158	1.422
xxx.	Multi-Spectral Imaging Camera with drone	1	2.421	2.421
xxxi.	High-Accuracy GNSS Tablets for survey, 4GB RAM, 64GB Internal Memory	10	0.177	1.770
xxxii.	54" Large Format Scanner	1	0.580	0.580
xxxiii.	ISCSI Storage Area Network with 40TB Disk Space	1	2.371	2.371
xxxiv.	Kaspersky Total Security Antivirus 5 years subscription	1	0.971	0.971
xxxv.	Firewall for internet security at server end	1	0.871	0.871
xxxvi.	Backup Server / Softwares	1	2.021	2.021
xxxvii.	Establishment of Wildlife Management Information System and GIS Applications	1	3.371	3.371
xxxviii.	Internet connection fiber optics & internet charges	LS	Job	2.521
xxxix.	Other (Contingencies)	LS	-	3.156
xxxx.	Stationery, Cartridges for plotter, printers etc.	LS	-	1.800
			Total	56.018

Cost of Human Resource for GIS Lab

Sr. No.	Name of Post	*BPS	No. of Post	Total for project period
1.	GIS Analyst	17	1	4.954
2.	RS Analyst	17	1	4.954
3.	Network Administrator / GIS Web Developer	17	1	4.954
4.	Data Entry Operator	14	4	10.234
5.	Naib Qasid	1	2	1.849
Total:			9	26.945

ESTABLISHMENT OF GIS NODES AT REGIONAL LEVEL WITH ASSOCIATED STAFF

Regional GIS nodes will be established at every region of the Punjab Province with a mandate to collect all the vector and raster data in their respective region and share it with the central GIS Lab. for the analysis. These regional nodes will be equipped with workstations, scanners, printers, digitizers, GPS receivers, with associated staff.

Cost of Infrastructure Development and Machinery / Equipments

Sr. No.	Items of Work	Qty	Rate/ Unit	Cost per Node	Total Cost (8 Nodes)
1.	Development of wall mounted tables with racks, soft boards, electrification, false ceiling etc.	LS		4.500	4.500
2.	Computer chairs	3	0.010	0.030	0.240
3.	White boards	1	0.010	0.010	0.080
4.	Desktop Computer, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multi-format DVD Writer or higher specs, with standard keyboard and mouse, equivalent or above	2	0.150	0.300	2.400
5.	LED touch screens 24 to 30 inches, 16:9 aspect ratio, 1920x1080, HDMI & VGA Connectivity	3	0.050	0.150	1.200
6.	Laptop, Core i7 7th generation, 16GB Ram DDR3, 15 inch or higher display, 1TB SATA HDD 7200rpm Hard Drive, Blue Ray DVD Drive or higher, Gigabit Ethernet controller LAN, equivalent or above	1	0.175	0.175	1.400
7.	Server Intel Xeon processor E5 2600 v4, RAM 64GB DDR4, 2400MT/s DIMM, 2TB 15000 RPM SATA Hard Drive, Ethernet controller 2x10Gbps, equivalent or above	1	0.500	0.500	4.000
8.	External Hard Drives for Data Storage and backup 3TB, transfer speed 220MB/s, USB 3.0 & 2.0 connectivity	1	0.030	0.030	0.240
9.	External DVD/CD Writer	1	0.025	0.025	0.200
10.	Garmin GPS receiver units Map 64S or higher version	5	0.162	0.812	6.500
11.	GPS Camera 20 megapixel	1	1.500	1.500	1.500
12.	UPS 5 KVA with dry batteries	2	0.375	0.750	6.000
13.	Laser Printer HP LaserJet M225DN MFP equivalent or above	1	0.060	0.060	0.480
14.	Color Printer HP LaserJet 5225 A3 Size equivalent or above	1	0.300	0.300	2.400
15.	Networking accessories for Networking of the lab Including, Cables, ducts, networking switches and networking charges	LS	LS	0.625	5.000
16.	AC, Split type DC inverters, 1.5 ton	1	0.100	0.100	0.800
17.	Steel Almirah	1	0.020	0.020	0.160

Sr. No.	Items of Work	Qty	Rate/ Unit	Cost per Node	Total Cost (8 Nodes)
18.	Provision of Internet Connection & internet charges	1	2.370	2.370	18.960
19.	Other (Contingencies)	LS		1.350	14.136
Total:					70.196

Cost of Human Resource for Regional Nodes

Sr. No.	Name of Post	BPS	No. of Post	Total for project period
1.	GIS/RS Analyst	17	8	44.898
2.	Data Entry Operator	14	8	6.934
Total:			16	51.832

DEVELOPMENT OF WILDLIFE CHECK POSTS I/C PROVISION OF ALLIED FACILITIES

Sr. No.	Name of Area	Nos.	Rate	Total Cost
1.	Salt Range	04	4.064	16.256
2.	D.G. Khan	04	4.064	16.256
3.	Murree	04	4.064	16.256
4.	Kahuta	01	4.064	4.064
5.	Attock	03	4.064	12.192
6.	Cholistan	06	4.064	24.384
Total:		22	4.064	89.408

PROVISION OF LOGISTIC SUPPORT TO WILDLIFE CHECK POSTS

Sr. No.	Name of Item	Nos.	Rate	Total Cost
1.	Motorcycles 125CC Honda Delux, 2 Nos. for each check post	44	0.150	6.600
Total:		44	0.150	6.600

COST OF HUMAN RESOURCE FOR CHECK POST

Sr. No.	Items of Work	B P S	No. of Post	2016-17	2017-18	2018-19	2019-20 (6-months)	2020-21	2021-22	2022-23	Total
1.	Wildlife Inspectors	09	28	0.00	0.00	0.00	1.080	4.644	7.140	10.010	22.874
2.	Wildlife Watchers	05	84	0.00	0.00	0.00	2.700	11.610	17.852	25.030	57.192
Total:			112	0.00	0.00	0.00	3.780	16.254	24.992	35.040	80.066

**CAPACITY BUILDING OF OFFICERS / OFFICIALS THROUGH TRAINING,
SHORT COURSES / EXPOSURE VISITS BOTH FOR LOCAL AREAS AS
WELL AS ABROAD.**

Training courses for Wildlife Managers

a). **Course Title:** Integrated Species Conservation and Management

Course contents:

- The role of zoos in conservation
- Extinctions – past and present
- Indicator, flagship, keystone and umbrella species in conservation
- Conservation genetics and species conservation
- Population Viability Analysis
- Assessing priorities
- Role of communities
- Field trip for direct observations
- Designing species recovery programmes
- Translocations and reintroductions
- Balancing in situ and ex situ conservation.

Course Location: The course will preferably run at Durrell Conservation Academy at Durrell's headquarters in Jersey, UK. However, other compatible organizations / universities may also be selected.

Course cost: The course will cost Rs.7,00,000/- per person

Total Cost Rs.7,00,000 x 5 = **3.500 million**

b). **Course Title:** Avian Egg Incubation Workshop

Course Duration: The Avian egg incubation workshop is a practical workshop designed to give participants the skills required to successfully incubate bird eggs and deal with problems that could arise.

Course contents:

- Embryo and membrane development
- Factors affecting hatchability before and during incubation
- Hatchery management techniques
- Artificial incubation and its role in field conservation programmes

Course Location: The course will preferably run at Durrell Conservation Academy at Durrell's headquarters in Jersey, UK. However, other compatible organizations / universities may also be selected.

Course cost: The course will cost Rs.7,00,000/- per person

Total Cost Rs.7,00,000 x 5 = **3.500 million**

c). **Course Title:** Certificate Course in Wildlife Management

Course Duration: As per available schedule with relevant institution

Course Location: Preferably Wildlife Institute of South Asian Region. However, some other compatible regional institutions may also be selected.

Course Contents: The main objectives of the course are to:

- Provide understanding and knowledge on modern concepts in wildlife management,
- Provide an insight into relevant conservation policies and legislation and their enforcement mechanism at Global, Regional, National, State and Local Level,
- Provide hands on experience and training in use of modern scientific methods, techniques and tools that are required for assessment and monitoring of conservation goals,
- Develop understanding of landscape approach to conservation and skills for scientific wildlife management planning, and
- Develop skills for resolving human wildlife conflict including capture, handling, care and management of wild animal.

The broad outline of the course structure includes the following modules:

- Wildlife Species and Habitats
- Population Estimation
- Remote Sensing and GIS
- Wildlife Management (Human Wildlife Conflict including Capture and Restraint, Wildlife Health Management, Habitat Management, Law, Management Planning, Enforcement and Monitoring, Ex-situ Conservation and management, Communities and Outreach)

Course cost: Rs.10,00,000/- per person

Total Cost: Rs.10,00,000/- x 5 = **5.000 million**

d). **Course Title:** Training course in I.T. based project management from reputed training institute i.e. PIM, IBA and other compatible national / sub-national institutions etc.

Course Duration: One week (Five Working Days)

Course Location: Pakistan

Course Cost: Rs.56,250/- per person

Course Contents:

- What is project & project management framework
- Integration of organization strategy with projects
- Project integration management
- Scope management
- Time Management
- Cost Management
- Quality Management
- Human Resources Management
- Communication Management
- Risk Management
- Procurement Management
- How to develop a project organization

Total Cost = Rs.56250 x 20 = **1.125 million**

e). **Course Title:** Staff training in various office management & wildlife management areas

Location: Pakistan

Course Duration: Three to Five Working Days

Course Cost: Rs.37,500/- per person

Total Cost: Rs.37,500 x 60 = **2.250 million**

Cost of Capacity Buildings / Trainings = Rs.15.375 million

WORKSHOPS FOR CAPACITY BUILDING

Following Capacity Buildings Workshops would be conducted with the help of trainers

a). Title: Workshop on Integrated Wetland Management

Workshop Introduction:

Wetlands support a wide spectrum of globally important biodiversity that merits support from the international community to ensure its sustainable conservation. A significant fraction of Punjab's wetlands-dependent biodiversity is classified as endemic threatened and vulnerable in internationally recognized evaluations such as IUCN's Red Data Book. Furthermore, international conventions such as Ramsar have recognized the role that Pakistan's wetlands play in maintaining and sustaining regional ecological processes that support globally important biodiversity such as bird migration routes and wintering grounds. While the country is making efforts to conserve its wetlands, it is constrained in this task by lack of access to physical and financial resources and immediate political and economic problems.

Pakistan has demonstrated its fundamental commitment to biodiversity conservation in general and wetlands conservation in particular through its support for appropriate international conventions. The adoption of a Wetlands Action Plan in 2000 further illustrates the Government of Pakistan's recognition of the importance of wetlands and the need to find sustainable solutions for their conservation. After the 18th amendment the subject area 'wetlands' has become Provincial business and Punjab Wildlife & Parks Department being the main stakeholder has mandate to build the capacity of its staff for the effective management of wetlands of Punjab Province including globally significant RAMSAR sites.

Location: Lahore / Pakistan

Cost:

Sr. No.	Items of Work	Rate / Unit	Total
1	Boarding / Lodging charges of the Trainers	0.350	0.350
2	Air and local travel of guest speaker / Trainers	0.500	0.500
3	Charges of Venue including hall rent and tee/lunch for the participants	1.000	1.000
4	Honoraria for local guest speakers	0.200	0.200
5	Other (Contingencies)	0.200	0.200
Total:			2.250

b). Title: Workshop on Protected Areas Management

Workshop Introduction:

Wildlife and protected area management should aim to conserve native faunas together with their natural habitats and to improve the livelihoods of rural communities. Activities should include the preparation, publishing and dissemination of concepts, studies, policy recommendations, guidelines, best practices, and other educational resources; support to regional networks; design and implementation of field projects; the organization of and participation in technical workshops, expert meetings and information events; as well as capacity development and training.

With this back ground Punjab Wildlife & Parks Department has planned to build the capacity of its field staff in following areas under Protected Areas Management initiative:

- Ecotourism in protected areas
- wildlife policies and legislation for protected areas
- design and management of protected areas
- wildlife conservation and sustainable management
- impacts of climate change on wildlife and protected areas
- protected areas zonation
- protected areas boundary delineation
- disease dynamics at the human-wildlife-livestock-ecosystem interface

Location: Lahore / Pakistan

Cost:

Sr. No.	Items of Work	Rate / Unit	Total
1	Boarding / Lodging charges of the Trainers	0.350	0.350
2	Air and local travel of guest speaker / Trainer	0.500	0.500
3	Charges of Venue including hall rent and tee/lunch for the participants	1.000	1.000
4	Honoraria for local guest speakers	0.200	0.200
5	Other (Contingencies)	0.200	0.200
Total:			2.250

c). **Title:** Workshop on Capacity Building and Wildlife Surveys

Workshop Introduction:

Conservation activities including wildlife surveys are carried out by the officers and officials of the Punjab Wildlife & Parks Department throughout the year. But lack of technical capacity is one of the biggest constraints towards the standardization and publication of the outcome of these activities. A training is being planned by the Department for capacity building of officers and officials to standardize survey & census methods and publish research output in well reputed peer reviewed scientific journals.

Location: Lahore / Pakistan

Cost:

Sr. No.	Items of Work	Rate / Unit	Total
1	Boarding / Lodging charges of the Trainers	0.350	0.350
2	Air Travel and local travel of guest speaker / Trainer	0.500	0.500
3	Charges of Venue including hall rent and tee/lunch for the participants	1.000	1.000
4	Honoraria for local guest speakers	0.200	0.200
5	Other (Contingencies)	0.200	0.200
Total:			2.250

DEVELOPMENT OF WILDLIFE SURVEY / CENSUS FACILITIES AT DISTRICT LEVEL – PROVISION OF SURVEY & CENSUS AND I.T. EQUIPMENTS

Currently there is no system of Wildlife Survey / Census at District level. Some arrangements of wildlife survey / census are existed at PWRI, which normally conduct census of two or three wildlife species i.e. waterfowl partridges and Indus blind dolphins at an irregular intervals. Resultantly, no database is collected and maintained for future planning to meet the emerging challenges of rapidly depleting wildlife resources. Foregoing in view, it is proposed that a small facility of wildlife census / survey be established at District level to conduct regular survey / census of prevailing wildlife resources in the district. The data so collected would be compiled at district level and thereafter would be consolidated at provincial headquarters.

A list of equipment to strengthen the survey / census component of the Punjab Wildlife & Parks department with estimated cost is given in the following table.

Sr. No.	Items	Qty	Rate/ Unit	Total
1.	Binoculars Nikon 12x50 (1 in each District)	40	0.030	1.200
2.	Binoculars Nikon 16x50 (1 in each District)	40	0.040	1.600
3.	Tents Dome Shaped (2 to 3 Person)	40	0.045	1.800
4.	Kit Bags	40	0.010	0.400
5.	Hand torch	40	0.002	0.080
6.	First Aid Pouch	40	0.002	0.080
7.	Insulated Mug / Thermos	40	0.004	0.160
8.	Water Bottle, Stainless steel	40	0.003	0.120
9.	Measuring tape	40	0.001	0.040
10.	Rope Nylon	LS	LS	0.050
11.	Note books and pen	40	0.001	0.040
12.	Jacket	40	0.010	0.400
13.	Magnifying glass	40	0.001	0.040
14.	Sleeping Bags with Mattresses (3 in each District)	120	0.025	3.000
15.	GPS Receivers Garmin 64S or equivalent (1 in each District)	40	0.100	4.000
16.	DSLR Camera Canon D70 or equivalent with 400m lenses (1 in each Division) with memory cards and tripod stands	10	0.500	5.000
17.	Emergency lights, solar rechargeable	40	0.010	0.400
18.	Search light with bag and batteries	40	0.020	0.800
19.	Spotting Scopes 80x60 or higher with tripod stand (1 in each Division)	10	0.300	3.000
20.	Desktop Computers, Intel Core i7 7th Gen, 3.4 GHz, Cache 8 MB, 8 core, RAM 16 GB DDR4 dual channel 2133MHz, Hard Disk 1TB SATA HDD 7200rpm, 256-Bit Memory Interface 1xHDMI 1xDP, Multi-format DVD Writer or higher specs, with standard keyboard, mouse, LED 24" to 30", Printer A4, Scanner A4 and UPS 2 KVA with dry batteries, equivalent or above.	40	0.500	20.000
Total				42.210

ANNOTATED REPLY OF THE OBSERVATIONS OF PRE-PDWP MEETING

Observations	Reply / Compliance
1. Development and Improvement of Central GIS Laboratory at Head Office, Lahore ▪ A.D. may delete the cost of Rs.0.300 million for Color Printer HP Laser Jet and Rs.2.625 million for other (contingencies).	The color Laser Jet Printer has already been purchased during last year as per provision of approved version. Similarly, the provision of contingencies is also stands approved in original version. However, its amount has been increased to cater the requirement of extended period of project. Hence its deletion seems not feasible. The issue resolved in PDWP meeting and view point of the department accepted.
2. G.I.S. Nodes at Regional level ▪ A.D. may delete the cost of Rs.2.400 million for Color Printer HP Laser Jet and Rs.10.800 million for other (contingencies).	The supply order of colour Laser Jet Printers has also been issued after due process during current fiscal year as per provision of approved version. Similarly, the provision of contingencies is also stands approved in original version. However, its amount has been increased to cater the requirement of extended period of project. Hence its deletion seems not feasible. The issue resolved in PDWP meeting and view point of the department accepted.
3. Strengthening of Wildlife Protection Measures - Rehabilitation & Improvement of Wildlife Check posts, Logistics, and HR Support ▪ The static check posts have not impact on protection, conservation & propagation of wildlife. Further, cost of 28 Nos. of check posts, 56 motorcycles, and 112 Nos. of Wildlife Inspector & Watchers amounting to Rs.113.792 million, Rs.8.400 million, and Rs.127.922 million respectively may be deleted.	It is not true that the static check posts have no impact on wildlife protection, conservation and propagation. The check post would be constructed on the entry and exist points of potential habitat to check the poacher / illegal hunters. The wildlife check posts have played a vital role in the protection of wildlife. For instance, the number of Urials and Chinkara deers have been increased from hundred to thousands in Salt Range and Cholistan merely due to effective network of Check Posts and protection staff. Thus, the provision of proposed check posts along with allied protection staff is the bare minimum requirement to coup with the degraded status of wildlife in the respective areas. The Chairman, P&D Board appreciated the view point of the department and allowed the provision of checkposts. However, number of checkposts reduced / rationalized.

Observations	Reply / Compliance
4. Development of Ara-Basharat National Park (Proposal-I) ▪ The construction of Junction Complex (Sr. No. 6 at Page 59) at the cost of Rs. 335.924 million, the area may be rented for private business and cost may be deleted. ▪ The construction of Emergency Medical Centre (Sr. No. 8 at Page 59) at the cost Rs. 10.688 million may be deleted as there is no need for this centre. ▪ The construction of 50 Nos. of Check Post (Sr. No. 4 at Page 59) amounting to Rs.167.00 million may be deleted. ▪ The construction of security surveillance (Sr. No. 10 at Page 59) amounting to Rs.48.330 million may be deleted. ▪ The construction of residences (BS-1 to BS-20) amounting to Rs.197.210 million is not justified and may be deleted. ▪ A lump-sum amount of Rs.1037.679 million is mentioned for Establishment, Machinery & Equipment, Commodities and Services of Ara-Basharat National Park. AD may justify with details. Development of Ara-Basharat National Park (Proposal-II) ▪ The proposed facility is of commercial in nature keeping in view the limited capacity of the department and huge cost of Rs.3898.944 million. AD may establish in PPP mode.	The Ara-Basharat National Park would be established over an area of 32,904 acres. The civil works have been proposed according to the geographical coverage of the national park. The construction of junction complex, emergency medical facility, check posts, security system and staff residences are the basic requirement of a national park and do not compromised. The proposal for the construction of Junction complex of national park through private investment may not be a feasible preposition, since nobody would be ready to invest in a pre-project situation. However, on completion of basic infrastructures of the national park, some economic opportunities may be generated under private investment. The detail of establishment, machinery and equipments is attached with the project document. The Chairman, P&D Board appreciated the view point of the department and resolved the observations. However, facility has been rationalized as per the direction of PDWP. The establishment of national park primarily is not a commercial venture, rather its primary objective is to protect, preserve, conserve and manage the biodiversity of the area. Thus, the establishment of entire national park would not be feasible under PPP mode. However, some economic interventions may be explored after completion of park, through private investment. The PDWP rejected this observation.
5. Development of Kheri-Murat National Park ▪ P&D Board agreed with this component except procurement of 05 motorcycles. AD may delete this procurement of 05 motorcycles.	Agreed.
6. Development of Kahuta-Kotli Sattian National Park ▪ AD may delete this park amounting to Rs.167.020 million.	Deleted.

Observations	Reply / Compliance
7. Development of Model Wildlife Breeding Farm - P&D Board agreed with this component at the cost of Rs.969.372 million. 8. Construction of Hatchery in Muree for Supplementation and Propagation of Pheasants in respective ecological zone - P&D Board agreed with this component at the cost of Rs.123.765 million. - A lump-sum amount of 123.765 has been mentioned for Murree Hatchery. AD may mention the details of each component (Machinery & Equipment, Commodities).	Appreciated. Appreciated, the requisite detail of machinery, equipments and commodities is attached with the project document.
9. Improvement/Rehabilitation of Saidpur Hatchery - P&D Board agreed with this component at the cost of Rs.50.623 million. - It has been observed that a lump-sum amount has been mentioned for Murree Hills/Hatchery and Saidpur Hatchery. AD may mention the details of each component (Machinery & Equipment, Commodities)	Appreciated, the requisite detail of machinery, equipments and commodities is attached with the project document.
10. Construction of Pre-release Pens for Pheasants in Murree Hills P&D Board agreed with this component at the cost of Rs.52.243 million. AD may mention the details of each component (Machinery & Equipment, Commodities).	Appreciated, the requisite detail of machinery, equipments and commodities is attached with the project document.
11. Development of pre-release pen over 500 acre for reintroduction of blackbuck in Cholistan along with allied facility P&D Board agreed with this component at the cost of Rs. 159.403 million. AD may mention the details of each component (Machinery & Equipment, Commodities).	Appreciated, the requisite detail of machinery, equipments and commodities is attached with the project document.

Observations	Reply / Compliance
12. Impart training to Private Wildlife Breeding Farmers P&D does not agree with the upscale amount of Rs. 3.010 million for the Incentivized facilities to private breeding farms, AD may be allowed to carry out this activity with already approved funds amounting to Rs. 1.800 million in on-going approved PC-I.	Agreed and needful done.
13. Capacity Building of Officers / Officials through short training courses / exposure visits P&D does not agree with the upscale amount of Rs. 28.375 million. However, AD may be allowed to carry out this activity with already approved funds amounting to Rs. 15.375 million in on-going approved PC-I.	Agreed and needful done.
14. Workshops (03) on Wildlife Survey / Wetlands management / Protected areas management & Eco Internship Programme - AD may be allowed to carry out this activity with already approved funds amounting to Rs. 4.225 million in on-going approved PC-I. P&D does not agree with the upscale amount of Rs. 6.750 million. - Furthermore, P&D does not agree with the upscale amount of Rs. 15.985 million for the Eco-Internship Programme, AD may be allowed to carry out this activity with already approved funds amounting to Rs. 2.865 million in on-going approved PC-I. 15. Management of Captive Wildlife Stock - The Department intends to install the microchips in the captive stock of 14 wildlife zoo / safari parks but Administrative Department could not justify the benefits of these microchips as well as the cost of Rs. 48.000 Million meant for the purpose.	The PDWP resolved the observation by allowing the up-scaled provision. The management of Captive Wildlife stock is an approved intervention of the project. Originally 8-wildlife Parks/zoos have to be managed under this intervention, but due to up-scaling of the project, this facility has been extended to 14- wildlife parks/zoos. The management of captive wildlife stock through Micro-Chipping is the best international practices which play a vital role to address the issue of in-breeding among the captive stock through pedigree profiling as well gene pool classification. A brief note on in-breeding is already attached with the project document and may be perused at Annexure-P. The PDWP resolved the observation and allowed the intervention.

Observations	Reply / Compliance
16. Wildlife Sector Review & Formulation of Provincial Wildlife Conservation Strategy & Action Plan The department may not justify the upscale amount of Rs.18.00 million for the wildlife sector review analysis & development of Provincial wildlife policy, AD may be allowed to carry out this activity with already approved funds amounting to Rs. 5.250 million in on-going approved PC-I.	Agreed and needful done.
17. Development of Wildlife Survey / Census Facility at District level through provision of survey & IT equipment The department intends to purchase the huge equipment for the development of wildlife survey / census facilities at district level for day & night surveillance at the cost of Rs. 42.210 million, which is of no use as well as reliability is concerned. AD may opt for reliable methods & procedures for such services which is internationally reliable & recognized.	Development of Wildlife Survey / Census facility at District level is also an approved intervention of the project. This facility would serve as a basic feeding organ which will conduct field survey to study population dynamics of various wildlife species, habitat trends, threats to natural resources etc. and upload real time data to their respective regional nodes for informed decisions and management planning. This facility has been up-scaled mere with the provision of one desktop computer at each District Office. The PDWP accepted the view point of the department and resolved the observation.
18. Mass Awareness Programme P&D Board does not agree with the upscale amount of Rs. 27.560 million, AD may be allowed to carry out this activity with already approved funds amounting to Rs. 11.100 million in on-going approved PC-I.	The PDWP allowed the up-scaled provision for mass awareness programme.
19. Project Management Unit Cost of Rs. 17.500 million for contingent paid staff in PMU may be deleted from the PC-I (Page 39).	The Project Management Unit has to implement the programme all most in entire Punjab at difficult geographical locations with one Project Director and 8-supporting staff. Therefore, the need of contingent paid staff would necessarily arise to manage different interventions at remote areas. Anyhow, financial provision has been rationalized and reduced to Rs.10.000m i.e. 2-million for each year. It may be mentioned here that this amount would only meet the cost of about 7-contingent paid staff.

Observations	Reply / Compliance
▪ Repair and Maintenance of Machinery and Equipment amounting to Rs. 20.00 million may be deleted. ▪ AD may rationalize the cost of Rs.24.500 million for Repair and Maintenance of vehicle. However, P&D agreed at the cost of Rs. 0.500 million ▪ Procurement of 02 motorcycles amounting to Rs.0.300 million is not justified. AD may delete this from revised PC-I. ▪ AD may be allowed to utilize funds of others head from already approved funds amounting to Rs 1.325 million in on-going approved PC-I.	Similarly, the provision of repair & maintenance of machinery and equipments has also been rationalized and reduced from Rs.20.000m to Rs.10.000m which is the bare minimum requirement. The PDWP accepted the view point of the department and accepted the reduced provision. The provision of repair & maintenance charges for vehicles has also been rationalized and reduced from Rs.24.500m to Rs.10.000m which is the bare minimum requirement. The provision of 2-motor cycles is the bare minimum requirement for PMU staff which has to visit different offices frequently at provincial headquarter. The PDWP accepted the view point of the department and resolved the observations.



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Chairman
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Government of Pakistan
Lahore

Microchipping of animals in captive facilities

10th March 2019

Dear Sir,

Thank you for involving WWF – Pakistan about the microchipping of animals in captive facilities as part a Project titled Green Pakistan Programme - Revival of Wildlife Resources in Punjab. WWF Pakistan recommends and consents to this proposed component. It is a very common practice to microchip animals in zoos internationally and WWF – Pakistan would certainly support such an initiative.

We would also like to recommend the following recommendations are incorporated into the the proposal

- international protocols tagging must be followed, which include standardised location of microchipping, which is variable according the species being tagged
- the zoo should ensure that micro-chipping data is accurately maintained so that they help in maintaining animal information whilst incorporating breeding data to control inbreeding and maintaining genetically fit zoo population. and using such information for better management of animals
- Ensure that zoo provides proper training to its relevant staff to microchip animals, inappropriate microchipping is useless and chip can be easily lost.

We look forward to supporting this initiative and hope that it will contribute to the better management of the zoo as well as contributing to the efforts to curb illegal wildlife trade in the country.

Best regards,

Rab Nawaz
Senior Director – Programmes
WWF Pakistan

C.c Director General, Punjab Wildlife and Parks Department
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**ANNOTATED REPLY / COMPLIANCE STATUS ON THE MINUTES / DECISIONS OF THE CONSULTATIVE MEETING
HELD ON 28.05.2019 REGARDING PC-I SCHEME “GREEN PAKISTAN PROGRAMME – REVIVAL OF WILDLIFE
RESOURCES IN PUNJAB”**

Sr. No.	Observations	Reply / Compliance
1.	Gestation period is 8 years may be standardized.	As desired, gestation period has been reduced till 30.06.2023.
2.	No. of direct / indirect jobs being generated.	About 350 direct jobs opportunities would be created, whereas more than 1000 indirect jobs opportunities would be created.
3.	Cost break-up of ADP and PSDP is missing.	Agreed and attached with the PC-I Scheme at Appendix-VIII at page 45-A.
4.	List of species and habitats being benefitted by this programme.	The list of habitats and Wildlife species that would be benefitted by this project is attached as Annexure-Z-6 at page 195.
5.	Separate PMU must be established. Project Director must possess the qualification and experience of Wildlife or Zoology.	Establishment of separate Project Management Unit (PMU) is already included in PC-I scheme at page -43 (appendix-VI). The department needs a project management expert with relevant qualification and experience. However as agreed, Wildlife Management expert has also included in the potential list of requisite experts / TORs.
6.	What is the status of Ara-Basharat National Park, (Notified / Un-notified). Lal Suhanra National Park is the oldest National Park and only UNESCO notified Biosphere Reserve. Therefore, Lal Suhanra National Park may be improved.	As per decision, Ara-Basharat National Park will be notified before the start of the project.
7.	Imparting training to Private Wildlife Breeding Farmers, it is ascertained that private sector is in this field for profit incentive instead of training to them subsidized medicine for wildlife may be provided to them.	It was explained in the meeting that provision of subsidized medicine to Private Wildlife Breeding Farmers does not fall in the purview of this Department. Therefore, training to Private Wildlife Breeding Farmers with regard to farm management, breeding techniques, sex ratio, habitat management, feed / nutrition management and animal health cover has been provided in the project, which is fully justified.
8.	Second, a programme may be initiated so that partnership could be developed with private farmers and they may be provided species which are near to extinction for breeding and after successful reproduction these species could be set free in wild.	D.G. Wildlife explained that private farmers are have profit motives and might not be supportive in the programme. However, it is suggested by the representative from PDR that such support shall help in breeding of rare species and may abet the poaching of wild animals. Therefore, breeding of rare species i.e. Blackbuck in Cholistan and Kaleej Pheasants in their respective habitat has been incorporated in the project for their ultimate release in the wild.
9.	Academia may be taken on board and research studies may be conducted and support should be solicited.	Agreed, the provision to collaborate with Academia, Universities, NGO, INGO to promote research on Biodiversity conservation has already been provided in the project, page No.42 of the PC-I is referred.

Sr. No.	Observations	Reply / Compliance
10.	Annexure-E pages 64/PC-I Conservancy and Works before start of work EPA Punjab should be consulted for IEA/EIA of the activities. Second PRA tax (Rs.81.885m) may be removed from the cost because the project is 50:50% cost sharing basis and Punjab Regulatory Authority of Chief Minister may be approached for exemption as wildlife is a neglected component. Development of Wetland is appreciated however it may be intimated how many new Ramsar sites will be notified?	The view point regarding levy of PRA tax explained by the department was agreed by the chair. However, since the PRA tax is levied by the provincial government on infrastructure components, the matter of exemption of PRA tax shall be brought into the notice of Chief Minister Punjab.
11.	The requirement of equipment & machinery for the development and improvement of Central GIS laboratory at head office Lahore seems to be overstretched. The equipment may be rationalized. The cost of the equipment may also be rationalized.	It was explained that Punjab Wildlife & Parks and Forests are two separate departments and their functions are different with each other. Therefore, a separate GIS Lab is necessary for each department.
12.	As a comprehensive GIS lab is being developed under this project any component included in the forestry project should be removed. The lab should provide all the services required by both the projects.	Further, the central GIS Lab has already stands established at the Head Office of Wildlife Department.
13.	The project PC-I states the development of GIS nodes. There is no further information on how many will be established and where they will be established. There is no standard equipment per node described.	Similarly work stations at 6-Nos. Regional Nodes located at Rawalpindi, Salt Range, Sahiwal, Faisalabad, D.G.Khan and Bahawalpur also stands completed. Whereas necessary equipments i.e. Computers Servers, Printers and other hardwares of all Regional Nodes also stands procured. The rest of two Regional Nodes would be established at Gujranwala and Sargodha. It is also clarified that each node would be consisted of standard set of equipments. The requisite detail of equipments has already been given in PC-I Scheme at page 9 to 12. The Cost of equipments also stands rationalized during scrutiny at PDWP level.
14.	Key activities stated on page 15 of the project does not give any activity for direct saving or rejuvenation of any animal species.	As decided and agreed during the meeting, proper fee structure would be introduced for visiting the National Parks to be established under this programme after approval by competent authority. Similarly, the matter with regard to creating Endowment Fund would also be processed with the quarter concerned.
15.	Wild pheasants will be bred and released in the wild in Murree and other areas. The project should include measures to keep the population safe as the areas like Clifton camp and others under the watch of Armed forces does not allow any hunting same should be implemented in all the forest area.	As decided and agreed, work on behavior change by taking religious leaders on board and awareness campaign would be launched. Necessary provision has been incorporated in the PC-I scheme at page-42.
16.	Wildlife sector Review and PWCS should be funded from ADP only.	Agreed. Wildlife Sector Review and PWCS would be undertaken through ADP funds.
17.	Exposure visits.	As decided, exposure visits have been incorporated in the PC-I scheme (page-44) and would be charged under federal component.

**LIST OF WILDLIFE SPECIES AND HABITATS LIKELY TO BE
BENEFITED BY THIS PROGRAMME**

NAME OF HABITAT	WILDLIFE SPECIES
• Coniferous habitat • Tropical deciduous habitat • Dry sub-tropical habitat • Tropical thorn habitat • Sand dunes desert scrub habitat • Riverine habitat / Wetlands • Agriculture habitat • Urban habitat	Common leopard, Rhesus monkey, Yellow throated marten, Honey badger , Hill fox, Wolf, Monogoose, Barking deer, Goral, Flying squirrel, Leopard cat, Kaleej pheasants, Chukor, Grey and Black partridges Punjab urial, Chinkara, Blackbuck, Nilgai, Wild boar, Jungle cat, Hog deer, Scaly ant-eater, Snakes of different kinds, Black buck, Desert fox, Caracal cat, Great Indian bustard, Houbarabustard, Indian python, Cobra, Krait, Indus blind dolphin, Fishing cat, Waterfowls Quails, Small mammals, Song birds, Reptile and amphibians