

Notes on *Bryum medianum* Mitt. (Bryaceae) collected from Tsum Valley, central Nepal

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Bryophytes are very important parts of ecosystem however their study is done less as compared to vascular plants in Nepal. There are 766 taxa of mosses in Nepal (Pradhan 2000, 2006). The genus *Bryum* Hedw. Represents the taxon of Bryaceae (Bryophyta). *Bryum medianum* Mitt. has been reported from Meghalaya, from Khasia hills (Gangulee 1969-1980) as well as Thailand and Malaysia. However, the specimen of this species has not been deposited in Nepal (Pradhan 2000, 2006); is a new addition to the specimens of bryoflora in Natural History Museum, Nepal when compared with other species of the same genus in the = Natural History Museum, Nepal.

The study sites was Tsum valley located in Manaslu Conservation Area of Gorkha District. The species was observed during the biodiversity assessment. This species was recorded from Natural forest of *Pinus wallichiana*, *Quercus semicarpifolia*, *Rhododendron arboreum*, *Rubus peniculatus*, *Hedera nepalensis*, *Thalictrum reniforme*, etc were associated in the site.

The locality of this species consisted of moist environment with ca 10 cm litter deposition at the time of collection of the specimen. The species was photographed. It was then put in envelop and pressed along with other angiosperm. The specimen was dried and identified in the lab of Natural History Museum, Nepal. In this short note, the taxonomy based on the specimen of the species has been described.

Taxonomy

Bryum medianum Mitt. J. Proc. Linn. Soc., Bot., Suppl. 1: 74 1859.

Plants small, closely tufted, bright green, reddish

brown when dry. *Rhizoids* are reddish brown. *Shoots* erect, 4-4.5 cm long. Stems slender, short, branched. *Leaves* numerous, more crowded in the lower part of stem, erect, 1.5-2 × 1 -1.2 mm, oblong-lanceolate, sharply acuminate; margins entire, with distinct mid-vein. *Seta* erect, 3-7 cm long, dark reddish- brown. *Capsule* thick, cylindrical, 2-3 mm; operculum conical; peristome well developed (Fig.1).

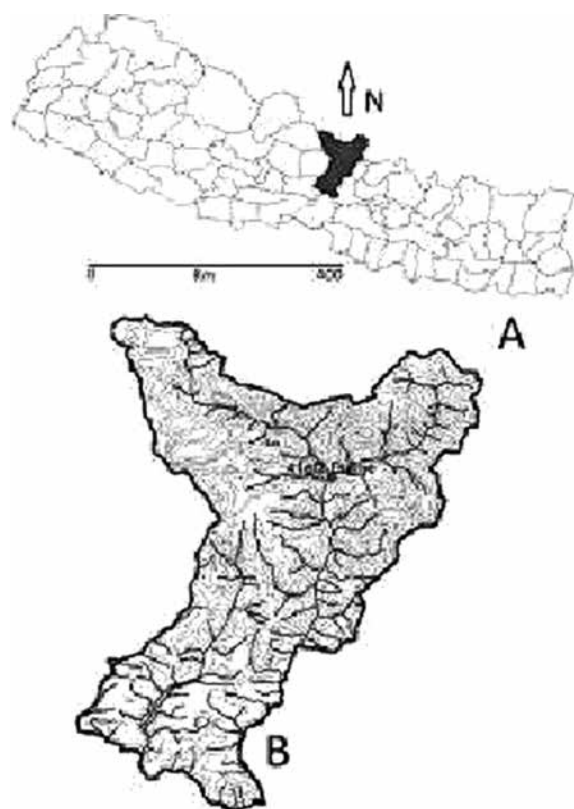


Fig. 1: Collection site: A Map of Nepal; B Gorkha District and locality

Specimen examined: Central Nepal, Gandaki Zone, Gorkha district, Above Dumje, opposite to the trail to Chum valley, 2600 m, 12 September

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Distribution: Central Nepal (Dumje, Tsum valley, Gorkha District, Fig. 2), South India, Thailand, Malayasia.

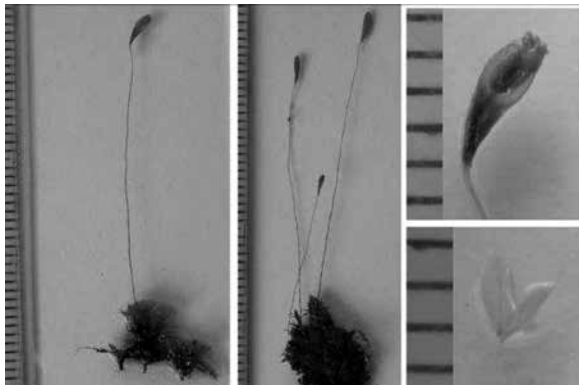


Fig. 2: Habit; A Entire Plant (moist); B Entire Plant (Dry); C. Capsule; D Leaf; the scale on margin represent mm.

Discussion

Bryophytes are less studied in Nepal as compared to higher plants. There are 766 taxa of mosses in Nepal (Pradhan 2000, 2006) which do not include *Bryum medianum* Mitt. This species have been collected and preserved in India, Thailand and Malayasia (Frahm *et al.* 2013; Gangulee 1969-1980). The potential distribution of this species was reported by Gangulee (1969-1980) in Nepal; however, there are no records on the specimen collected or deposited in Nepal. The present study, confirms his distribution range. This note on the *Bryum medianum* Mitt. concludes the new addition to bryoflora to Nepal and make contribution to existing checklist of bryoflora. As

the number of specimens were localized in small area, it further recommends for conservation of the species in the natural habitat in Tsum valley.

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