

Rec. zool. Surv. India: 115(Part-4): 405-409, 2015

LONGHORN BEETLES (CERAMBYCIDAE: COLEOPTERA) OF HIMACHAL PRADESH

BULGANIN MITRA#, AMITAVA MAJUMDER, UDIPTA CHAKRABORTI, PRIYANKA DAS AND KAUSHIK MALLICK*

Zoological Survey of India, Prani Vigyan Bhavan, M-Block, New Alipore, Kolkata-700 053, West Bengal, India.

* Post Graduate Department of Zoology, Asutosh College, Kolkata – 700026 #Corresponding author. E-mail: bulganinmitra@gmail.com

INTRODUCTION

taxonomic study The of the family cerambycidae is very poor in Himachal Pradesh. Contributions of Breuning (1937, 1958, 1965), Beeson and Bhatia (1939), Basak and Biswas (1993), Mukhopadhyay (2011), Saha et al. (2013) were enriched the cerambycid fauna of this state. Later, few publications were made on other aspects than taxonomy of cerambycidae by Unival and Mathur (1998), Singh, and Verma (1998), Bhargava and Unival (2011). Therefore, an attempt has been taken to prepare a consolidated taxonomic account of the cerambycid species reported from the Himachal Pradesh. After consulting all the available literatures on Cerambycidae of India it is enumerate that, 37 species under 27 genera of 17 tribes belonging to 4 subfamilies of Crambycidae were reported from this state.

Present communication reports three species for the first time from Himachal Pradesh. Among the three new records of cerambycid beetles of Himachal Pradesh, two species were reported from the old collections of National Zoological collections of Zoological Survey of India and *Batocera parryi* (Hope, 1845) was recently collected by one of the authors from Solan.

This communication provides a consolidated list of reported species from Himachal Pradesh along with their current scientific names and a complete bibliography on the works of cerambycid beetles of this Himalayan state in India.

Subfamily LAMIINAE

Tribe ANCYLONOTINI Lacordaire, 1869

1. Palimnodes ducalis (Bates, 1884)

- 1884. Apalimna ducalis Bates, The Journal of the Linnean Society of London. Zoology, 18: 242. Type Locality: North India, Type Repository: Muséum National d'Histoire Naturelle, Paris.
- 2006. Parapalimna ducalis; Weigel, Biodiversität und Naturausstattung im Himalaya, II. V: 503.

Material examined: 1 ex, Kulu, Himachal Pradesh, 07.08.1913, coll. G.C.L Howell

Description: Body medium size, robust, elongate, ornamented with bands, patches and spots of dull white pubescence, head vertical, frons elongate, rectangular parallel sided, clothed with dense whitish yellow pubescence, vertex wide, depressed at the bases of antenna, three bands of pale black, pale yellow and dark black at the base and a band of dull black pubescence along the lateral side of the head to the posterior lobe of eyes; eyes black, large, finely faceted, anterior lobe large; antenna 11-segmented, much longer than body, all the segments basally white, apically dark black, widened apically and thickened with pubescence, segment-1 small, robust, segment-3 longest; pronotum elongate, densely pubescent, transverse, warty, anterior angle with spine, middle of the pronotum black with two small hump; scutellum elongate broadly `U' shaped, blackish with dull yellowish pubescence, anterolateral angles strongly warty; elytra basally brown, elongate, gradually narrowed towards apex, densely covered with dull white pubescence and decorated with dark yellowish brown and black irregular, broad patches, a big dark yellowish brown patch near the scutellum, shoulder hump strongly marked by warts and blunt tubercles, coarsely punctate, acute humps are present on the middle of elytra along the sutural line; venter brown covered with silky dull yellow pubescence, lateral side marked with black marking, coxal cavities open, prosternal plate narrow, widened basally, depressed in between the coxae, two bright vellow patches on fore coxae, mesosternal plate wide; legs black, robust, elongate, densely clothed with dull white pubescence leaving few bare areas marked by patches of black, claws more than 90° angle.

Distribution: India: Himachal Pradesh (Kulu), North India. *Elsewhere*: China, Vietnam, Laos, Bhutan, Burma, Nepal.

Tribe BATOCERINI Thomson, 1864

2. Apriona germari (Hope, 1831)

- 1831. Lamia germari Hope, Gray's Zoologica Miscellanea,
 1: 28 Type Locality: Nepal, Type Repository: Hope Department of Entomology, Oxford University Museum of Natural History.
- 2011. Apriona germari; Jiroux, Les Cahiers Magellanes (NS), 5: 69, figs. 161-166.

Material examined: 1 ex, Solan, Himachal Pradesh, 12.07.1967, coll. O.B. Chotani.

Description: Body large, dark brown, densely covered with yellowish pubescence, head vertical densely covered with yellowish pubescence, frons and gena small; antenna finely covered with pubescence base yellowish paler towards apex, first segment broad globular apex finely rugose, third segment longest; pronotum irregularly wrinkled, lateral side with single acute spine; elytra densely covered with yellowish pubescence without any marking, humerus warty, apex minutely spined; venter densely covered with yellowish pubescence, antenna cleaner on underside of protibia, tarsal claw less than 90 degree.

Distribution: India: Himachal Pradesh (Solan), Uttar Pradesh, Jammu and Kashmir, Manipur, West Bengal, Meghalaya, Sikkim. *Elsewhere*: Afghanistan, Pakistan, Nepal, Bangladesh, China, Korea, Japan, Vietnam, Thiland.

3. Batocera parryi (Hope, 1845)

- 1845. Lamia Parryi Hope, Transactions of the Entomological Society of London, 4(1): 77, Type Locality: Syleth, Bangladesh Type Repository: Hope Department of Entomology, Oxford University Museum of Natural History.
- 2012. Batocera parryi; Perger & Vitali Les Cahiers Magellanes, (NS) 7: 11,15, fig. 24,25.

Material examined: 1 ex, Solan, Himachal Pradesh, 12.07.2015, coll. Priyanka Das.

Description: Body large blackish brown, sparsely covered with pale yellowish pubescence, head vertical, densely covered with minute yellow pubescence, frons and gena small; antenna longer than body, all segments with minute apical spines, underside with series of minute spines more on the third segment, first and third segment densely rugose, first segment with apical cicatrix, third longest, almost twice in size of the subsequent segments; middle of the pronotum with two semi bilobed yellowish markings, lateral sides with single large acute spine, base and the front of the pronotum with some wavy ridges; scutellum tongue shaped, covered with whitish pubescence; elytra with four prominent globular markings, almost equal in size and distance, humerus densely warty, elytral apex with a minute spine; ventral side brown, a long yellowish white band starting from behind of eyes to the last abdominal segment along the humeral angle, pro tibia and femur densely rugose and minutely spined below, tarsal claw less than 90°.

Distribution: India: Himachal Pradesh (Solan), Arunachal Pradesh, Assam, *Elsewhere*: Myanmar, Vietnam, Malaysia, Indonesia, Java, Bangladesh, China.

Sl.	Таха	Older names as published/ identified	References		
110.	Subfamily SPONDYLIDINAE				
Tribe ASEMINI Thomson 1860					
1	Tetropium oreinum Gahan, 1906		8		
2	Arhopalus tibetanus (Sharp, 1905)	Criocephalus tibetanus Sharp, 1905	3		
	Subfamily PRIONINAE				
	Tribe CANTHAROCNEMINI Thomson, 1861				
3	<i>Cantharocnemis (Cantharoprion) downesii</i> Pascoe, 1858		4		
	Tribe PRIONINI	Latreille, 1802			
4	Dorysthenes (Lophosternus) huegelii (Redtenbacher, 1848)		4,8,12		
5	Dorysthenes (Lophosternus) indicus (Hope, 1831)		4		
	Subfamily CERA	MBYCINAE			
	Tribe CALLIDIOPIN	I Lacordaire, 1868			
6	Ceresium flavipes (Fabricius, 1793)	<i>Ceresium simplex</i> (Gyllenhal in Schoenherr, 1817)	4		
Tribe CERAMBYCINI Latreille, 1802					
7	Aeolesthes holosericea (Fabricius, 1787)		4		
8	Aeolesthes indicola (Bates, 1891)		3		
9	Aeolesthes induta (Newman, 1842)		4		
10	Aeolesthes sarta (Solsky, 1871)		12		
11	Derolus volvulus (Fabricius, 1801)	Derolus demisus (Pascoe, 1906)	3,4		
12	Hoplocerambyx spinicornis (Newman, 1842)		4		
13	Neoplocaederus pedestris (White, 1853)	Plocaederus pedestris	4		
14	Neoplocaederus obesus (Gahan, 1890)	Plocaederus obesus	1,4		
15	Pachydissus parvicollis Gahan, 1891		4		
Tribe CLYTINI Mulsant, 1839					
16	Chlorophorus annularis (Fabricius, 1787)		3		
17	Xylotrechus subscutellatus Chevrolat, 1863		4		
	Tribe CALLIDIOPIN	Lacordaire, 1868			
18	Trinophylum cribratum Bates, 1878		4		
	Tribe HESPEROPHANINA Mulsant, 1839				
19	Stromatium barbatum (Fabricius, 1775)		4		
	Tribe PYRESTINI I	Lacordaire, 1869			
20	Pyrestes pyrrhus Gahan, 1906		4		

Table 1. List of cerambycid beetles of Himachal Pradesh

Table 1. contd.

Sl. No.	Таха	Older names as published/ identified	References cited		
Tribe XYSTROCERINI Blanchard, 1845					
21	Xystrocera globosa (Olivier, 1795)		4		
	Subfamily LAMIINAE				
	Tribe APOMECYNINI Lacordaire, 1872				
22	Apomecyna saltator (Fabricius, 1787)	Apomectra pertigera	12		
	Tribe ANCYLONOTIN	II Lacordaire, 1869			
23#	Palimnodes ducalis (Bates, 1884)	Apalimna ducalis (BATES)	NR		
	Tribe BATOCERINI Thomson, 1864				
24	Apriona cinereaChevrolat, 1852		10,12		
25#	Apriona germari (Hope, 1831)		NR		
26	Batocera horsfieldi (Hope, 1839)		3		
27#	Batocera parryi (Hope, 1845)		NR		
	Tribe MESOSINI	Mulsant, 1839			
28	Mesosa (Perimesosa) setulosa (Breuning, 1937)		5		
29	Anagelasta (Mesagelasta) nigromaculata Breuning, 1937		5		
	Tribe MONOCHAMINI Gistel, 1848				
30	Acalolepta (Acalolepta) sejuncta (Bates, 1873)	Dihamus cervinus	4		
31	Celosterna scabrator (Fabricius, 1781)		4		
Tribe POGONOCHERINI Mulsant, 1839					
32	Exocentrus (Exocentrus) kashmirensis Breuning, 1957	Exocentrus (Pseudocentrus) championi Fisher, 1940	6		
33	Exocentrus (Pseudocentrus) kuluensis Breuning, 1957		6		
Tribe PTEROPLIINI Thomson. 1860					
34	Pterolophia dorsalis (Pascoe, 1858)	Anaches dorsalis (Pascoe, 1858)	3,7		
35	Pterolophia (Pterolophia) tenebrica Breuning, 1961		7		
36	<i>Pterolophia (Pterolophia) densepunctata</i> Breuning, 1938		5		
37	Niphona fuscatrix (Fabricius, 1793)		1		
38	Niphona (Niphona) tibialis Gahan, 1893		4		
39	Nupserha nitidior Pic, 1939	Nupserha nitidior Pic var. atripennis Breuning	10		
	Tribe SAPERDINI Mulsant, 1839				
40	Stibara (s.str.) tetraspilota Hope, 1840		4,9		

New records to the states are marked with #

DISCUSSION

Undoubtedly, many species of insect cause serious losses to tropical and temperate forests, and the current status of these pests is predominantly a function of ecological interactions between insect and host tree, which become biased in favour of the herbivore. Wood-boring insects are particularly problematic because injury is not generally noticed until extensive damage has occurred, which makes effective management of these pests difficult. Wood-borers constitute the greatest threat to timber and timber products, even more than other factors combined (Beal, 1981).

Our knowledge on the taxonomy and bio

ecology of the Cerambycids of Himachal Pradesh state is very poor. Therefore, this consolidated account of taxonomic knowledge along with current scientific names of the cerambycid beetles will certainly help to monitor of these noxious pest in the forests of Himachal Pradesh.

ACKNOWLEDGEMENTS

Authors are grateful to Dr. Kailash Chandra, Director, Zoological Survey of India, Kolkata for giving necessary permissions and constant support. Thanks are also due to K.C. Gopi, Scientist and in charge of Entomology Division for kindly going through the manuscript and making useful suggestions.

REFERENCES

- Basak, P.K. & Biswas, S. 1993. *Fauna of Orissa. State Fauna series*, 1(Part 4): 185-195. Published by Zoological Survey of India.
- Beal, R.H. (1981). Termite control Studies in Panama. US Department of Agriculture, Forestry Services and Resources.
- Beeson, C.F.C and Bhatia, B.M. 1939. On the biology of the Cerambycidae (Coleoptera), *Indian Forest Records*, vol. 5, no. 1: 1–235.
- Bhargava, V.K. and Uniyal, V.P. 2011. Insects as bio indicator for monitoring biodiversity in Simbalbara wildlife sanctuary, Himachal Pradesh. Wildlife week: 16-18.
- Breuning, S. 1937. Novae species Cerambycidarum. VI. Festschrift Fur. Prof. Dr. Embrik Strand. Vol. IV.
- Breuning, S. 1958. Revision du genes *Exocentrus* Mulsant (Col., Cerambycidae) Bull. Brit. Mus. (NH) Entomology Vol. 7, No. 5. London, 1958
- Breuning, S. 1965. Revision der 35. Gattung der Pteropliini der asistischen Region (Col. Cerambycidae) Entomologische Arbeiten aus dem Museum G. Frey Tutzing bei München: 161-472.
- Mukhopadhyay, P. 2011. On a collection of Insecta :Coleopera: Cerambycidae and Curculionidae (Brachyderinae and Otiorrhynchinae) from Uttarakhand. *Rec. zool. Surv. India*, **111**(Part–2): 75-88.
- Saha, S., Özdikmen, H., Biswas, M.K. and Raychaudhury, D. 2013. Exploring Flat Faced Longhorn Beetles (Cerambycidae: Lamiinae) from the Reserve Forests of Dooars, West Bengal, India. *Hindawi Publishing Corporation ISRN Entomology*. Volume 2013, Article ID 737193, 8 pages.
- Singh, R., Verma, T.D. 1998. Incidence and Control of Poplar Stem Borer, *Apriona cinerea*, Chevrolet (Cerambycidae : Coleoptera) in Paonta Valley of Himachal Pradesh. *Indian Forester*, **124**(7): 556-560
- Thakur, A.K. 1973. Biology and Control of Soybean Girdler *Nupserha nitidior* Pic *var. atripennis* Breuning (Coleoptera: Cerambycidae) in Himachal Pradesh. Published by Himachal Pradesh University.
- Uniyal, V.P. and Mathur, P.K. 1998. A Study on the Species Diversity Among Selected Insect Groups, Wildlife Institute of India.

Manuscript Received : 24th February, 2016; Accepted : 29th March, 2016.