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Study of some Traditional Medicinal plants in Chaturgarh Forest Region

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Abstract - An Ethenomedicinal survey was done in the month of august to september 2019, in different area of Chaturgarh forest and ethenomedicinal knowledge were collected through inhibited tribes and local peoples called vaidya or baiga. This forest area is inhibited in korba district. Climatic condition of this region in general wet and humid type. This region have large tribal population of Gond, Baiga, Bhumiya ,Binjhwar ,Halwa, Kanwar, Korwa, Hilly Korwa, Khariya, Agariya, Halba, Hulbi, etc. Many small villages are present in this forest region. During the survey knowledgeable person, vaidya, were interviewed and information recorded. The data indicate the uses of 30 ethnomedicinal plants used to cure different disease. Ethenomedicinal plants are Curcuma aromatica, hemedesmus indicus, elephantopusscaber, celastruspaniculatus, andrographispaniculata, swertiachirata, abutilon indicum, achyranthus aspera, boerhaviadiffusa, dioscoreabulbifera etc. We find that important knowledge of medicinal plants gathered by the Trible are needs to be determined in order to develop plans for their protection, improving awareness, proper documentation of indigenous knowledge about the plants used by them.

Keywords - Ethnomedicinal, Inhibited, Disease, Protection, Awareness.

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INTRODUCTION

The state of Chhattisgarh has a wide floristic bio-diversity of ethno medicinal plants. Ethno botanical studies of plants are intertwined with human anthropology and the climate. Many ethno botanists have been collecting data on medicinal plants from various parts of the country over the last three decades. India has one of the world's most extensive plant medicine traditions. It's a heritage with exceptional contemporary relevance for maintaining the health security of the world's burgeoning population. The primary goal of this research is to create a database of indigenous medicinal plant knowledge utilized by local traditional healers in Chaturgarh Forest to treat various ailments. This state has a lot of greenery, a lot of history, and a lot of ethnic groups. The state's major tribes include the Gond, Agariya, Bhumia, Baiga, Bhinjhuar, Korwa, Kanwar, Binjhwar, Oraon, Bhatara, Kamar, Mandia, Bhariya, Pardhi, and others. Since those tribes live in rural and hilly areas, they use a variety of medicinal plants and their products to treat a variety of human and animal ailments. They offer a method for identifying clinically useful compounds from plant products. A medicinal plant is one that contains substances that have definite curing properties in the treatment of various diseases in one or more of its organs (leaves, flowers, seeds, roots, barks, stems, etc). (WHO, 2002). Herbal medicines have been used in India's traditional medicine systems since ancient times. The earliest comprehensive written account of Indian medicine is found in the Charak – samhita (1000 B.C.).

LITERATURE REVIEW

Singh (2016) studied in an ethnobotanical study of medicinal plants in Bhiwani district of Haryana, India and obtained through personnel interview more than 30 species belonging to 20 families of medicinal plants. **Sharma and Ekka, (2016)** studies in diversity of medicinal plants in Pt. Ravi Shankar Shukla University campus, Raipur, Chhattisgarh and identified 184 medicinal plants belonging to 68 families those are curable for different disease of Human being and other animals. **Sharma (2001)** Plant based traditional knowledge has become a recognized tool in the search for new sources of drugs and neutraceuticals. Medicinal plants were added for Care in primary health because people usually feel better after using traditional medicine,

and the cost of these medications is substantially lower than contemporary drugs **(Kusum *et*. al. 2016).**

MATERIALS AND METHODS

Study Area

The district is situated in the northern part of Chhattisgarh State and is surrounded by 5 districts of the State, namely Koriya in the North, Bilaspur in the West, Janjgir-Champa in the South, Raigarh in the East and Surguja in the North-East direction. This area is rich in Forest wealth. The district has two forest divisions namely Korba and Katghora. Chaiturgarh (also known as Lafagarh) is a fort about 51 kilometres (32 mi) from Katghora tehsil, Korba district, Chhattisgarh, India, on the Korba-Bilaspur road.

Figure 1: Korba district tehsil map

Survey

The information for this survey was gathered during ethnobotanical studies in various parts of the Korba district. Tribal village markets were also surveyed. Ethnomedicinal studies were carried out in the four villages of Korba district Chaturgarh forest in Chhattisgarh state: (1) Zamra (2) Bagadara (3) Lapha (4) Nagoi. All of the villages were visited on a regular basis.

Interaction with local people and Vaidya

DATA COLLECTION

Primary and secondary data will be gathered from different sources according to the nature and requirements of the present research issue. Data was gathered in their local language through semi-structure interview questionnaires and focus group discussions with the informants, Personal observations, oral interviews, and conversations with the villagers served as the foundation for gathering information about the plants' uses. Plant parts like leave, stem, twig of plant is collected and photographs are also taken in field.

Identification of plant

The plant specimen were collected and identified by referring standered local flora (Central Flora).

The plants were identified with the existing literature and with the help of Dr. M.L. Nayak (Retired Professor of Botany from Pt. Ravi Shankar University Raipur), Villagers and Local Vaidyas.

RESULTS AND DISCUSSION

The present study revealed the ethnobotanical knowledge of people in Chaturgarh forest. A total of 30 species in26 genera under 20 families have been documented. Mostlyplants are belonging to different families viz- CelastraceaeBoraginaceae Euphorbiaceae Rubiaceae Ampelidaceae Bignoniaceae Amaryllidaceae Mimosaceae Verbenaceae Zingiberaceae Liliaceae Asclepiadaceae Papilionaceae Asteraceae Asclepiadaceae Convolvulaceae Menispermaceae Verbenaceae SterculiaceaeApocynaceae Caesalpiniaceae StyraceaeMalvaceae and Acanthaceae. Generally fresh part of the plantcan is used for the preparation of medicine. Most of the plant species are reported to be quite effective remedies for different diseases, such as fever, diarrhea, dysentery, diabetes, jaundice, backache, stomach, ulcers, cold, cough, etc. These plants are also used by the local herbal healers as traditional medicines. The local people use these plants to cure various minor to major diseases. Medicine formsthese plants are prepared in many ways and different parts ofplants are used in different maladies. The plants' family names, botanical names, vernacular names, voucher specimen numbers, plant forms, plant parts used, and methods of preparation and of administering treatments appear in table-1.

Table 1: Traditional medicinal plants in Chaturgarh forest region

S. No.	Botanical Name	Vernacular name	Family	Medicinal value
1	*Celastrus paniculate*	WilldMalkangini	Celastraceae	It used as brain tonic for increasing memory.
2	*Cordia macleodii*	Dahiman, Dahipalas	Boraginaceae	Mouth sores (leaf), treating jaundice (bark)
3	*Croton tiglium*	Jamalghota, Dantichhoti, Triphals	Euphorbiaceae	Croton seeds to treat gallbladder problems, colic, blocked intestines, and malaria.
4	*Leea macrophylla*	Hatkan	Ampelidaceae	Namely bone fractures, healing cut injury, typhoid, sexual weakness,
5	*Oroxylum indicum*	*Oroxylum indicum*	Bignoniaceae	Aphrodisiac, tonic, increases appetite, useful in "vata", biliousness, fevers, bronchitis, intestinal worms,
6	*Curculigo orchioides*	Kali musli	Amaryllidaceae	Neurasthenia, urinary retention,
7	*Prosopis spicigera*	Shami	Mimosaceae	Dysentery, asthma, leucoderma, dyspepsia and earache
8	*Clerodendron serratum*	Bharangi	Verbenaceae	Skin diseases, venereal infections, elephantiasis, asthma, topical burns and for rheumatism.
9	*Costus speciosus*	Keo-Kanda	Zingiberaceae	Burning, Skin disease. Bronchitis, Fever
10	*Gardenia lucida*	Deekamali, Kamari	Rubiaceae	Wound healing, sprains, and muscle soreness. In food, gardenia is used as a yellow food colorant.

11	*Gloriosa superba*	Kaliyari, Kolihari,	Liliaceae	snake bites, scorpion stings, parasitic skin diseases, urological pains, colic, chronic ulcers, piles, gonorrhoea, gout, infertility, wounds,
12	*Gymnema sylvestre*	Gurmar, Madhunashini, Ajgandhini	Asclepiadaceae	Reduces Sugar Cravings by Making Sweet Foods Taste Less Appealing. . Helps Lower Blood Sugar Levels.
13	*Flemingia nana*	Balraj	Papilionaceae	The roots of Flemingia nana are used in ulcers and swelling
14	*Glossogyne pinnatifida*	Tejraj	Asteraceae	Sexual disease
15	*Hemidesmus indicus*	Anantmool, Kalisar, Kaliduddha, Shyamlata,	Asclepiadaceae	Digestive, Laxative, Diarrhea, Dysentery, Skin disease
16	*Ipomoea mauritiana*	Patalkohda, Bhukumda, Badkakanda	Convolvulaceae	Fever, Swelling, Rheumatism, Galactogogue, Antioxidant, Antitumor, Antiviral, Anti-inflammatory
17	*Tinospora cordifolia*	Giloe, Gurach	Menispermaceae	Piles, eye problem, fiver, jaundice, Arthritis
18	*Vitex negundo*	Nirgundi, Nigori	Verbenaceae	Toothache, Dysentery, Skin disease
19	*Smilax zeylanica*	Sherkand, Ramdatoon	Liliaceae	Skin disease and acts like a blood purifier.
20	*Sterculia urens*	Kullu, Gulu, Kulli,	Sterculiaceae	Leucoderma, Peptic ulcer

21	*Cassia glauca*	Jamrasi, Kalamuka, Bakra	Caesalpiniaceae	Improvement in the blood sugar level and normalization of liver functions
22	*Holarrhena antidysenteric a*	Kutaj, Indrayan, Koreya	Apocynaceae	Parasiticidal, Diarrhea, Dysentery, Bleeding disorder, Weakness
23	*Symplocos racemosa*	Lodh	Styracae	Treat skin diseases (such as leprosy), dropsy and liver complaints.
24	*Xanthium strumarium*	Gokhru, Gokhara,	Asteraceae	Laxative, fattening, anthelmintic.
25	*Barleria cristata*	Vajradanti	Acanthaceae	Febrifuge, Urinary & Paralysis affection, Stomach disorder, Fever, Rheumatic pain, Itch
26	*Eclipta alba*	Bhringraj, Keshraj, Bhangra	Asteraceae	Malarial fever, Could, cough, Asthma, Jaundice, Headache, Night blindness
27	*Helicteresisora*	Marodphalli, Eaithi	Sterculiaceae	Diabetes, Stomach infections, Amoebic dysentery
28	*Abutilon indicum*	Kanghi, Kakahi, Kaghai,	Malvaceae	Diuretic, Laxative, Toothache
29	*Spilanthes acmella*	Akarkara, Akalkhra	Asteraceae	Anaesthetic , Toothache

Figure 2: Achyranthes aspera

Figure 3: Celastrus paniculatus

Figure 4: Clerodendron serratum

Figure 5: Cordia macleodii

Figure 6: Costus speciosus

Figure 7: Curculigo orchioides

Figure 8: Gardenia resinifera

Figure 9: Hemidesmus indicus

Figure 10: Holarrhena antidysenterica

Figure 11: Leea macrophylla

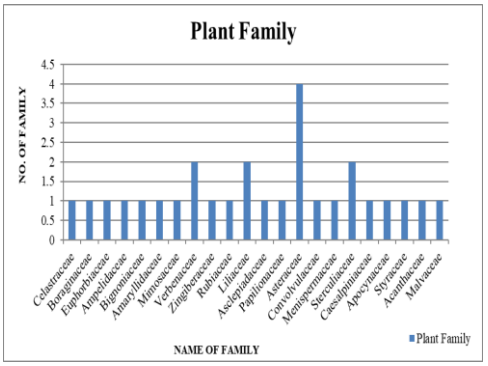

Figure 12: Family distribution of medicinal plant in study area

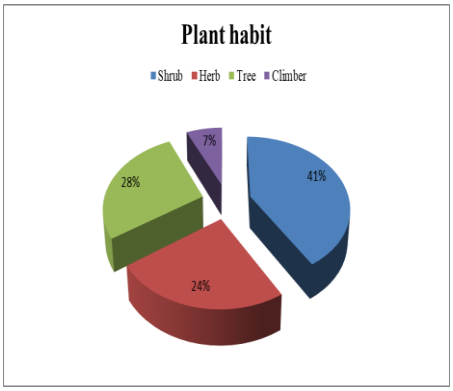

Figure 13: Percentage of medicinal plants habitat in study area

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Our entired Chhattisgarh Vigyan sabha team members korba area .

CONCLUSION

The local people of the study area are knowledgeable about the plants that provide remedies to humans and livestock health problems. However, the area is losing its natural vegetation cover together with the medicinally valuable species rapidly. This study will provide some potential leads to fulfil needs of search of various new drugs to fight against disease in future prospects. Work is helpful for identification of rarely distributed plant species those are ethnomedicinal.

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