International Journal of Science and Research (IJSR)
ISSN (Online): 2319-7064
Index Copernicus Value (2013): 6.14 | Impact Factor (2015): 6.391

Folk Lore on Some Epiphytic, Parasitic and Pteridophytic Plants Species used among Tribals of East Khandesh Region of Satpuda Forest, Maharashtra, India

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Abstract: ***Study covers the area falls in Jalgaon district situated between 20^0-17' and 21^0-26' north latitude and 74^0-47' and 76^0-28' east longitude. Topographically it can be distinguished as 1) The Tapi rich valley in the centre,2) The high mountainous ranges on the north & 3) Barren ridges of Satmala and Ajanta ranges on the south. The study is confined to first two regions only and more specific to Satpuda mountainous ranges from 2006-2009. Present study reveals about total no. of medicinal plant families '82 'composed of pteridophytes (3), Dicots (66), and monocots (13). The genera are 234, spread over pteridophytes (3), dicots (209) and monocots (22).Similarly Species are 270 out of which pteridophytes are (3), dicots (244) and monocots (23). The most Prominent & common method of administration of medicinal plants is oral 252(56.00%) followed by external 109(24.22%), internal applications are 49 (10.08%), poultice 31 (6.88%), smoking 3 (0.66%) and inhalation 4 (0.88%) and steam bath 2 (0.44%). The present paper highlights 06 less known ethnomedicinal plants used for diseases like Ranikhet, Jaundice, wound healing & skin diseases with reference to botanical name, family, part(s) used distribution, threat Status, & mode of administration.***

Keywords: East Khandesh, Satpuda, Pteridophytes. Parasite, Epiphyte

1. Introduction

Most of the countries worldwide have compiled the information on traditional medicines of centuries old. In India ancient drugs have been mentioned in Rig-Veda which is about 4000-5000 B.C.old. Atharva Veda also described about 2000 medicinal plants. Well documented accounts on properties of medicinal plants are found in Sushruta, Samhita of 1000 BC. Indian Materia-medica accounts about 3500 medicinal plants. Satpuda is rich in biodiversity both in flora and fauna. Tribal's (several tribes like Pawara, Barela & Bhills.) are the inhabitants of the area of Satpuda forest. These people are very poor and cannot afford the expenses for modern medical facilities; hence they are depending on local medicine men's who help them to cure their ailments at lowest cost. East Khandesh Satpuda lies on northern part of Jalgaon district. It is rich in vegetation composed of humid and many semi evergreen species apart from dry deciduous ones. The climate is generally dry except in monsoon. Rain fall is 639.7 to 696.0 mm. The forest types of Satpuda ranges classified by Champion and Seth in 1966 are Dry Teak forest, Southern Dry mixed deciduous forest, Anjan forest & Scrub forest . Studies on medicinal plants of the area are lacking except few sporadic references like Karnik, 1966[13]; Bhamare, 1989[8]; Salunkhe, I.B.1995. [15] Rajput & Yadav, 2000[14]; Yadav & Patil, 2001[17], Bagul, R.M. and Yadav S. S. (2003 a & b)[1&2], Bagul R.M, &. Yadav S.S and B.D. Garud; (2006)[3], Bagul R.M. & Yadav, S.S, (2007)[4], Bagul R.M. 2010[5], 2011a[6] & b[7],[18-20]..

2. Materials and Methods

Present study is based on the field work and literature survey from June 2006 to July 2008 through systematic planning and meticulously exploring the areas for gathering various information related to medicinal uses of plants, During outgoing all the information collected were noted in field book. Pertinent attention was paid to habit, habitat, distribution pattern, diseases for which plants used doseges and mode of administration. As far as possible correct information were confirmed by repeated queries at different places. Specimens collected during the field work are processed for herbarium as per the customary methods suggested by Jain & Rao (1977)[12].Specimens thoroughly studied for correct identification with the help of standard floras viz. Flora of Presidency of Bombay (Cook, 1957 Repr.ed.)[9], Flora of British India (Hooker,1872-1897)[11], B.S.I. Flora of Maharashtra State, Vol. I.II.&III.(Edited by Sharma et al,1996; Singh & Kartikeyan, 2000; Singh & Laksh 2001)[16]. G.P.Roy, B.K.Shukla & Bhaskar Dutta 1992Flora of Madhya Pradesh [10]. (The identification was confirmed by authentically identified species at B.S.I. Pune. Herbarium sheets were neatly labled and deposited in the herbarium of department of botany, A.S.C. College Chopda

Simple Questionnaire (Jain and Bose 1993) used for data collection is like Occurrence of Plant, Respondents age, sex & education, Community Status (medicine man, nurse, doctor), Forest type where plant was found & its availability in nature (Common, Frequent, Rare, Occasional etc), part used to treat part used, Mode of administration (oral, external) & dosages given with, & How many times& days the drugs prepared roughly given (glassful, teaspoonful, paste.).

3. Results

Following are some plants used against various diseases are given with reference to Vernacular Name Botanical

Name, Family, their Distribution, Threat status and Mode of administration of Ethno medicine

MAYAJAL

1. **Marselia quadrifolia** L. PTERIDOPHYTE

Semi aquatic with slender, creeping hairy rhizomes. Fronds usually four foliate, lemma often floating on water surface. Micro and mega sporangia are born inside hard globose sporocarps.

Distribution : Common in wet places, RMB 217, Pal.

Threat Status : Threatened

Medicinal Uses : Irregular Menstrual Cycle: Root extract is useful in Irregular menstrual cycle.

2. Adiantum incisum Forssk. PTERIDOPHYTE

Hairy sprawling toughened fern. Petiole very short, lamina pinnate, narrowly lanceolate. Fronds pinnate, hairy on rachis often rooting at the tips. Sori borne on marginal lobes of the pinnae, indusium absent.

Distribution : On hilly slopes in rocks, RMB 425, Manudevi.

Threat Status : Endangered

Medicinal Uses : Jaundice & Weakness: A teaspoonful of decoction of

Whole plant is given twice daily for 1-2 months in jaundice and in general weakness.

3. AMARVEL/SONWEL

Cuscuta reflexa Roxb. CUSCUTACEAE

Twinners with creamy yellow or greenish yellow, glabrous fleshy stems. Flowers white creamy cymes or short racemes. Capsule globose. Seed black.

Distribution : Parasite on plants in hedges, RMB 25, Nagalwadi.

Threat Status : Not Endangered

Medicinal Uses : Body heat and burning sensation: To reduce the body heat and burning sensation whole plant is used to extract the juice and applied on the skin.

Critical Note : Traditionally it is used for the treatment of leucoderma and bone growth (Sinha & Sinha, 2001)

4. BANDGUL

Dendropthoe falcate (L.f.):

LORANTHACEAE

Bushy, Stem parasites leaves 3.5-11.0x1.5-5.0 cm, broadly elliptic –oblong, almost amplexicaul, sessile. Flowers in axillary, solitary or fascicled racemes. Berries c 0.6x0.2cm red, covered by copular calyx.

Fls. & Frts: September-May

Distribution: Frequent as Parasites on trees, Vaijapur.

Threat Status: - Not Endangered

Medicinal Uses: whole plant is used to extract the juice and applied on the Ranikhet disease of Hens.

Critical Note: Leaf paste made into water is given in urinary troubles & menstrual disorder. Whole Plant is Aphrodisiac, astringent, narcotic, diuretic and for the treatment of asthma, wounds, ulcer and pulmonary tuberculosis (Pooja Sinoria et-al.2011)

5. VANDHA

Vanda roxburghii

ORCHIDACEAE

Stem 1-2 ft.long, stout, simple or branching roots. Leaves thickly coriaceous, 6-8 by ½-3/4 in obtusely keeled, praemorse, with usually 2 unequal rounded lobes .Flowers in 6-10 flowered racemes, bracts scarious 1/8 inch long, ovate, acute, pedicels with ovary 1x1/2-2 in. long. Sepals yellow, tessellated with brown lines with whit margins. Lateral sepals 1 by 5/8 in dorsal sepal as long as the ½ in. broad obovate oblong lateral. Petals yellow with brown lines and with more and whit margins, shorter than sepals. Poliinia ellipsoidal or subglobose, capsules 3-3by ½ in long.

Fls. : July

Distribution: - Epiphyte on Mango, Teak & members of Combrataceae.

Threat Status: -Not Endangered

Medicinal Uses: -Roots of the plant are used to extract the juice and applied on skin disease.

6. Nephrolepis exaltata

POLIPODIACEAE.

Nephrolepis exaltata has 50–250cm (20-98 inch) long and 6–15cm (2-6 inch) broad in tufted clusters arising from underground rhizomes. The individual pinnae (leaflets) are as much as 2 to 8cm (1-3 inch) long and shallowly toothed, but not further divided. The pinnate vein pattern is also visible on these highly compound leaves. The round sori (clusters of spore-bearing organs) are in two rows near the margins on the underside of the pinnae.The fronds grow upright at first, then arch gracefully downwards. They grow in lovely arching rosette shaped and spread by runners.

Distribution: Frequent as on hilly regions in the crevices of rock during Rainy season at Melane, Deoziri.

Threat Status: - Endangered

Medicinal Uses: Leaf juice of the plants are used to extract the juice and applied on Stomachache.

4. Discussion and Conclusion

Most of the information reported from the tribal's of the area is found to be less known to the literature of Indian medicinal plants. The plants mentioned here are still popular in this area and enjoyed good reputation in traditional medicines used on diseases mentioned herewith. It is also found that all the Pteridophytic plants used for Irregular Menstrual Cycle, Jaundice & Skin diseases. While Epiphytic plants are used on the diseases like of domestic animals like Ranikhet, Wound healing and Skin diseases, but there is no report of severe infections by using these plants Most of the drugs are utilized in fresh mode and in the form of paste mixed with food and water.

It is also needed to evaluate pharmacologically the efficiency of these plants against claim. Most of the plants reported herewith are under threat due loss of vegetation and excessive exploitation for medicinal purpose. It is necessary to make further investigations on these ethnomedicines for conservation of biodiversity to protect extinction of the ethno medicinal plants .There is also need to brought these plants under cultivation in a systematic manner to meet demands from traditional drug based market. From the study it can be observe that most of prescriptions are applied

externally. Generally single plant part is used but sometimes many plant parts in combinations are also used for the treatment of diseases.

5. Acknowledgement

Author is grateful to all the traditional healers who participated in the survey for their valuable cooperation during the study.

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