Research Article

THERIOPHONUM INDICUM (DALZ.) ENGLER. (ARACEAE) –LEAFY VEGETABLE OF GONDIA TRIBE, VIDARBHA REGION, MAHARASHTRA

Suwarna Deshpande and *Kulkarni D.K.

BAIF Development Research Foundation, Pune- 411 058 *Author for Correspondence

ABASTRACT

Local vegetables are consumed by Gondia trine from Deolapar Region at Nagpur District, Vidarbha region (Altitude: 1331 feet. N=21°37'21'.948". E=79° 20'39'.944"). Toxic vegetables like *Theriophonum indicum* (Dalz) Engler required special preparation method to make it edible. This rare plant available during rainy season and first report of edible use is mentioned in the note.

INTRODUCTION

Aborigines consume a main staple diet and it is supported with supplementary wild foods. These species are consumed by various communities depending on the local availability. Various preparations of plant species are prepared and sold in tribal markets. Tribals and local communities have accurate knowledge of wild food resources due to their long association with nature. Jain and Sinha (1988) reported food resources from Indian aborigines. These tribals consume 144 non-conventional food resources which are playing major role in nutritional point of view (Kulkarni, 2006). Majority of tribals consume members of family Araceae as vegetables. Some species of *Alocasia*, tubers of *Amorphophallus*, leafy vegetables of *Ariopsis. Colocasia, Remusatia*, flowering stalk of *Sauromatum*. Most of these plants have some irritating substance and they prepare it very carefully washing and adding some sour plant leaf for removing toxicity during the cooking. On this back ground leafy vegetables like *Ariopsispeltata* Mimmo and *Remusatia vivipara* (Roxb.) Schott & Endl. were analysed for nutritional point of view. (Kulkarni *et al.*, 2003; Nilegaonkar *et al.*, 1985) evaluated some wild tubers which include *Sauromatum*, *Colocasia*, *Dioscorea*, etc. Wisdom of tribal people regarding processing of wild toxic tubers /leafy vegetables is remarkable.

Gondia tribe in Deolapar region settled in remote hilly area of Ramtek. This region is known as Vidarbha and 80km away from Nagpur. Mahabale (1987) published Gazetteerof India- Maharashtra state, which include Botany and floristic account of Vidarbha region. Balapure (1971) reported plants from Ramtek forest division. He was not reported wild vegetables from the same region and family Araceae too.

This area has thick forest and 1/4th part is occupied by Pench National Park. Gondia communities are depend on forest area for their day to day needs like food, fodder, medicines, etc.. Most of the tribes are concentrated in heavily forested areas that combine inaccessibility with limited political or economic significance. The economy of most tribes arebased onagriculture produce, collection of minor forest produce from forest and hunting of birds / wild animals.

Once upon a time these people are totally depend upon wild vegetables but nowadays they cultivate vegetables like wild relatives of Cowpea, Chillies, Brinjal, Sweet potato, Ginger, etc. in their small farm yard or kitchen garden. These people are still depending on wild food resources during monsoon season and consume with traditional way. The young generation are not much aware about wild vegetables.

Theriophonum indicum (Dalz.) Engler is the herb and locally called as Undirkan.

It is cormatous, perennial herb, leaves ovate-lanceolate, elliptic-oblong, shallowly hastate at base, flowers unisexual, separated by neuters in spadix appear with leaves. Spathesob lanceolate, male flowers numerous, sessile. Ovules numerous, basal and apical, berries angular, 4-5 seeded.

Indian Journal of Fundamental and Applied Life Sciences ISSN: 2231-6345 (Online) An Online International Journal Available at http://www.cibtech.org/jls.htm 2013 Vol. 3 (4) October-December, pp.35-38/Suwarna and Kulkarni **Research Article**



During the first shower of rain in June –July leafy vegetables are available on a large scale. *Theriophonum indicum*, local name is based on its leaf structure look like the ear of mouse so local people called as Undirkan. It has high steroid content so its recipe preparation method is very specific and interesting.

Recipe Preparation

Procedure 1

Step 1: Collection of *Theriophonum indicum* (Undirkan) young leaves with shoot and washing it in running water. Peel it properly and cut into quarters (pieces).

(Before cutting, hand washing is necessary and polish the hand with oil otherwise itching/irritating the hand at the time of cutting. This experience recorded by local women)

Step 2: Take single pot having cut pieces of vegetable. Filter and mix rice powder into cut vegetables. Add Red Chilli powder, Cumin, Turmeric and salt in it with some water.

Step 3: Take another plate: Cut Onion, tomato, green chilly into very small pieces and mix it properly in the mixture of step 2 and then make round shape ball of properly mixed vegetable.

Step 4: Fill a medium-size cooking pan with water, adding a sprinkle of salt. Boil the water on the stove. Place all the round shape ball of mixed vegetable on baking pan and place that baking pan on that cooking pan having boiling water. Steam the vegetable on a normal flame for 15-20 minute. After 20 minutes steamed vegetable is - ready to eat.

Note

(During that particular time of interval, vegetable reduces its itching property. Itching in throat is its natural property and so we can't consume it directly like green leafy salad and this is the whole procedure to reduce it. Specially add some sore content like lemon juice, Tamarind, etc. and steaming procedure).



Indian Journal of Fundamental and Applied Life Sciences ISSN: 2231-6345 (Online) An Online International Journal Available at http://www.cibtech.org/jls.htm 2013 Vol. 3 (4) October-December, pp.35-38/Suwarna and Kulkarni

Research Article

Further Procedure: to make Vegetable Tasty

Step 1: Take 2nd pot: Heat vegetable oil in a deep fryer or large, heavy pan until very hot and cumin. Cut tomato, onion, chilly. Then add water and Heat it.

Step2: Put the steamed vegetable into the oil. You should heat a bubbling sizzle. Cook for five-six minutes; remove using a slotted metal spoon.



Step3: Steamed it on a low flame for 4 minutes. Allow to cool for 3 minute. Remove and serve hot with Jowar roti, Wheat's Chapati or Rice. This super delicious vegetable is ready to eat.

RESULTS AND DISCUSSION

Gondia tribe from Deolapar are consuming wild vegetables in their diet. Some tubers like *Dioscorea bulbifera* L., *Dioscorea oppositifolia* L., *Taccaleonto petaloides* (L.) O. Ktzeand *Amorphophallus commutatus* (Schott) Engl. are known to them for consumption. These tubers are being cooked with proper care and reported from Orissa (Sinha and Lakra, 2005; Jata *et al.*, 2012). *Theriophonum indicum* (Dalz.) Engler. Leaves are consumed with appropriate method to remove its irritating substances. This document of food preparation is new to science and society.

ACKNOWLEDGEMENT

Authors Are Thankful to Shri G.G. Sohani, President BAIF Development Research Foundation, Pune for encouragement. All the staff members from MITTRA, Deolapar for their valuable co-operation during field work and SHG group for preparation food of wild plant. My special thanks to Ms. Swati Kolamkar, Ms. Vandana Hatmare, Shyam Valode, Mr. Krishna Mhaske. They help me for collection of *Theriophonnumindicum* and its whole recipe.

REFERENCES

Balapure KM (1971). Some additions to our knowledge of the plants of Ramtek (Maharashtra). *Journal of the Bombay Natural History Society* 68 363-377.

Jain SK and Sinha BK (1988). Ethnobotanical aspect of life support species- some emergency and supplementary foods among aboriginals in India. *Life support species: Diversity and Conservation*, edited by Paroda RS, Kapoor P, Arora RK and Mal Bhag. National Bureau of Plant Genetic Resources, New Delhi: 173-180.

Jata SK, Nedunchezhiyan M, Sahoo TR and Lenka A (2012). Sustainable livelihoods through tuber crop. *Odisha Review* 83-89.

Kulkarni DK (2006). Role of ethno-botany in modern agriculture. In: *Proceeding of National Conference on Bridging gap between Ancient and modern technologies to increase agricultural productivity*, edited by Chudhary SL, Saxena RC and Nene YL, publisher Central Arid Zone Research Institute, Jodhpur, Rajasthan, India 104-115.

Indian Journal of Fundamental and Applied Life Sciences ISSN: 2231-6345 (Online) An Online International Journal Available at http://www.cibtech.org/jls.htm 2013 Vol. 3 (4) October-December, pp.35-38/Suwarna and Kulkarni

Research Article

Kulkarni DK, Agte VV and Kumbhojkar MS (2003). Leafy vegetables consumed by Mahadeokoli tribe in Western Maharashtra with their nutritional potential. *Ethnobotany* **15** 34-38.

Mahabale TS (1987). Gazetteer of India, Maharashtra State-Botany and Flora of Maharashtra. Edited by Chaudhari KK, Bombay Gazetteers Department, Govt. of Maharashtra 370-416.

Nilegaonkar S, Vartak VD and Chitre RG (1985). Nutritional evaluation of some wild food plants from Pune and neighbouring districts, Maharashtra state-part-I. *Journal of Economic and Taxonomic Botany* **6**(3) 629-635.

Sinha R and Lakra V (2005). Wild tribal food plants of Orissa. Indian Journal of Traditional Knowledge 4(3) 246-257.