

## Ethno-medicinal plants of upper Brahmaputra valley of Assam

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### SUMMARY

Ethno-medicinal plants play a significant role in the folk culture of different ethnics of the upper Brahmaputra Valley Agro-Climatic Region of Assam. The present study highlights information about the certain plant species, which were practiced traditionally by the local inhabitants of the area. During the study 49 species were recorded which belong to 44 genera and 34 families.

**Key words :** Ethno-medicinal plants, Upper Brahmaputra agro-climatic region

Assam is situated in the mega hotspots region of North-Eastern India and lies at an altitude of about 105-130 cm above sea level. between 24° 8' N to 27° 56' N Latitude and 89° 42' E to 96° E longitude. The upper Brahmaputra Valley Agro-Climatic Region consists of Tinsukia, Dibrugarh, Sivasagar and Jorhat district. The climate of this region is damp and cool with relative humidity above 86%, average maximum temperature in summer 25-32°C and minimum 08-10°C in winter, while the annual rainfall is more than 2600 mm. Soil is mostly alluvial except the areas bordering the hills and adjoining areas of the rivers. The region slopes down gradually from the hills of Arunachal Pradesh, Nagaland and Karbi Anglong. It is one of the important single compact tea growing areas of the world. Deciduous tree, evergreen, semi-evergreen forest is the significant character of this region. It is such a favorable region where the medicinal plant grows abundantly with the natural environment. Soil health of this area plays a vital role in the bio-chemical composition of the plants.

The region is a homeland of Tai-Ahom community followed by different indigenous ethnic groups and sub-groups. The indigenous communities use the plants according to their belief, healing properties for various ailments, roles in religious and social ceremonies which are reflected in their folk behaviour. Thus, they directly or indirectly help in the management and conservations of plant diversity.

### MATERIALS AND METHODS

The surveys were conducted in the Upper

Brahmaputra Valley Agro-Climatic Region of Assam consisting of four districts namely Tinsukia, Dibrugarh, Sivasagar and Jorhat during the year 2004 – 2007. The information was collected through personal interactions, discussions, during the field trip in the different season's viz., winter, spring, summer and autumn with knowledgeable and experience ethno-medicinal practitioners, aged men, house wives and local healers. The plant species were collected from the forest and rural areas during the field trips with locals and traditional practitioners for herbarium preparations. Plants were identified with the help of Flora, as Kanjilal *et al.* (1934-39), Barua *et al.* (1999), Dutta and Nath (1999), Jain (1991) and Gogoi (1997). Voucher specimens have been deposited in the herbarium of Department of Botany, Gargaon College.

### RESULTS AND DISCUSSION

Plants are arranged alphabetically along with their Botanical and Vernacular names in bold, family in parenthesis followed by their uses.

– *Acrostichum aureum* L. Dhekialoti, (Pteridaceae): Rhizomes are made into paste for application to remove boils.

– *Alpinia galanga* Willd. Tora, (Zingiberaceae): Used in rheumatism, diarrhoea and vomiting. Flowers and young bud used as vegetables.

– *Alstonia scholaris* R.Br. Sotiona, (Apocynaceae): Used as liquid in chronic diarrhea and asthma.

– *Andrographis paniculata* (Burm.f) Wall. ex Nees. Kalmegh (Acanthaceae): Used for diabetes, urinary trouble, dysentery cholera, liver trouble, itching and piles.

– *Angiopteris evecta* Hoffm. Hati Dhekia, (Angiopteridaceae): Roots used for gonorrhoea, asthma and phalangittis.(Endangered)

– *Axonopus compressus*(SW) Beauv Titaghah

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