

RESEARCH NOTE

BIRD RECORDS FROM SIMBALBARA WILDLIFE SANCTUARY, HIMACHAL PRADESH

Introduction

The Shivalik landscape (29° 57' to 31° 20' N Lat. and 77° 35' to 79° 20' E Long.), which is also called the sub-Himalaya, is aligned more or less parallel to Himalayas. The climate of this region is tropical and sub-tropical in nature. The accessibility of the region makes it vulnerable to anthropogenic disturbances. The present study aimed to study the bird species composition and richness in the area.

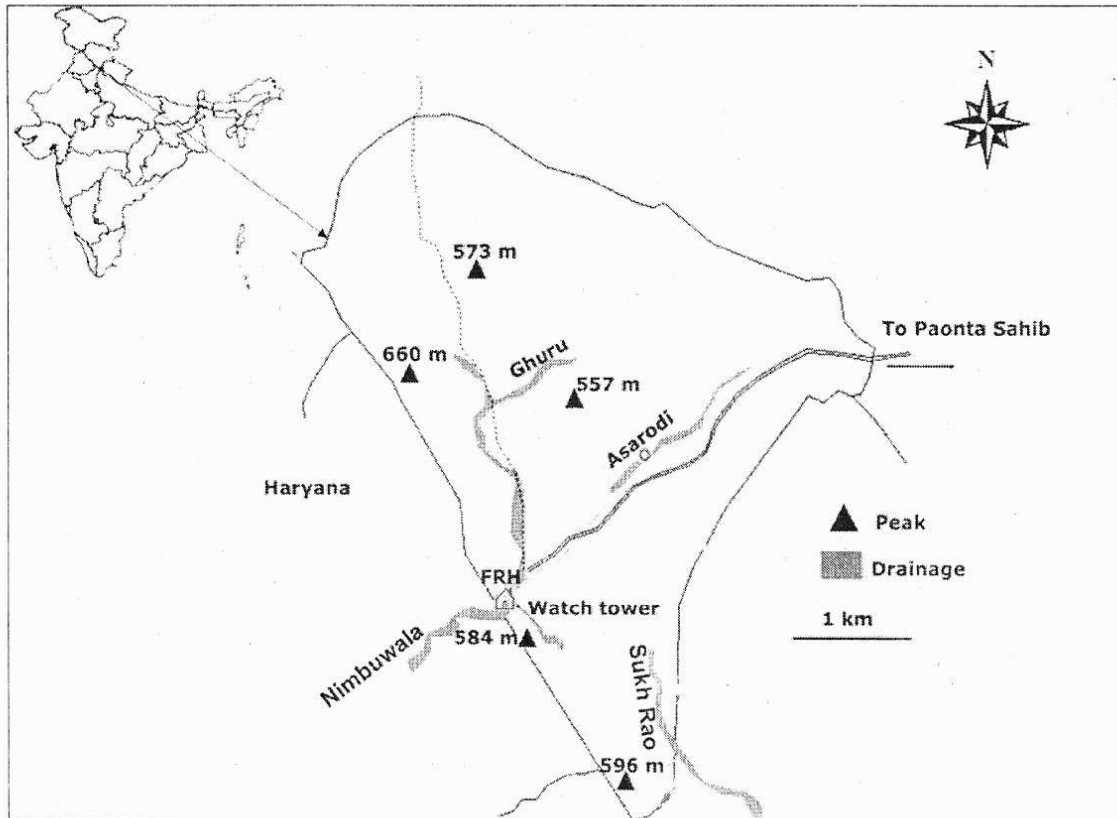
Simbalbara Wildlife Sanctuary (SWLS)

Topography : The SWLS (30° 24' 21" to 30° 28' 13" N Lat., 77° 27' 18" to 77° 31' 26" E. Long.) is located in the Paonta valley, which is considered the western limit of sal (*Shorea robusta*) in India (Fig. 1). The sanctuary is uninhabited, although it has about 35 villages bordering it along its South and South-western periphery. It covers an area of 19.03 km². Prior to its notification in 1958, Simbalbara sanctuary was a hunting reserve of the former Maharajah of Sirmour (Singh *et al.*, 1990). The area is representative of the lower Shivalik region and lies in the boundary of the Haryana plains and the main Shivalik system. The flora, fauna and topography show affinities to Western Himalaya, Punjab Plains and Upper Gangetic plains. It is present in the biogeographic province 4A (Rodgers and Panwar, 1988). The altitudinal range is about 350 m to 700 m above msl. Temperature ranges from 10° C

to 46° C with a mean annual rainfall of 1,260 mm. The relative humidity varies from 100% during monsoon to 26% in summer (Singh *et al.*, 1990). The hills are composed of unconsolidated sandstone and conglomerate that are extremely prone to erosion. The soil is extremely porous and thereby highly drained.

Vegetation : The vegetation of the Shivalik hills is characterized by sal, mixed deciduous forest, grassy slopes, riverine khair sissoo (*Acacia catechu*, *Dalbergia sissoo*), degraded scrub, pine forests, and subtropical dry evergreen forests. The forests of SWLS may be described as moist sal-bearing forests (3C/C2) and northern dry mixed deciduous forests (5B/C2), according to Champion and Seth (1968). Apart from these two major types, there are *Eucalyptus*, mixed woodlands and riverine forests. Plantations of *Tectona grandis*, *Eucalyptus* sp., Poplar sp. and Bamboo exist as patches. Other than Sal, the forests have a canopy formed by species like *Terminalia alata*, *Grewia* sp., *Ougeinia oojeinensis*, *Ehretia laevis*., *Syzygium* sp. and *Buchanania latifolia*. The middle layer often consists of *Mallotus philippinensis*, *Cassia fistula*, *Zizyphus* sp., *Aegle marmelos* and *Pyrus pashia*. The shrub layer has plants like *Murraya* sp., *Colebrookia oppositifolia*, *Lantana camara*, *Carrisa carandus*, *Flacourtia* sp., *Flemingia* sp., etc in addition to saplings of *Mallotus philippinensis* and *Cassia fistula*.

Fig. 1



Simbalbara Wildlife Sanctuary, Himachal Pradesh.

Methods

The study was carried out during winter and summer (2004-06). Thirteen transects, 300-500 m in length were laid in three different habitat types, i.e. four in *Eucalyptus* plantations, three in *Eucalyptus*-sal mixed forests and six in sal dominant forests. The distance between individual transects was least 1 km to maintain spatial independence. Birds were noted during transect walks between 0630 hrs and 0800 hrs. Identification of birds was carried out using relevant reference books

on avi-fauna of Indian sub-continent (Ali and Ripley, 1996; Kazmierczak, 1999; Grimmet *et al.*, 1999).

Observations

As many as 117 species were recorded from the study area. Seasonal changes in the composition of the birds of the Shivalik are very evident. Most high altitude birds are known to migrate to lower altitudes during winter. Sixty three bird species were recorded only in winter and 88 species in summer (Table 1).

Table 1
 Checklist of Birds of Simbalbara Wildlife Sanctuary, Himachal Pradesh

Sr. No.	Order	Family	Scientific name	Common name	Winter	Summer
1	2	3	4	5	6	7
1.	Galliformes	Phasianidae	<i>Gallus gallus</i>	Red Junglefowl	*	*
2.			<i>Lophura leucomelanos</i>	Kalij Pheasant		*
3.			<i>Pavo cristatus</i>	Indian Peafowl	*	*
4.	Piciformes	Picidae	<i>Dendrocopos canicapillus</i>	Grey-capped pygmy Woodpecker	*	*
5.			<i>Dendrocopos macei</i>	Fulvous-breasted Woodpecker	*	*
6.			<i>Chrysocolaptes lucidus</i>	Greater Flameback	*	*
7.		Megalaimidae	<i>Megalaima zeylanica</i>	Brown-headed Barbet		*
8.	Bucerotiformes	Bucerotidae	<i>Anthracceros albirostris</i>	Oriental Pied Hornbill	*	*
9.			<i>Ocyeros birostris</i>	Indian Grey Hornbill	*	*
10.	Upupiformes	Upupidae	<i>Upupa epops</i>	Common Hoopoe	*	*
11.	Coraciiformes	Coraciidae	<i>Coracias benghalensis</i>	Indian Roller		*
12.		Alcedinidae	<i>Alcedo atthis</i>	Common Kingfisher		*
13.		Halcyonidae	<i>Halcyon capensis</i>	Stork-billed Kingfisher	*	*
14.			<i>Halcyon smyrnensis</i>	White-throated Kingfisher	*	*
15.		Cerylidae	<i>Megaceryle lugubris</i>	Crested Kingfisher	*	*
16.		Meropidae	<i>Merops orientalis</i>	Green Bee-eater		*
17.			<i>Merops leschenaulti</i>	Chestnut-headed Bee-eater		*
18.	Cuculiformes	Cuculidae	<i>Cuculus canorus</i>	Eurasian Cuckoo		*
19.			<i>Cuculus micropterus</i>	Indian Cuckoo		*
20.			<i>Eudynamys scolopacea</i>	Asian Koel		*

Contd...

1	2	3	4	5	6	7
21.			<i>Hierococyx varius</i>	Common Hawk Cuckoo		*
22.			<i>Oxylophus jacobinus</i>	Pied Cuckoo	*	
23.			<i>Surniculus lugubris</i>	Drongo Cuckoo		*
24.		Centropodidae	<i>Centropus sinensis</i>	Greater Coucal		*
25.	Psittaciformes	Psittacidae	<i>Psittacula cyanocephala</i>	Plum-headed Parakeet	*	*
26.			<i>Psittacula krameri</i>	Rose-ringed Parakeet	*	*
27.	Strigiformes	Strigidae	<i>Glaucidium cuculoides</i>	Asian Barred Owllet	*	*
28.			<i>Glaucidium radiatum</i>	Jungle Owllet		*
29.			<i>Ninox scutulata</i>	Brown Hawk Owl		*
30.			<i>Otus sunia</i>	Oriental Scops Owl		*
31.		Caprimulgidae	<i>Caprimulgus macrurus</i>	Large-tailed Nightjar		*
32.			<i>Caprimulgus indicus</i>	Grey Nightjar		*
33.			<i>Caprimulgus asiaticus</i>	Indian Nightjar		*
34.	Columbiformes	Columbidae	<i>Chalcophaps indica</i>	Emerald Dove		*
35.			<i>Columba livia</i>	Blue Rock Pigeon	*	*
36.			<i>Streptopelia chinensis</i>	Spotted Dove		*
37.			<i>Streptopelia decaocto</i>	Eurasian Collared Dove		*
38.			<i>Streptopelia orientalis</i>	Oriental Turtle Dove		*
39.			<i>Treron phoenicoptera</i>	Yellow-footed Green Pigeon		*
40.	Ciconiiformes	Charadriidae	<i>Charadrius dubius</i>	Little-ringed Plover		*
41.			<i>Vanellus diwaucelii</i>	River Lapwing	*	
42.			<i>Vanellus indicus</i>	Red-wattled Lapwing	*	*
43.		Accipitridae	<i>Accipiter badius</i>	Shikra		*
44.			<i>Aquila vindhiana</i>	Tawny Eagle		*
45.			<i>Cypus indicus</i>	Long-billed Vulture	*	
46.			<i>Haliastur indus</i>	Brahminy Kite		*

Contd...

1	2	3	4	5	6	7
47.			<i>Neophron percnopterus</i>	Egyptian Vulture	*	*
48.			<i>Spilornis cheela</i>	Crested Serpent Eagle	*	*
49.	Falconidae		<i>Falco tinnunculus</i>	Common Kestrel	*	*
50.	Ardeidae		<i>Egretta garzetta</i>	Little Egret	*	*
51.			<i>Bubulcus ibis</i>	Cattle Egret	*	*
52.			<i>Nycticorax nycticorax</i>	Black-crowned Night Heron		*
53.	Passeriformes	Pittidae	<i>Pitta brachyura</i>	Indian Pitta		*
54.		Irenidae	<i>Chloropsis aurifrons</i>	Golden-fronted Leafbird		*
55.		Corvidae	<i>Aegithina tiphia</i>	Common Iora		*
56.			<i>Coracina melanoptera</i>	Black-headed Cuckooshrike		*
57.			<i>Corvus macrorhynchos</i>	Large-billed Crow		*
58.			<i>Dendrocitta formosae</i>	Grey Treepie	*	*
59.			<i>Dendrocitta vagabunda</i>	Rufous Treepie	*	*
60.			<i>Dicrurus caerulescens</i>	White-bellied Drongo		*
61.			<i>Dicrurus hottentottus</i>	Spangled Drongo	*	*
62.			<i>Dicrurus macrocerus</i>	Black Drongo	*	*
63.			<i>Hemipus picatus</i>	Bar-winged Flycatcher-shrike	*	*
64.			<i>Oriolus traillii</i>	Maroon Oriole	*	*
65.			<i>Oriolus xanthornus</i>	Black-Hooded Oriole	*	*
66.			<i>Pericrocotus cinnamomeus</i>	Small Minivet		*
67.			<i>Pericrocotus ethologus</i>	Long-tailed Minivet	*	*
68.			<i>Pericrocotus flammeus</i>	Scarlet Minivet	*	*
69.			<i>Rhipidura albicollis</i>	White-throated Fantail	*	*
70.			<i>Rhipidura aureola</i>	White-browed Fantail		*
71.			<i>Rhipidura hypoxantha</i>	Yellow-bellied Fantail	*	*
72.			<i>Tephrodornis gularis</i>	Large Woodshrike	*	*

Contd...

1	2	3	4	5	6	7
73.			<i>Tephrodornis pondicerianus</i>	Common Woodshrike		*
74.			<i>Terpsiphone paradisi</i>	Asian Paradise-flycatcher		*
75.			<i>Uroissa erythrorhyncha</i>	Red-billed blue Magpie		*
76.	Muscicapidae		<i>Chaimarrornis leucocephalus</i>	White-capped Water Redstart	*	
77.			<i>Copsychus malabaricus</i>	White-rumped Shama		*
78.			<i>Copsychus saularis</i>	Oriental Magpie Robin		*
79.			<i>Culicicapa ceylonensis</i>	Grey-headed Canary Flycatcher	*	
80.			<i>Cyornis rubeculoides</i>	Blue-throated Flycatcher		*
81.			<i>Cyornis tickelliae</i>	Tickell's Blue Flycatcher		*
82.			<i>Ficedula parva</i>	Red-Throated Flycatcher	*	
83.			<i>Myophonus caeruleus</i>	Blue Whistling Thrush	*	
84.			<i>Niltava macgrigoriae</i>	Small Niltava	*	
85.			<i>Niltava sundara</i>	Rufous-bellied Niltava	*	
86.			<i>Rhyacornis fuliginosus</i>	Plumbeous Water Redstart	*	
87.			<i>Saxicola caprata</i>	Pied Bushchat	*	
88.			<i>Turdus boulboul</i>	Grey-winged Blackbird	*	
89.			<i>Zoothera citrine</i>	Orange-headed thrush	*	
90.	Sturnidae		<i>Acridotheres tristis</i>	Common Myna		*
91	Sittidae		<i>Sitta himalayensis</i>	White-tailed Nuthatch		*
92.	Certhiidae		<i>Tichodroma muraria</i>	Wallcreeper	*	
93.			<i>Certhia himalayana</i>	Bar-tailed Treecreeper	*	
94.	Paridae		<i>Parus major</i>	Great Tit	*	
95.	Hirundinidae		<i>Hirundo smithii</i>	Wire-tailed Swallow		*
96.	Pycnonotidae		<i>Hypsipetes leucocephalus</i>	Black Bulbul	*	
97.			<i>Pycnonotus cafer</i>	Red-vented Bulbul	*	
98.			<i>Pycnonotus leucogenys</i>	Himalayan Bulbul	*	

Contd...

1	2	3	4	5	6	7
99.			<i>Pycnonotus melanicterus</i>	Black-crested Bulbul		*
100.	Cisticolidae		<i>Prinia hodgsonii</i>	Grey-breasted Prinia		*
101.	Zosteropidae		<i>Zosterops palpebrosus</i>	Oriental White-eye	*	*
102.	Sylviidae		<i>Acrocephalus dumetorum</i>	Blyth's Reed Warbler		*
103.			<i>Orthotomus sutorius</i>	Common Tailorbird	*	*
104.			<i>Pellorneum ruficeps</i>	Puff-throated Babbler		*
105.			<i>Phylloscopus maculipennis</i>	Ashy-throated Warbler	*	*
106.			<i>Seiurus burkii</i>	Golden-spectacled Warbler	*	*
107.			<i>Seiurus xanthoschistos</i>	Grey-hooded Warbler	*	*
108.			<i>Turdoides striatus</i>	Jungle Babbler	*	*
109.	Nectariniidae		<i>Aethopyga siparaja</i>	Crimson Sunbird	*	*
110.			<i>Dicaeum agile</i>	Thick-billed Flowerpecker		*
111.			<i>Dicaeum concolor</i>	Plain Flowerpecker		*
112.			<i>Nectarinia asiatica</i>	Purple Sunbird		*
113.	Passeridae		<i>Motacilla alba</i>	White Wagtail	*	*
114.			<i>Motacilla cinerea</i>	Grey Wagtail	*	*
115.			<i>Motacilla maderaspatensis</i>	White-browed Wagtail	*	*
116.			<i>Passer domesticus</i>	House sparrow	*	*
117.			<i>Petronia xanthocollis</i>	Chestnut-shouldered Petronia		*
					63	88

Acknowledgments

The authors are thankful to the Wildlife Wing, Himachal Pradesh Forest Department for giving necessary permission and logistic support to carry out the study. Director, Dean and Prof. P.K. Mathur, Wildlife Institute of India, Dehra Dun are acknowledged for necessary support and guidance. Thanks are due to the Department of Science and Technology (SERCDST), Government of India, for financial assistance to conduct the study.

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