World Journal of Pharmaceutical Sciences ISSN (Print): 2321-3310; ISSN (Online): 2321-3086 Published by Atom and Cell Publishers © All Rights Reserved Available online at: http://www.wjpsonline.org/ Short Communication



Amphibian diversity from Sangli District (MS, India)

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Received: 04-03-2015 / Revised: 23-03-2015 / Accepted: 28-03-2015

ABSTRACT

Amphibians, particularly frogs and toads created the first true footprints on the earth at least 190 million years ago. Sangli district contains lakes perennial streams, grass lands, hill slopes and paddy fields. This high diversity of habitats responsible for amphibian diversity. For the present study the survey of amphibians was carried out during rainy season (late May to late October). The presence of various species of frogs were noted on the bases of actual sighting, presence of egg clusters (for same species), and on their calls. The famous Chandoli National Park lies in Shirale taluka of Sangli district and spread on around 317.97 Sq. km. with the 32 villages. It crossed the boundaries of the district like Kolhapur, Satara, Sangli and Ratnagiri. The specimens were studied along the streams and through patches of forest during day light and early night hours. Working with frogs brings a strange but intense awareness about the present and distinct past. Amphibians from family bufonidae, ranidae, microhylidae, rhacophoridae and caeciliidae were reported.

Key words: Sangli, amphibians, diversity

INTRODUCTION

Man has always been fascinated by the diversity of life. These amphibian species must be monitored in future for a better understanding to human influences on local extinction.[4]. The present study of amphibian biodiversity will be and great significance from the point of view of diversity of Maharashtra state in general and of Sangli district in particular. At Chandoli rainfall is spread over five months from June to October with peaks during July. The average rainfall is around 2000-2500 ml/yr. As such there is no work on any aspect of biodiversity of amphibians on Sangli district; hence with the present work we will try to fill up a gap of information regarding biodiversity of amphibians in these particular areas. The present work is to be carried out in the selected areas of the Sangli district. The geographical area of Sangli district is 8572 sq. kms. There are Agrani Man, Korda, Bor, Paina the noteworthy rivers facilitate the district [13]. As a result of survey I prepared checklists of amphibians from Sangli District. It is based on, personal field observation, study of specimens in the field and previously published records [1, 9, 10, 18, 19, 20, 21, 24 and 25].

MATERIALS AND METHODS

A site wise distribution table was prepared for Sangli district. Various places visited during rainy season. (Late May to late October). For present study some selected areas of Sangli district have been selected for survey including Chandoli National Park. Various species of frogs were studied on the basis of actual sighting, presence of egg clutches (for some species) or their calls. Specimens were obtained along streams and through patches of forest during daylight and early night hours. Rocks were turned, dead leaves scraped, Shrubs and trees were examined. Identification is carried out in the field with the help available identification keys. Record was prepared standard as per checklist and photography.

OBSERVATION

The present study constitutes the observation and study of following amphibian species in various parts of Sangli District.

ORDER: ANURA Family:Bufonidae

Genus: Bufo

- 1. Dattapharynus melanostictus
- 2. Bufo koynayensis

Suvarna, World J Pharm Sci 2015; 3(4): 729-731

Family: Microhylidae

Genus: Microhyla 1. Microhyla ornata Genus: Uperodon Spherotheca sp. (Burrowing frogs)

Family: Ranidae

Genus: Euphlyctis 1. Euphlyctis cyanophlyctis Genus: Hoplobatrachus 1. Hoplobatrachus tigerinus Genus: Limnonectes 1. Fejervarya sp. Genus: Rana 1. Clinotarsus curtipes- bicolored frog 2. Sylvirana temporalis 3. Rana ornatica Genus: Indirana 1. Indirana c. f. beddomii Genus: Nyctibatrachus Nyctibatrachus sp. - wrinkled frog Family: Rachophoridae Genus: polypedates polypedates maculatus (common tree frog) Genus: Philautus Philautus sp.

Family: Caeciliidae – Gegeneophis sp.

DISCUSSION

Frogs are often forgotten on platforms where conservation is discussed.[6,9,15,20,22, 23]. But this first denizen of the land is a very sensitive indicator of what is happening to the environment. Frogs study and documentation of details is thus a

key aspect of biodiversity documentation [22, 23]. Once gathered, baseline information can serve as a benchmark against which regular data for monitoring the health of the forest can be judged [4, 17]. Once might even say, "Amphibian declines are perceived as one of the most critical threats to global biodiversity [2, 3, 5, 7, 11, 12, 16, 21]. Needless to say, these creatures need protection, until and unless this happens they face a bleak future [21, 22,23]. Chandoli National Park provides wonderful vistas of the surrounding landscape. The most distinct feature of this national park is the presence of numerous barons rocky and laetrile plateau called as Zolambi Sada. Sodas provide good breeding ground for Bufo Koyanyensis toads. Sadas are with less perennial vegetation and over hanging clips on the edges and numerous fallen boundaries with dense thorny vegetation.

CONCLUSION

The part of Sangli District contains lakes perennial streams, rain forests grass lands, hill slopes and paddy fields. The high diversity of habitats is responsible for the amphibian diversity in this part of the district [13]. Amphibians comprise a large and diverse class of animals [8, 14]. In India amphibians are mainly known by Anura, which includes frogs and toads [23]. Amphibians from family bufonidae, ranidae, microhylidae, rhacophoridae and caeciliidae were reported from the Sangli district.

ACKNOWLEDGEMENTS

Author thanks UGC for financial assessments.

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Suvarna, World J Pharm Sci 2015; 3(4): 729-731

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