

## **A Contribution To Medico- Ethnobotany of Kalahandi District, Orissa on Ear And Mouth Disease.**

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### **ABSTRACT:**

Different herbal methods of treating ear and mouth disease in ethnomedicinal practice of the tribal people of Kalahandi district are described based on survey among scheduled caste and scheduled tribe population. 10 species have been found to be used as external application. All most all the species are found to be new Orissa on scrutiny of literature.

### **INTRODUCTION:**

The district Kalahandi lies between 19<sup>0</sup>10'-20<sup>0</sup>30' N latitude and 82<sup>0</sup>30'-83<sup>0</sup>50' E longitude. The district contains two physiographic unit, the undulating plains to the north east and extension of Eastern ghat. The region from east to south east is covered with high plateau of 300-500 meter above M.S.L. Many flat hill tops locally called mali vary between 1200-1200 M.S.L. above the principal hill ranges belong to the Eastern ghat while those failing under Nuapada district belong partly to Chhot Nagpur mountain system and partly to Eastern ghat. The main hills of the district are Mohangiri, near Urladani, Niyamgiri near Lanjigarh, Baphlimali hills near Thuamul Rampur. In these hills area splendid stream of Indrabati takes its rise near Thuamul Rampur and forms the southern boundaries of Kalahandi. In the northern Hati river arises and flows exactly in opposite to Indrabati form a place called Mardiguda. Nagabali and Bansadhara are two other rivers which originate from the Niyamgiri hills ranges. Forest of Kalahandi is tropical dry mixed deciduous type with great diversity of flora and fauna. The Tel

and the Indravati which form the tributaries of large river like Mahanadi and Godavari. The District enjoys tropical monsoon climate with average rain fall of 800 to 1200 mm and temperature ranges minimum 28<sup>0</sup> C to maximum 50<sup>0</sup> C A number of plants are used to treat various diseases in ethnomedicinal practice in remote villages and tribal pockets of the district. Earache, earsore, mouth trouble like tongue sore is a common problem and easily cured by the herbal healers. They hardly depend upon doctors for the treatment of these diseases. This study could bring to light novel and effective plant drugs in the treatment of the ear and mouth disease. Therefore an ethnomedicinal survey was carried out in the district with reference to the treatment of ear and mouth disease with plant drugs by the tribals. Relevant information on 10 species and the method of treatment followed by the tribals healers are presented.

### **MATERIALS AND METHODS**

An extensive ethnomedical survey was conducted during fieldtrip from 1999 to

2002. The traditional healers, village head, knowledgeable elder persons were interviewed and the information was collected. The information collected from one village was cross checked with that obtained from another.

Voucher specimens were collected during fieldtrip and are also preserved in the Govt. Autonomous college, Bhawanipatna. The information obtained are enumerated in alphabetical order with family, local name, method of application etc. abbreviations used as. Fam-Family L-Local name, P-parts used, Pl. place of collection. The details of plant species are enumerated as follows.

## RESULTS

***Bambusa vulgaris*** Such ex-Wendl, Fam-Poaceae, L. Baunsh, P-Culm, Pl-Thuamul Rampur and adjacent villages. Culm is spilted and granules of salt like structure are collected. It is used in earache and ear sore.

***Chlorophytum arundinaceum*** Baker. Fam Liliaceae, L.Kanjer saga, P-Leaf, Pl-Mardiguda.

Leaves placed in hot ash to warm and is cleaned with a wet cloth. The warm leaf is squeezed and the luke warm juice is collected and used for ear sore and ear ache.

***Cleome viscosa*** Linn; Fam-Capparidaceae, Hulhulia, Pl-Leaf, Pl Tolbahammi.

Fresh leaf juice is collected and warmed. At luke warm temp it is dropped in ear for the relief of pus.

***Dendrophoe falcate*** (L) Etting – L. Fam-Loranthaceae, L.Mahul madang, P-leaf, Pl-Chianpadar.

Leaf juice is warmed. It is dropped in ear at luke warm temperature for treatment of ear infection.

***Gossypium herbaceum*** (Linn):- Fam-Malvaceae, L.Kapa P-Fruit Pl-Maskaguda.

Fruit is warmed in fire and is squeezed. The juice collected is dropped in ear in luke warm temperature for treatment of ear infection.

***Leucas aspera*** Spreng Fam Lamiaceae, L-Gubi P-leaf, Pl-Kandel, Kesinga,

Leaves rubbed with palm and juice is collected by squeezing. The juice is dropped in ear for treatment of oozing pus from ear.

***Spondias pinnata*** (L.F.) Kurz- Fam-Anacardiaceae, L.Amda, P-Leaf Pl – Musanal and kandama.

Luke warm leaf juice is dropped in ear for treatment of ear ache. Fruits rubbed with fitkiri and bark of Acacia catechu (L.F.) Wild and missed with cow ghee and is applied on tongue for cure of tongue infection and mouth sore. It is a special method of treatment in case of infants. Fruit pulp is collected by rubbing on stone surface and applied on tongue to cure tongue infection.

***Stachytarpheta indica*** (L) Vahl. Fam Verbenaceae, L. Gorujhagda, P. Leaf, Pl-Bijepur,

Leaves pounded with black pepper is applied on ulcerated tongue surface for cure of tongue and mouth sore.

***Trichosanthes bracteata*** (Lam) Vagt. Fam – Cucurbitaceae, L. Mahakal, P-Leaf and fruit, Pl-Kandama, Musanal.

Mustard oil is applied on the surface of leaf and held on flame. Luke-warm leaf juice is collected by squeezing and put in ear to get rid of the pus. Fruit is fried in mustard oil till black. This oil is put in ear when luke warm for cure of all type of ear disease.

*Vanda tessellata* (Roxb) Don, Fam Orchidaceae, L. Rasna (Kaugudi), P- Leaf Pl – Kamarda.

Leaf is dipped in hot ash cleaned with a wet cloth. It is squeezed to collect the juice. It is dropped in ear for treatment of ear infection.

## DISCUSSION

The enumeration shows that ethnomedicine for treatment of ear disease is based on application of luke warm juice of plant parts like leaf, fruit. Generally the juice is collected by placing the leaf in hot ash and is squeezed after cleaning.

Scrutiny of literature reveals that all most all the plants are newly reported for ear and mouth disease form the sate for the first tieml. also, scrutiny of the literature reveals that *Bambusa vulgaris*, *Gossypium herbaceum* and *Dendropthe falcate* have

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been reported for use in ear disease but the method of application are different <sup>2,3,4,5,6,7</sup>. The species like *stachyterpheta indica* and *spondias pinnata* are newly reported for cure of mouth disease species like *tricosanthes bracteata* is used in ear disease all over western orissa as a popular remedy.

## CONCLUSION

This is a brief report of the medico-ethno botanical survey of Kalahandi district and more exhaustive studies with reference to ear disease in the state are necessary in order to collect and document the rich and vast knowledge available with the traditional healers. So, more useful remedies can be screened and investigated for cheap and effective health care. Further intensive study is required in small areas to document the ethnomedicinal knowledge. The wide use of important medicinal plants by tribal people suggests their efficiency.

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