



ZSI e-NEV

The Monthly Electronic Newsletter of Zoological Survey of India



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ANIMAL OF THE MONTH



Brown Rock Chat

Check-list of fauna of India:

- 1. Bombyliidae (Diptera: Insecta)
- 2. Insect parasitic nematodes [Visit www.zsi.gov.in/....]

CALLS

Brown





PICTURE **GALLERY**



POSTER



HERITAGE ALBUM



From the Director's Desk

I have the pleasure to present the ZSI-e News for the month of April, 2010. ZSI held its Annual Officers' Conference during 28th-30th of April 2010 and had discussions on a broad range of topics to be included in the annual programme of work during 2010-2011. The Survey apart from doing its regular ongoing faunistic survey cum taxonomic research studies, renovation of animal/aquarium galleries, etc., involved in further extension-service activities. The scientists rendered service to the Crime Control of Wildlife and their products by fixing the identity of the confiscated animal body parts, and rendered advisory services on a wide spectrum of issues related to the biodiversity and its conservation, with special emphasis on the fauna. The personnel of ZSI Headquarters and its Regional Centres have been rendered with various training courses such as Library Training Course on e-Granthalaya, Purchase management in Government, Training on RTI etc.



Dr. Ramakrishna

Headquarters, Kolkata

Extensive field surveys were undertaken to study the fauna of the States of Assam, Bihar, Jharkhand, Himachal Pradesh and West Bengal. Local surveys were undertaken in and around the Wetland areas in Bortibeel of West Bengal. Scientists of Headquarters, during the month, identified 4 species of Collembola, 3 species of Hymenoptera, 5 species of Isoptera, 6 species of Hemiptera, 7 species of Odonata, 6 species of Orthoptera, 10 species of Arachnida, 3 species of Crustacea, 17 species of Mollusca and 4 species of Amphibia from the States of Himachal Pradesh, Karnataka, Orissa, Uttarakhand, Uttar Pradesh, West Bengal, and from the Namdhapa National Park and Biosphere Reserve, Arunachal Pradesh. During the month, a coccinellid beetle, Henosepilachna chamolika (Insecta: Coleoptera) has been described as new to science. The beetle genus Egius (Coccinellide: Coleoptera) has been recorded for the first time

from India. Discoveries of Coccinellid beetles, Illeis confusa confusa Timberlake, Epilachna expansa (Dieke), Epilachna monsuna Bielawski and Rove beetles, Paederus sharpi Cameron, Paederus coxalis Fauv. and Cryptobium ceylanense Kr. (Coleoptera: Staphylinidae) also turned out to be new records for India. 19 species of Coccinellidae, 12 species of Histeridae, 19 species of Hydrophilidae, 6 species of Scarabaeidae, 16 species of Staphylinidae, (Coleoptera) and 20 species of Collembola identified out of the collections from the State of Uttarakhand turned out to be new records for the State. Seven research papers were published, eight accepted for publication and ten submitted for publication. Identification services were rendered on ten lots of specimens, received from different organizations.

Holotype of *Pseudopecoelus brayi* (Trematoda: Digenea) has been deposited in the National Zoological Collection by Dr. R. Madhavi, Andhra University, Vishakhapatnam. Three Paratypes of *Amolops kohima* from Nagaland have been deposited in the National Zoological Collection by Dr. S.D. Biju, Reader, Dept of Environmental Studies, University of Delhi. Voucher specimens of 23 species of Diaptomid copepods collected from different localities of South India were deposited in the National Zoological Collection by Prof. Y. Ranga Reddy, Department of Zoology, Nagarjuna University, Nagarjunanagar, Andhra Pradesh.

An official from the Forest Research Institute, Dehra Dun and a research scholar from Kalyani University visited the different sections. A group of Post-graduate students of Zoology from Serampore College, West Bengal, visited different sections of the Headquarters. Dr. Pranab Kumar Banerjee, Chair person, PGEC, Sree Rampore College along with 20 PG students Mrs. R. Mondal, Teacher-in-Charge, Sree Sarada Ashram Balika Vidyalaya, New Alipore along with 120 students visited the

Mammals & Osteolgy Section. Prof. Y. Ranga Reddy, Department of Zoology, Nagarjuna University, Nagarjunanagar, Andhra Pradesh visited the Crustacea Section on 30th April.

The "Earth Day" was celebrated on 22nd April and the occasion was graced by Prof. Samir Baneerjee, University of Calcutta and Shri. Debal Roy, Chief Environment Officer, Department of Environment, Government of West Bengal.

Annual Meeting of Senior Scientists of the Zoological Survey of India was held at Headquarters from 28th to 30th April.

Publications:

- Chakraborty, S.K. 2010.Insecta: Coleoptera: Coccinellidae. In: Fauna of Uttarakhand, State Fauna series No.18 (Part-2), pp. 283-301. Zoological Survey of India, Kolkata.
- 2. Deuti, K. 2010. First Record of Liebig's Hill Frog (*Nanorana liebigii*) from Bhutan. *Herpetological Review* (USA), 41(1): 104.
- 3. Mukhopadhyay, P. and Sur, A. 2010. Insecta: Coleoptera: Staphylinoidea, Staphylinidae: Paedarinae. In: *Fauna of Uttarakhand, State Fauna series No.*18 (Part-2), pp. 335-359. Zoological Survey of India, Kolkata.
- 4. Mandal, G.P. and Hazra, A.K. 2010: Insecta: Collembola. In: *Fauna of Uttarakhand, State Fauna series No.*18 (Part-2), pp. 1-12. Zoological Survey of India, Kolkata.
- 5. Mandal, G.P. and Hazra, A.K. 2010: Insecta: Thysanura. In: *Fauna of Uttarakhand, State Fauna series No.*18 (Part-2), pp. 13-16. Zoological Survey of India, Kolkata.
- 6. Suranjana Banerjee and Amalendu Chatterjee 2010. Cestoda. In: Fauna of Uttarakhand, State Fauna series No.18 (Part-3), pp. 53-80. Zoological Survey of India, Kolkata.
- 7. Banerjee (Moitra), S., Moitra, M.N. and Sanyal, A.K. 2010. Ecology of soil mites in a solid waste disposal site at Kolkata, India. *Environment & Ecology*, 28 (1A):347-351.

Northern Regional Center, Dehra Dun

Eleven species of butterflies from Haryana, 20 species of nematodes from Kalesar Wildlife Sanctuary and 40 species of birds from Botanic Garden of Indian Republic (BGIR) NOIDA were identified during the month by various scientists of the Centre. Besides, morphometric measurements of 30 examples pertaining to 3 species of nematodes collected from Vertebrate hosts were recorded for further analyses. A research manual and a research paper were published and two research papers were communicated during the month. A scientist of Delhi University, along with his team, was provided logistic support and access to study the type material of Amphibia, present at the Centre, for his revisionary studies. Two research manuscripts received for reviewing from an International Foreign journal were reviewed and offered suitable comments by a scientist of the Centre.

The Librarian of the Centre was nominated for two days training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.



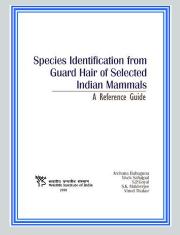
Monal - Lophophorus impejenus State Bird of Uttarkhand

Publications:

- 1. Bahuguna, A., Sahajpal, V., Goyal, S.P., Mukherjee, S.K. and Thakur, V. 2010. Forensic Manual: Species Identification from Guard Hair of Selected Indian Mammals. Wildlife Institute of India, pp. 1-400. (CD Version)
- 2. Tak, P.C., Sati, J.P. and Rizvi, A.N. 2010. Status of Waterbirds of Hathnikund Barrage Wetland, Yamunanagar Distt., Haryana, India. *Journal of threatened Taxa*. 2(4):841-844.



Chinkara- Gazella bennetti



Identification manual published

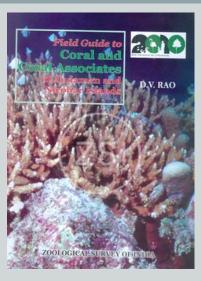


Estuarine Biology Regional Centre, Gopalpur-on-Sea

Nine species of prawns from Brahmani-Baitarani Estuary, Orissa and 3 species of freshwater fishes from Namdapha National Park, Arunachal Pradesh were identified. A Field Guide to Coral and Coral Associates of Andaman and Nicobar Islands has been published. A Scientific assistant of the Centre attended the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April. Twenty visitors paid their visits to the Centre's museum.

Publication:

Rao, D.V. 2010. Field Guide to Coral and Coral Associates of Andaman and Nicobar Islands. *Publ*: Director, ZSI, Kolkata. Pp: 283 with over 550 colour photographs. ISBN: 978-81-8171-245-5.



Book published on Coral and coral associates

In this Issue

Southern Regional Centre, Chennai

Thirty three manuscripts for inclusion in the State Fauna volume on Karnataka were received from various contributors. 5 species of blattids and 8 species of reptiles were identified out of the material collected from Kanniyakumari Wildlife Sanctuary. Besides, two manuscripts on butterflies and mantids of the Kanniyakumari Wildlife Sanctuary were received from ZSI experts. Identification and advisory services were provided to a scientist from Chennai on 18 species of fishes. A scientist of the Centre contributed two chapters to a

book entitled "*Entomology, Ecology and Biodiversity*". The Librarian of the Centre attended training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.

Publication:

Thirumalai.G., 2010. Insecta: Heteroptera (Aquatic and Semi aquatic). Zool. Surv. India. Fauna of Ranthambhore National Park, Conservation Area Series. 43: 83-91.



Black Ibis, Pseudibis papillosa



Scorpion, Lychas tricarinatus, carrying young ones on back



Marine Biology Regional Centre, Chennai

Two species of echinoderms, 9 species of molluscs and 14 species of marine fishes were identified and registered out of the material collected from the Gulf of Mannar Biosphere Reserve. One research paper was published during the month. Three advisory services were rendered. A research manuscript was corrected for an outside journal.

A senior scientist of the Centre delivered two lectures, one on the "Fauna of Mangrove Ecosystems in India" in the "National Level Training Workshop on Conservation and Management of Mangroves" and the other on "Marine Protected Areas in India", in the "Expert Consultation on Marine Biotechnology and Biodiversity Conservation" at NIO, Goa, organized by the NBFGR, ICAR, Lucknow. A



Pentaceraster mammillatus, observed in the Inter-tidal region of Gulf of Mannar

senior scientist of the Centre evaluated two Ph.D., theses and also served as examiner for one of them. A scientist of the Centre attended the State level Steering Committee meeting for Corals, Mangroves and Wetlands conducted by the Tamil Nadu Forest Department, Chennai. Another scientist of the Centre attended the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.

Publication:

K. Venkataraman, 2010. Issues on management of Coastal and Marine Biodiversity II, Cover story, Financing Agriculture: 42(3): 24-27.



Inshore collection of animals by technical assistants in Gulf of Mannar

In this Issue

Gangetic Plains Regional Centre, Patna

Extensive field surveys were undertaken in Dalma Wildlife Sanctuary, Jharkhand and river Gandak, Bihar, to assess the population of Mouse deer and Gangetic dolphin respectively. 259 dolphins were sighted in a stretch of 280 km in river Gandak. Representative faunal collections were also made during the surveys. Three species of Pteromalidae (Hymenoptera: Insecta) were identified from Namdapha National Park. A manuscript dealing with 34 species of Pteromalidae including two new species from Bihar has been submitted. 30 species of butterflies, 7 species of Odonata and 10 species of Coleoptera (Coccinellidae) were identified from Tawang District, Arunachal Pradesh. Two research manuscripts on Hymenoptera were reviewed for

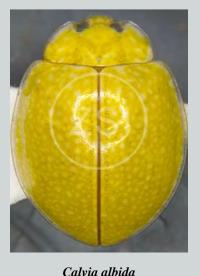


Psilocera sp. nov. Insecta: Hymenoptera: Pteromalidae From Namdapha National Park

Records of Zoological Survey of India. A scientist of the Centre participated in the postmortem of three dead Gangetic dolphins and taken morphometric measurements. A scientist of the Centre attended the training on "Public Finance Management" at ISTM, New Delhi,

from 12th to 16th April. A staff member of the Centre attended the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.

New Records of Coccinellid beetles from Tawang district, Arunachal Pradesh







Halyzia dejavu

Epilachna mystica



Freshwater Biology Regional Center, Hyderabad

Follow up laboratory studies on four ongoing programmes - Aquatic insects in lakes in around Hyderabad, limnofaunal profile of Kolleru Lake, west Godavari and Krishna districts, A.P., Hydrobilogical studies on raw water reservoir, Palair, Khammam district and ecological evaluation of few semi urban lakes in Hyderabad were continued for inventorying the major wetland faunal groups associated with the respective lake ecosystems vis-à-vis their wetland diversity profile. The rich and varied aquatic insect diversity is being documented and the raw water reservoir's limnology profile studied in a detailed/seasonwise manner. Three year field studies on Kolleru Lake, a Ramsar site, revealed ecological recovery, despite habitat fragmentation, change in land use and other anthropogenic interferences.

One field trip to Palair Lake, a raw water reservoir, with a water spread area of 6.67 sq.

miles in Khammam district was undertaken from 17th-21st April, for recording the seasonal data during the summer season. Raw water, net zooplankton and other biological collections of major wetland faunae - fish nekton *etc.*,- were made from significant sampling sites in the reservoir for hydrobiological evaluation of the lake's ecology *vis-a vis* important physicochemical parameters including nutrients. In all, 325 examples of biological collections including 8 net zooplankton samples were made, and 8 water samples analysed. Interestingly, the raw water reservoir plays host to a good diversity of decapod crustacean *nekton*, predominantly crabs.

Publication:

Deepa, J. et.al. 2010. Ichthyofauna, pp. 145-158 In: Fauna of Ranthambhore National Park, Conservation Area series, 43, 1-255, 2010, Ed. Director, Zool.Surv.India, Kolkata, India.



A view of raw water reservoir



A view of air breathing fishes in surface waters

In this Issue

Sunderban Regional Centre, Canning

A field survey was conducted in and around Canning and on the shores of Matla Estuary restricted up to Canning on 28th April and collected representative faunal samples. A total of 16 species of fishes were identified and registered during the month. The named



Penaeus monodon

species holding of the Centre was updated up to 1543 species. Two staff members of the Centre were deputed to participate in National Training Workshop on Conservation and Management of Mangroves at GEER Foundation, Gujarat from 1st - 5th of the month.



Scylla serrata



Desert Regional Centre, Jodhpur

Scientists of the Centre identified 5 species of Lepidoptera and 7 species of Odonata from Aravalli Range of Rajasthan and 4 species of Nematoda from the forest areas of Gujarat. Scientist of the Centre participated in "Training on Public Finance Management for Group-A Officers" at ISTM, New Delhi from 12th-16th April. Library and Information Assistant of the Centre participated in the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April. 2 research papers were

published. 47 entries of identified fauna were made in the faunal Database of the Centre. 75 entries pertaining to the books in the Centre's library were made employing the software, *e-Granthalaya*.

Publications:

1. Sharma, G. and Joshi, P.C. 2009 (published in 2010). Diversity of Butterflies (Lepidoptera: Insecta) from Dholbaha dam (Distt. Hoshiarpur) in Punjab Shivalik, India. *Biological Forum-An International Journal*. 1(2): 40-44.

 Sharma, G., Ramamurthy, V.V. and Kumar,
 R. 2009 (published in 2010). Collection of damselflies and dragonflies (Odonata: Insecta) in National Pusa Collection, Division



Sand Dunes at Osian, Jodhpur, Rajasthan



White-breasted Waterhen at Keoladeo National Park



Spotted deer at Sariska Tiger Reserve

of Entomology, Indian Agricultural Research Institute, New Delhi, India. *Biological Forum-An International Journal.* 1(2): 106-109.



A view of Keoladeo National Park



Jackal at Sariska Tiger Reserve



Wild Boar at Sariska Tiger Reserve



North Eastern Regional Centre, Shillong

A field survey was conducted in East Khasi Hills Dist., Meghalaya to study the Cerambycidae (Coleoptera: Insecta) fauna from 30th March-5th April.

10 species of Rotifera 15 species of Cladocera from Deepor Beel, Kamrup Dist., Assam were

identified and registered and 25 data entries on Rotifera and Cladocera were made in the computerized database, during the month. Besides, 5 species of Reptiles from Manipur and 4 species of reptiles and 19 species of fishes collected during earlier surveys were also

identified and registered. Compilation work of the final report on "Faunal inventory of Nokrek Biosphere" and the species list of fishes for the "Pictorial Handbook on Fishes of North East India" were continued.

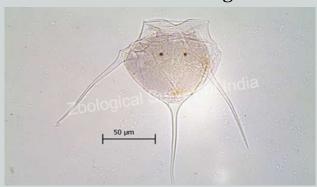
Identification service was rendered to Synod College, Shillong, on a reptile species. The Department of Zoology, Arya Vidyapeeth College, Guwahati, Assam, deposited 2 Type specimens of reptiles in the Centre's holdings.

A group of M.Sc. 4th Semester students from the Department of Zoology, Bajali College, Barpeta Dist., Assam visited the museum of the Centre on 23rd of the month.

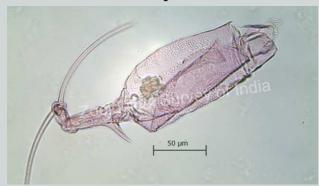


A view of Deepor beel, a Ramsar site in Assam

Some interesting Rotifera and Cladocera of Deepor beel



Filinia camasecla



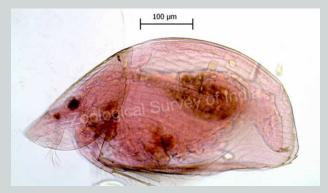
Trichotria tetractis



Keratella lenzi



Daphnia lumholtzi



Graptoleberis testudinaria



Arunachal Pradesh Regional Centre, Itanagar

A field survey was conducted from 31st March to 7th April in and around Ziro and Yazali of Arunachal Pradesh and representative faunal samples collected. The document on birds of Tawang and its environs has been submitted. A scientist of the Centre participated in the debriefing function at NCAOR for 27th and 28th Indian Scientific Expeditions to Antarctica on 5th April. A staff member of the Centre attended the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April. Twelve school students from various schools of Itanagar visited the museum. A write up on the

Brown Rock Chat (*Cercomela fusca*) is presented under the 'Animal of the Month', in this newsletter. Also the readers are requested to log on to http://www.zsi.gov.in/zoological-survey-of-india/zsi-data/animal_call.htm.



Pellets of Indian hare





Danaid butterflies at Pakke Tiger Reserve

In this Issue

Central Zone Regional Centre, Jabalpur

Twenty species of Fishes, 3 species of Protozoa, 1 species of Rotifera and 3 species of Cladocera were identified from Singhori Wildlife Sanctuary and registered in the National Zoological Collection during the month. Checklists of Diptera pertaining to the families Bombyliidae, Sphaeroceridae and Tachinidae were prepared for the departmental website. A chapter on Diptera from Madhya Pradesh & Chhattisgarh dealing with 257 species under 29 families was also prepared. A manuscript reporting 45 species of Bombyliidae (Diptera), was contributed to the document 'Fauna of Karnataka', to be published under the State Fauna Series of the department. One research

paper was published and one communicated. Advisory services were rendered to two Postgraduate students from Jabalpur on Reptilia and Pisces and on Thysanoptera (Insecta) to a research associate from NBAII, Bangalore. A scientific paper on gall midges (Diptera) was reviewed for an outside journal. Information on Natural History Museum of the Centre was provided to the reporter of the Daily "Patrika". An official of the Centre attended the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.

Publication:

Chandra, K., Nema, D.K. and Kumar, Sanjeev, 2010. Insecta: Lepidoptera: Heterocera, Fauna of

Ranthambhore National Park, Conservation Area Series, 43: 123-132. (Edited by Director, ZSI and Published by Zool. Surv. India).

Some fauna of Singhori Wildlife Sanctuary



Cirrhinus mrigala (Hamilton)



Cirrhinus reba (Hamilton)



Colisa fasciata (Schneider)



Labeo calbasu (Hamilton)



Ocyceros birostris



Meropus orientalis



Marine Aquarium cum Regional Centre, Digha

The renovation work of aquarium tanks initiated in the previous month was almost completed. An average of 250 visitors per day visited the aquarium. Efforts were made to stock new ornamental species in the renovated tanks. Around 70 numbers of different varieties

of ornamental species were procured for exhibiting. The main attraction among the exhibits during the month were the Moon Wrasse (*Thalassoma lunare*), Three-spotted Damsel (*Dascyllus trimaculatus*), Eight-banded Butterfly (*Chaetodon octofasciatus*), Horned

Cowfish (Lactoria cornuta), Yellow-tailed Blue Damsel (Chrysiptera parasema), Sebae Clownfish (Amphiprion sebae), Collared Butterfly (Chaetodon collare), Sailfin Tang (Zebrasoma veliferum), Blue-spot Butterfly (Chaetodon plebius), Bi-colored Angelfish (Centropyge bicolor) and the Black Surgeonfish (Acanthurus gahhm). Monthly local surveys were conducted along the Digha coast and 54 examples of

marine invertebrates from different groups were collected under the Annual Plan of Research work assigned to the Centre. A staff member of the Centre attended a training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.



Yellow tail blue damsel



Sebae Clownfish



Moonwrasse



Horned cowfish



Collared butterfly



Three spotted Damsel and Eight banded butterfly



High Altitude Regional Centre, Solan

The first draft on the 'Avifauna of Pangi Valley', comprising 73 species has been prepared. Compiling information on the Rhopalocera (Lepidoptera: Insecta) of Pangi Valley and Churdhar WLS comprising 15 and 25 species respectively have also been completed. Compilation of material for 'Pictorial Handbook on Pisces of Himachal Pradesh' is in progress. So far, diagnostic features, distribution and status of 30 species of fishes have been finalized for the same. A paper on Synonyms of Orthopteran family Acrididae is under preparation. Two faunal accounts on butterflies of Uttarakhand were published. A general article was also published in a national journal of repute.

A staff member of the Centre attended the training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April.



Paa liebigii (Gunther) from Himachal

Publications:

- 1. Sidhu, A. K. & N. Sharma (2010): Insecta: Lepidoptera: Lycaenidae, Libytheidae and Acraediae *In: Fauna of Uttarakhand, State Fauna series*, 18 (2): 531-552, Zoological Survey of India, Kolkata.
- 2. Sidhu, A. K. & N. Sharma (2010): Insecta: Lepidoptera: Satyridae: Rhopalocera *In: Fauna of Uttarakhand, State Fauna series*, 18 (2): 569-591, Zoological Survey of India, Kolkata.
- 3. Saikia, Uttam, Narayan Sharma and Abhijit Das (2010) Vanishing species: The planet in

crisis Resonance 15(3):221-236 IAS/Springer.



Melitaea arcesia from Pangi



Western Regional Centre, Pune

Scientists of the Centre identified 10 species of freshwater fishes received from Vidya Pratishtan's Arts, Science and Commerce College, Pune. A research scholar from the National Centre for Biological Sciences, Bangalore visited to study the small mammal collection of the Centre and compare it with fossils collected from Karnool district, Andhra

Pradesh. The Librarian of the Centre attended the two days training programme on *e-Granthalaya* (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April. Fifty students of veterinary college, Mumbai visited the Centre and museum.

Andaman and Nicobar Regional Centre, Port Blair

Ross, Smith, Long, Table and Reef Islands in North Andaman and Grub Island in South Andaman have been surveyed during 15th to 21st April. A total of 66 species of scleractinian corals, 14 species of alcyonacean corals, 15 species of crustaceans, 44 species of molluscs, 2 species sponges and 4 species of fishes were identified. The live coral density was assessed at all these islands. Besides, 40 species of fishes have also been identified from the unnamed collection of the Centre and 20 species of corals registered in the National Zoological Collection. As required by the Ministry, research highlights on Great Nicobar Biosphere Reserve has been submitted. As per the recommendations of UNESCO and subsequent intimation from Ministry, necessary steps are being undertaken to include coastal and marine zone as a part of Great Nicobar Biosphere Reserve. Database for corals, echinoderms and

molluscs were updated. 150 charts of different faunal groups were added in the Regional Museum. A book on the coral reefs of Andaman and Nicobar Islands is under preparation. 18 species of soft corals and 2 species of jelly fishes were identified on requests from the Andhra University, Vishakapatnam and the SRM University, Chennai respectively. Scientist of the Centre served as an examiner for the M.Sc. Marine Biology students of Pondicherry University on 19th April. A staff member of the Centre attended the training programme on e-Granthalaya (a digital agenda for library automation and networking), facilitated by the NIC, New Delhi, at WGRC/ZSI, Calicut on 19th and 20th April. A project staff delivered a lecture on Climate Changes and Global Warming in the consultation programme for Coastal Poor-Development Action Network.

Publication:

Ramakrishna and C. Raghunathan, 2010. Biodiversity, Climate Change and Aquatic Ecosystems. In: *Climate Change and Aquatic* Ecosystems (Eds. A. Joseph, S.B. Nandan and A. Augustine), School of Environmental and Marine Sciences, Cochin University of Science and Technology, Cochin, p 1-42.



Coral, Fungia concinna



Coral, Fungia corona



Coral, Fungia paumotensis



Coral, Fungia repanda



Coral, Fungia scabra



Coral, Sandalolitha dentata



Western Ghat Regional Centre, Kozhikode (Calicut)

An in-house Training programme on *e-Granthalaya* (A Digital Agenda for Library Automation and Networking) was conducted at the Centre on 19th and 20th of the month, jointly with the National Informatics Centre (NIC), Govt. of India, New Delhi.

Out of the collections from the recent survey, 22 species of fishes were identified which included local endemic species (confined to the upstream of Periyar River in the Periyar Tiger Reserve) like *Lepidopygopsis typus*, *Puntius periyarensis* and *Puntius ophiocephalus*. The 3 specimens of

Platygastridae (Hymenoptera) received from the Arachnida section, ZSI, Kolkata has been identified as a new species belonging to genus *Psix* Kozlov and Le. Description and illustration of the new species is under progress. Besides, out of the collections received from SRC, ZSI, Chennai, 10 species of Odonata were also identified. During the month, one research paper was published and two communicated. Two other research papers were under process and in the final stage of completion and one paper was revised and submitted.

The *Telenomus* (Platygastridae: Hymenoptera) specimens received from Oman for identification has been subjected to taxonomic

studies. Identification and advisory services were rendered to the students (M.Sc.-Entomology) of Government Madapally College, Madaplly, on species of butterflies associated with bamboos and to the students (B.Sc.-Zoology) of Government Kodancherry College, Kodancherry, on common snake species of Kozhikode district.

Two staff members of the Centre attended the training programme on *e-Granthalaya*.

Publication:

Sashikumar, C. Praveen, J. Muhamed Jafer Palot and P.O. Nameer. 2010. A Checklist of Birds of Kerala. *Malabar Trogon*. Vol. 7(3): 2-13.

Two endemic fishes of Periyar River system (Kerala)



Lepidopygopsis typus



Puntius ophicephalus

During the Training programme on e-Granthalaya





Introducing e-Granthalaya to the trainees by the officials of N.I.C





Hands-on session in progress



Trainees receiving participation certificates



Instuctors and participants of the training programme



ANIMAL OF THE MONTH

BROWN ROCK CHAT Cercomela fusca (Blyth, 1851)

(Family: Muscicapidae; Sub-family: Muscicapinae)



Adult







Juvenile

Fledgling

Nestling ready to fledge

(Text and Photos by Anil Kumar, ZSI, Itanagar)

Brown Rock Chat Cercomela fusca is an endemic, resident, fairly common song bird, distributed mainly in central portion of the Indian subcontinent (Uttar Pradesh, Punjab, Haryana and Bihar to West Bengal). It is vagrant in Northern Pakistan and Nepal. It is a brown coloured bird, about 17 cm in size. Both sexes are alike in appearance. It is mainly an insectivorous bird, usually foraging upon beetles, ants, flies and other ground insects. The bird inhabits rocks, ravines, old buildings and suburban areas. Breeding season is February to August with peaks in April-June. The nest is in the shape of a swallow cup made up of root fibers, hairs, wool and even plastic pieces also. Rock crevice and wall-holes are the preferred nesting sites. Eggs in a clutch are usually 3 to 4 in number, and pale-blue with rusty specks. Only female incubates. Incubation period is followed by nestling period for about 14-15 days.

Individuals use different types of calls for communication. These are mostly territory advertisement calls, alarm calls and begging calls. Calls have their own physical characteristics, structure and context of production. Songs are complex composed of phrases/ strophes, preceded and followed by temporal gaps. In a song bout, same song phrase is repeated in a stereotyped manner with structural variations of elements, ranging 6 to 14 elements per phrase. The frequency of songs ranges from 2 to 7 kHz. Song phrases composed of frequency modulated elements have dissimilar structure, amplitude, temporal gap and duration. Mostly, song phrases are long in duration and can further be divided into syllables. Songs are used for territory advertisement and mate acquisition (log on to http://www.zsi.gov.in/zoological-survey-of-india/zsi-data/animal_call.htm).

References:

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