

# CHAPTER I

## 1. INTRODUCTION

### 1.1 Background

Ethnobotany is the science that deals with documentation of traditional knowledge on the use of plants for a wide diversity of primary survival and aesthetic purposes. It investigates human interaction with plants and their ecosystem. Ethnobotany is now recognized as a multidisciplinary science, which comprises many aspects of plant science, history, anthropology, culture, botany, ecology, literature, etc (Shengji,1998) Ethnobotany plays a significant role in the development of agriculture, pharmaceutical industries, biotechnology, environment and conservation of biodiversity (Jain, 2006).

Along with the progress in human civilization, the demands of human were met to a great extent by plants and their products. The utilization of plants for different purposes is very high in remote rural areas in comparison to the urbanized areas. In many tribal societies particularly those living in remote rural areas of Nepal, indigenous knowledge on plants are being largely utilized as an exclusive means of combating human as well as animal diseases (Chaudhary, 1998). Medicinal plants, their products, their uses and traditional medicinal practice have been preserved as unwritten tribal folklore.

Nepal is a multiethnic and multilingual country. People live in climatically hot area in the south through the cold area in the north are diversified into many social, cultural, ethnic and language groups. Nepal's ethnic diversity is also noteworthy. The notable groups include Magars, Tharu, Gurung, Tamang, Rai, Limbu (HMG/N, 2002a). Altogether there are 102 ethnic/caste groups in Nepal speaking 92 mother tongues in different geographic belts (CBS, 2005). Due to presence of numerous ethnic/caste groups, it is also rich in cultural heritage and diversity. Nepal thus provides a great opportunity for the ethnobotanical study (Rajbhandari, 1990; 1994). These groups have developed their livelihood strategies and over the time with the changes in the environment and socio-economic condition they have been adopting their livelihood strategies accordingly.

The utilization of plants and plant products as medicine has not diminished in anyway in recent times, but can be traced as far back as the beginning of human civilization (Kunwar *et al.*, 2006). During the continuous process of evolution, the ancient people

have utilized the plant knowingly or unknowingly for different purposes. Generation after generation the practical knowledge of these ancient people came in the form of tradition. But this knowledge was transferred to their new generation only verbally (Bhattarai, 1998; Chaudhary, 1998), so there is great risk of missing the traditional knowledge about plant use pattern for different purposes.

Among many ethnic/caste groups, the use of traditional medicine is widespread. Types of traditional system of medicine vary greatly from region to region and in different ethnic/caste groups based on many historical, economic and cultural factors so a same plant can be used to cure different diseases. Many Nepalese people still do not have access to the modern medicinal facilities (allopathic/ ayurvedic) health service therefore the rural people are largely depend upon traditional medicines (Paudyal, 2000).

Nepal is considered big store house of plants and a vast emporium of ethnobotanical wealth. Vast ethnobotanical knowledge and practices have existed in Nepal from ancient times. All of four Vedas (namely *Rigveda*, *Yajurveda*, *Samveda* and *Atharvaveda*) contain the medicinal knowledge. In Hindu tradition, the first documented form of medicinal plant appeared in the Rigveda, an ancient epic of the Hindus, written sometimes between 4500 and 1600BC. This oldest repository of human knowledge has described some 67 plants (Malla & Shakya, 1999). The Ayurveda, a subsidiary text of the Atharvaveda, written around 2500BC mentioned 290 herbal drugs in detail about the therapeutic uses of medicinal plant ((Malla & Shakya, 1999). The process of accessing the knowledge was followed by Nepali *Vaidhays* and *Kabirajs* (879AD) with free formulation of Ayurvedic System (IUCN, 2000). Most of the people in the world still depend on traditional medicinal practices for their primary health care needs. In case of Nepal too, there is a very strong tradition in the use of medicinal and aromatic plants, both as part of Ayurvedic system and the widespread home remedies (Bashyal *et al.*, 1994).

With increasing urbanization and uptake of modern medicines and agricultural practices, much of the indigenous knowledge is now dwindling and largely only retained by village elders. There is real danger that this will be lost to future, therefore younger generation and ethnobotanists should be busy in documenting the wealth of indigenous knowledge for posterity.

Different ethnic/caste groups are residing in Nepal have their own way of using plants in various purposes. People living in rural area have very good indigenous knowledge about the use of plants for different purposes. They have an idea about the use of plants for treating different disease/disorder. The pattern of use of medicinal plants among the different ethnic/caste groups is found to be different.

## **1.2 Ethnobotany**

The term 'ethnobotany' (ethno=race) was first coined by John W. Harshberger, father of American Economic Botany, in 1896, to delimit a specific field of botany as the use of plants by aboriginal people. The main aim of ethnobotany is to document the knowledge about plants that had come through generation to generation and use the knowledge for the benefit of society. If ethnobotany is investigated thoroughly and systematically, it will yield result of great value to the ethnologists, archaeologist, anthropologist, plant-geographers, ethnobotanists, linguists and ultimately to pharmacologists and phytochemists (Shah 1986). Its importance has been recognized as it brings to light numerous less known or unknown uses of plants, some of which have potential wide uses (Chaudhary, 1998).

The science of ethnobotany has recently received much attention in certain parts of the world, particularly in the undeveloped and/or developing countries, where small and large portion of population still depend on natural resources particularly in indigenous condition where the impact on modern system of medicine has not reached (Jain, 1981). Ethnobotany contributes to social, economical, cultural, traditional and environmental development. In most of the developing countries like Nepal threat to biodiversity is initiated by the activities of human being i.e. due to unsustainable harvesting, habit destruction and over exploitation (Chaudhary, 1998). Hence, conservation practice is required at present scenario.

It is estimated that various communities in Nepal use approximately 1000 species of wild plants in traditional medicinal practice and majority of which await proper documentation (Chaudhary, 1998). Though the ethnobotanical uses and practices were known from ancient times, in Nepal, Banerji (1959) started the first ethnobotanical study after publication of a paper on medicinal and food plants from eastern Nepal. Ethnobotanical

studies as well as systematic documentation of useful plants intensified after the establishment of the Department of medicinal plants by the government.

Many scientists, naturalists and thinkers from outside the community of ethnobotanist started emphasizing the importance of ethnobotanical inquiries and exploration. These developments were awareness about deteriorating environment, loss of biodiversity and related traditional or indigenous knowledge, protection of the rights of owners of indigenous knowledge and the need for continued awareness about indigenous knowledge among the new generation of folk as well as the advanced societies.

Recently information on ethnobotanical studies of various tribes and region of Nepal is gradually accumulating. Ethnobotanical literatures dealing with Nepalese flora and local indigenous communities are recorded compiled by Shrestha (1998) and Rajbhandari (2001). The importance of ethnobiological knowledge for suggesting new paths in scientific research, for conservation monitoring, or for understanding ecological processes, has received much attention in resource management (Berkes *et al.*, 2000; Huntington, 2000; Olson and Folke, 2001). International agencies such as the World Wildlife Fund (WWF) and United Nation Educational Scientific and Cultural Organization (UNESCO) have also promoted research on ethnobotanical knowledge, in the context of their joint program, ‘the People and Plants Initiative’ as well as integration of people’s perceptions and practices in resource management at the local level (Cunningham, 2001). The ethnobotanical study revealed a rich local knowledge about the medicinal plant resources and their management (Ghimire *et al.*, 2000).

The efforts and achievements in areas of ethnobotany are notable and significant for bringing into light numerous useful plants. However, integrated studies on indigenous practices and sustainable uses and linkage with other components of ecosystem and systematic scientific studies on chemical constituents of plants and their pharmacological effects on the treatment of disease have not been done comprehensively.

### **1.3 Status of Medicinal Plants in Nepal**

Medicinal plants provide a wide range of subsistence, cultural and monetary benefits to people in the world. The poor and marginalized people, especially in impoverished rural areas can easily afford primary health care from such medicinal plants found around

them. Medicinal plants could be an important revenue generating resources providing important income to economically marginalized and indigenous people in developing countries. But the pattern of harvesting is not sustainable as they harvest without any conservation knowledge. So some most important medicinal plants may extinct in long run. Medicinal plants should be harvested sustainably and used optimally so that they could prove to be a model resource that can benefit both the environment and livelihoods in a balanced manner.

In the Himalayan region, medicinal plants are an integral part of diverse traditional medicinal practice that are highly valued both in folk medicine and in codified traditional medicinal system such as Chinese traditional medicine and Ayurveda (Sivarajan and Balachandran, 1994; Lama *et al.*, 2001). Many people in the rural areas still rely on medicinal plant resources for their medical needs. Shrestha *et al.* (2000) reported over 2000 plant species with ethnobotanical importance among *ca.* 6,500 flowering plants, out of which about 1,600 species of plants have been estimated to be used in traditional medicine and a majority of which awaits proper documentation. Recently, 1,792 species of medicinal plant have been compiled by Baral and Kurmi (2005) distributed in different parts of Nepal.

Medicinal and aromatic plants are local heritage of the global importance (Purohit and Vyas, 2004), which constitute the base of health care systems in many societies. In case of the world a total of 60% of the population and in case of developing countries 80% of the population depend on traditional medicine, mostly plant drugs, for healthcare purpose (Shrestha and Dhillion, 2003). In Nepal, about 80% people depend directly on medicinal plants for healthcare (Manandhar, 1999; Bhattarai, 1999). Traditional medical practitioners, such as Guruwas, Dhams, Amchis, Jhakris, etc. are found in most of the rural villages of the Nepal and they occupy an important position in the Nepalese societies. Consequently, the people depend largely on faith healers and shamanistic treatments (Rajbhandary and Ranjitkar, 2006).

## **1.4 Objectives**

The present study was carried out to fulfill the following specific objectives through scientific documentation of the use pattern of plant and traditional knowledge of eight ethnic/caste groups of Benimanipur VDC of Nawalparasi district to treat various diseases.

- To document indigenous knowledge on the use of medicinal plant species to treat different diseases as well as to document multiple uses of medicinal plants in other purposes.
- To explore variation in ethnobotanical knowledge among eight ethnic/caste groups.

## **1.5 Justification of Study**

Benimanipur VDC of Nawalparasi district is very rich in Biodiversity as well as rich in cultural heritage due to presence of over 15 ethnic/caste groups (HMG/N, 2002b). The major ethnic/caste groups of Benimanipur VDC are Brahman, Chhetri, Magar, Tharu, Gurung, Kumal, Newar, Damai, Kami, etc. The most dominant ethnic group in the study area is Magar.

Due to the lack of modern facilities of hospitals, doctors and allopathic medicine, people in rural areas mainly depend on treatment provided by traditional healers by using local plants for their primary health care. The rural communities are knowledgeable about the uses of different plant species and this wisdom is in danger of disappearing (Rijal, 1998). Ethnobotanical studies help to rescue disappearing ethnic knowledge and use this information to develop sustainable forest use programs, which benefit the local people, thus enhancing the people's participation in conservation.

The system of traditional medicinal use of plants varies greatly in different ethnic/caste groups within a same geographical area based on many historical, economic and cultural factors; therefore, the same plant can be used to cure different diseases. Plants not only have only one use, a single plant may have multiple uses (medicinal, edible, fodder, fish poisoning, timber, handicrafts, beverages, spices and condiments, oil extracts, 'Marcha' preparation, etc.)

The ethnobotany and traditional knowledge in Benimanipur VDC of Nawalparasi have not been previously explored. Therefore, the study was mainly addressed to document the indigenous knowledge of eight ethnic/caste communities on the utilization of wild plant resources to fulfil their requirements in different forms. This study was also mainly focussed on parts use as well as mode of use of medicinal plants to cure different ailments and ethnobotanical knowledge variation among different ethnic/caste groups present in the study area. Multiple uses of medicinal plants were also documented among different ethnic/caste groups. The importance of this study is also justifying the urgent need in conservation of indigenous plant resources along with traditional knowledge for the survival of the local people.

### **1.6 Limitation of Study**

The study intends to explore the detail traditional indigenous knowledge of different ethnic/caste groups within the study area. Out of over 15 ethnic/caste groups present in Benimanipur VDC (HMG/N, 2002b), due to lack of time, only 8 ethnic/caste groups have been included for the research work. The lower ethnic/caste groups can not be studied separately so these are categorised in one group naming as 'Dalit' including 'Damai' and 'Kami'. The ethnic/caste group with population number below 100 were excluded. Also it was not possible and time consuming to visit each and every house to take interview with local people due to scattered nature of settlement. The informants had to be short listed but attempt was tried to interview all the members from each Ward and also representing each ethnic/caste groups by gathering them in a particular place calling in community meeting.

Attempt was also made to collect sample of specimens from the study area, especially from forests, but due to adverse weather, poor transportation facilities, risk of poisonous snakes it was not possible to collect sufficient specimens as expected.

This study doesn't claim to have presented a complete documentation of ethnobotanical knowledge of the study area. However, this study can be taken as a reference for further studies in the ethnobotanical and indigenous knowledge of medicinal plants.

## CHAPTER II

### 2. LITERATURE REVIEW

There is a close relationship between plants and living creature. The history of utilization of plants is very old and it is assumed that the use of plants was started along with human civilization. Many work related to ethnobotanical field have been done in abroad as comparision to Nepal. Various literatures dealing with the ethnobotany within country and abroad have been reviewed in this study.

#### 2.1 Ethnobotanical Work done Outside Nepal

Maheshwari *et al.*, (1981) studied the ethnobotany of the Tharus of Kheri district of Arunanchal Pradesh and reported altogether 62 medicinal plants with their use in treating 26 different diseases.

Maheshwari *et al.*, (1986) studied ethnobotany of tribal of Mirjapur district, Uttar Pradesh mentioned 73 species were used for various medicinal purposes out of 244 species.

Singh and Maheshwari (1992) studied the ethnobotany of Tharus of Gorakhpur district, Uttar Pradesh and altogether 30 medicinal plants were reported with their uses for the ailments of different diseases. The information on ethnomedicinal preparation, dosage and mode of administration, etc. of the species was also recorded in this work.

Nath (1997) carried out a survey in indigenous medicinal plants used for abortion in some districts of Uttar Pradesh. A total of 14 plant species were found to be used by woman for inducing abortion in his research work.

Iqbal and Hamayun (2004) studied 187 plant species of ethnobotanical importance, belonging to 75 families from remote Hindukush-Himalayan region of Malam Jabba. Among them 95 species were reported as medicinal plants, 57 species were reported as agro forestry based plants, 39 species were reported as vegetable and pot herb, 32 species as ornamental, 31 species as honey bee attracting plants, 32 species as agricultural tool making, 30 species as plants yielding edible fruits, 27 species as thatching and sheltering, 19 species as fencing and hedge plants, 16 species as poisonous plants and 14 species as timber yielding plants.



Treyvaud Amiguet *et al.*, (2005) studied ethnobotanical practices in Q'eqchi Maya of Southern Belize by using consensus methodology. In this study 169 medicinal plant species belonging to 67 families and use of the plants were grouped into 17 usage categories.

Collins *et al.*, (2006) studied the medicinal plant traditions of two distinct East Timorese cultures including Laklei and Idate. They compared the traditional use of medicinal plants by using quantitative ethnobotanical methods. They found 11 of the 86 medicinal plant species documented were used by both cultures of which only 6 had similar mentions.

Koche *et al.*, (2008) documented the indigenous folk knowledge of the inhabitants of the Nagzira Wild Life Sanctuary in eastern Maharashtra, India. A total of 70 different plant species belonging to 32 families, having ethnobotanical and ethnomedicinal uses were reported.

## **2.2 Ethnobotanical Work done Inside Nepal**

Manandhar (1985) carried out the ethnobotanical notes of certain medicinal plants used by Tharu of Dang district. In his study he reported 79 medicinal plant species.

Chaudhary (1989) presented information about the medicinal plants and traditional medicinal practice in Nepalese context. The report emphasizes the scope of medicinal plants and its importance which fills up the gap of knowledge of the existing plant wealth and uplifts the economy of the country.

Manandhar (1989) illustrated 107 plant species having ethnobotanical importance among Chepang of Makwanpur district.

Manandhar (1990) studied 74 plant species that were used to treat about 24 ailments as folk-lore medicine of Chitwan district, Nepal. In this study, he also discussed dose and mode of application.

Manandhar and Chaudhary (1992) described 70 medicinal plant species with their distribution, uses, mode of preparation and doses in Saptari district of Nepal.

Muller and Boker (1993) carried out the ethnobotanical study among the Tharus of Chitwan district. In this study he mention 61 plants species serving as food (the tubers, leaves or fruit), construction, culture material and also reported 62 medicinal plants for curing different disease\disorder.

Manandhar (1996) carried out an ethnobotanical study in Nepal in terms of conservation of economically important plants by rural people. He also gave ethnobotanical note on Bhorla (*Bauhinia vahlii*) in 1997.

Siwakoti and Verma (1996) studied ethnomedicinal uses of plants in the Terai of Eastern Nepal. They reported 209 species used in various purposes from both wild and cultivated field.

Joshi and Shrestha (1998) studied 115 species of plants having medicinal value; among which 4 species belongs to Pteridophytes, 3 species belongs to Gymnosperm, 7 species belongs to monocotyledon and 101 species belongs to dicotyledon from the Pashupati area along with their vernacular name, short description and uses.

Siwakoti and Siwakoti (1998) studied 70 ethnomedicinally important plant species used for treating various diseases and ailments along with their families, local names, scientific name among Limbu tribe of Morang district.

Dangol and Gurung (2000) studied 181 species having medicinal value used in various forms for different purposes in Darai ethnic group of Chitwan district. This paper also highlights the need of future program for investigating and conserving traditional knowledge on natural resources for community development.

Joshi and Joshi (2000) conducted a study on indigenous knowledge and uses of medicinal plants by local communities of the Kaligandaki watershed area and reported 48 medicinal plants belonging to 37 families. Among them 22 species are used for gastrointestinal disorder, 12 species are used to treat dermatological illness, 8 to treat cough, fever, headache and respiratory illness and 5 for genitourinary complaints.

Siwakoti and Siwakoti (2000) enumerated 122 plant species used belonging to 114 genera and 57 families that are used as medicine by 'Satar' tribe of Nepal with botanical name,

family, local name, short description, parts used in the treatment of various diseases and disorders.

Thapa (2000) studied altogether 24 species of medicinal plants from Lalitpur district, among them 6 species including *Ageratum conyzoides*, *Artimisia japonica*, *Eupatorium adenophorum* were used to treat cuts and wounds; the species as *Elaegnus parviflora*, *Prunus cerasoides* used against skin infection and the species as *Valeriana jatamansi*, *Zanthoxylum armatum* used to cure stomach ache.

Niraula (2001) described 63 species of medicinal plants with their parts used, purpose and mode of preparation from Tinjure hill including 1 lichen, 4 pteridophytes and 58 species of angiosperm. Among these plants, six species including *Artimisia dubia*, *Centella asiatica* and *Eupatorium adenophorum* were used to treat cuts and wounds, 3 species including *Acorus calamus*, *Rheum australe* used to treat scabies and skin diseases. *Cuscuta reflexa* used to cure jaundice, 4 species including *Phyllanthus emblica*, *Swertia chirayita* used to cure cough and cold.

Oli (2001) reported 127 species of useful plants while studying the local knowledge on plant utilization among the major ethnic communities in the eastern Churiya, Nepal. Of this, 88 species are recorded as medicinal plants used for more than 35 types of diseases/disorders, 75 species as food and 42 species of both medicinal and food value. Among 88 reported medicinal plants 42 medicinal plants are used for 25 common diseases/disorders.

Rajbhandari (2001) published a book on Ethnobotany and included 562 species of wild flowering plants and ferns (538 species of angiosperm, 12 species of gymnosperm and 12 species of pteridophytes) having ethnobotanical importance from different parts of Nepal along with local names and uses.

Thapa (2001) documented altogether 135 plant species from around Royal Shuklaphanta Wild-life Reserve along with their scientific name, local name, brief description, use, parts used. Among these plants, 14 species including *Achyranthes aspera*, *Ageratum conizoides*, *Clerodendron viscosum* were used for cuts, wounds and skin diseases, 9 species including *Bauhinia vahlii*, *Dalbergia sisoo*, *Syzygium cumini* used to cure diarrhoea, dysentery and gastric problem. 3 species including *Lucus cephalotus* used

against jaundice; 6 species including *Mentha longifolia*, *Ocimum tenuiflorum* used for fever; 3 species including *Cassia tora*, *Ricinus communis* used to treat rheumatic pain.

Chaudhary *et al.* (2002) reported 142 plant species from Makalu-Barun region, Eastern Nepal, while studying the traditional use of plants by the indigenous people. Among 142 species reported by him, 60 species were found to be medicinal, 70 species fodder plants, 22 species of wild edible plants and 46 plant species were reported to be miscellaneous use. The plant species were documented along with their detail information including local vernacular names, habit, parts use, purpose and mode of use.

Dangol (2002) documented the indigenous knowledge on the utilization of plant resource by the Kumal community from two VDCs of Chitwan District. A total of 97 wild plant species were recorded and categorised as medicinal, edible, ceremonial, fodder, fuelwood, timber, dye-yielding, poisonous and construction. Among 97 plant species studied, 66 plant species had medicinal value, 41 species were reported as food and food additive, 10 species had religious value, 5 species were toxic, 18 species were reported for fodder, 12 species as dye-yielding, 12 species as fuelwood and 14 species were reported for construction purpose.

Gautam (2002) documented traditional knowledge about the plant used by Tharu communities for curing respiratory ailments from Nawalparasi district, Southern Nepal. Altogether 33 plant species were reported for curing respiratory diseases.

Gurung (2003) documented 73 plant species from some VDCs of Terhathum district including their detail information among which 32 species of medicinal plants belonging to 25 families, 21 species of fodder plants, 34 species of wild edible plants and 26 species of plants with miscellaneous uses has been reported.

Chapagain (2004) documented the ethnobotanical knowledge of Tharu community living in south western buffer zone of Royal Bardiya National Park. A total of 203 plant species has been recorded to treat 73 human ailments and 11 cattle ailments.

IUCN (2004) published a book on medicinal plant in which 187 different plant species were enumerated along with their full author citation, family, common names in different

languages, conservation status and the major documentation on such plant species was also given.

Parajuli (2004) studied ethnobotanical knowledge of Tharus of Nawalparasi district. A total of 42 plant species of medicinal plants are reported among which 29 species were used to treat diarrhoea and dysentery.

Baral and Kurmi (2005) documented 1792 medicinal plant species along with their Latin name, English name, local name, distribution, a short description and uses. Line drawing figure of most of the plants are also given. The plants whether they are endemic, indigenous, wild, cultivated or naturalized in Nepal have been documented in this book.

Kunwar *et al.* (2006) studied ethnobotanical knowledge of local people of Pinda, Muralibhanjyang and Dhading Besi and other areas of Dhading district in Central Nepal and recorded 108 plant species among which 96 plant species are used as medicine.

Thapa (2006) illustrated 49 species of medicinal plants with their use pattern, 25 species of fodder plant with their parts used, 9 species of religious plant with parts used, 18 species of timber plants, 6 species of fuel wood and 14 species of fruit plants used by Tamang community.

DPR (2007) reported 701 medicinal plant species with their description, uses, parts used, flowering, fruiting and distribution in Nepal.

Gurung *et al.* (2007) documented the indigenous knowledge on plant utilization as natural remedy by indigenous people of Sikles area. Altogether 66 species of medicinal plants used by the Gurung community has been documented.

Joshi (2007) explored the tribal methods of utilization of 73 different plant species belonging to 43 families under 62 genera by local people in Sarmoli VDC of Darchula district far western part of Nepal. The traditional healers of local community were found to have very rich knowledge of medicinal plants.

Joshi and Joshi (2007) documented the uses of 44 medicinal plants with indigenous knowledge in Macchegaun, Nepal. They have found some species and their habitats under serious threat due to various natural and anthropogenic stresses.

Shrestha and Shrestha (2007) documented 411 medicinal and aromatic plants among which 383 species belong to angiosperms, 8 species belongs to gymnosperm, 19 species belongs to pteridophytes and 1 species belongs to fungus. The study reports 73 types of common disease with the use of medicinal herbs.

Yadav (2008) studied the ethnomedicine of three VDCs of Rasuwa District by using consensus methodology. Out of the total 49 species, 45 species were reported in consensus list. In this study the diseases were categorized into 11 usage categories and the “Informant Consensus” ( $F_{ic}$ ) factor for each usage category was calculated which showed high  $F_{ic}$  value in “Skin tissue cellular disorder (SKI)”.

## CHAPTER III

### 3. DESCRIPTION OF THE STUDY AREA

#### 3.1 Geographical Location and Climate

The Benimanipur VDC lies in Nawalparasi district of Lumbini zone of Western Development Region of Nepal. Nawalparasi district lies between  $27^{\circ}21' - 27^{\circ}52'$  N latitude and  $83^{\circ}32' - 84^{\circ}28'$  E longitude with the range of elevation from 91 to 1936 metre. It is surrounded by Chitwan district to the east, Palpa and Tanahu district to the north, Rupandehi to the west and India to the south. The district consists of 73 VDCs covering an area of 216, 200 ha. (approx.). The total population of Nawalparasi district is 562870 (HMG/N, 2002b).

Study was conducted in Benimanipur VDC of Nawalparasi district which covers an area of 6900 ha. (approx.). The Benimanaipur VDC lies between  $27^{\circ}37' - 27^{\circ}43'$  N latitude and  $83^{\circ}49' - 83^{\circ}55'$  E longitude with the average elevation of 200m and about 12 km north from Dumkibas (Mahendra Highway). The place is historically known as Sardi as people from the surrounding northern hills used to migrate to this place and stay here for some months in order to protect themselves from the acute cold (Sardi) in the hills. This VDC is bordered by Rakachuli VDC and Jyamire VDC to the north, Dumkibas VDC to the south, Nayabelani VDC to the east and Dhurkot VDC to the west.



Photo 1: Village boundary on northern side (Courtesy: M.R. Gubhaju)

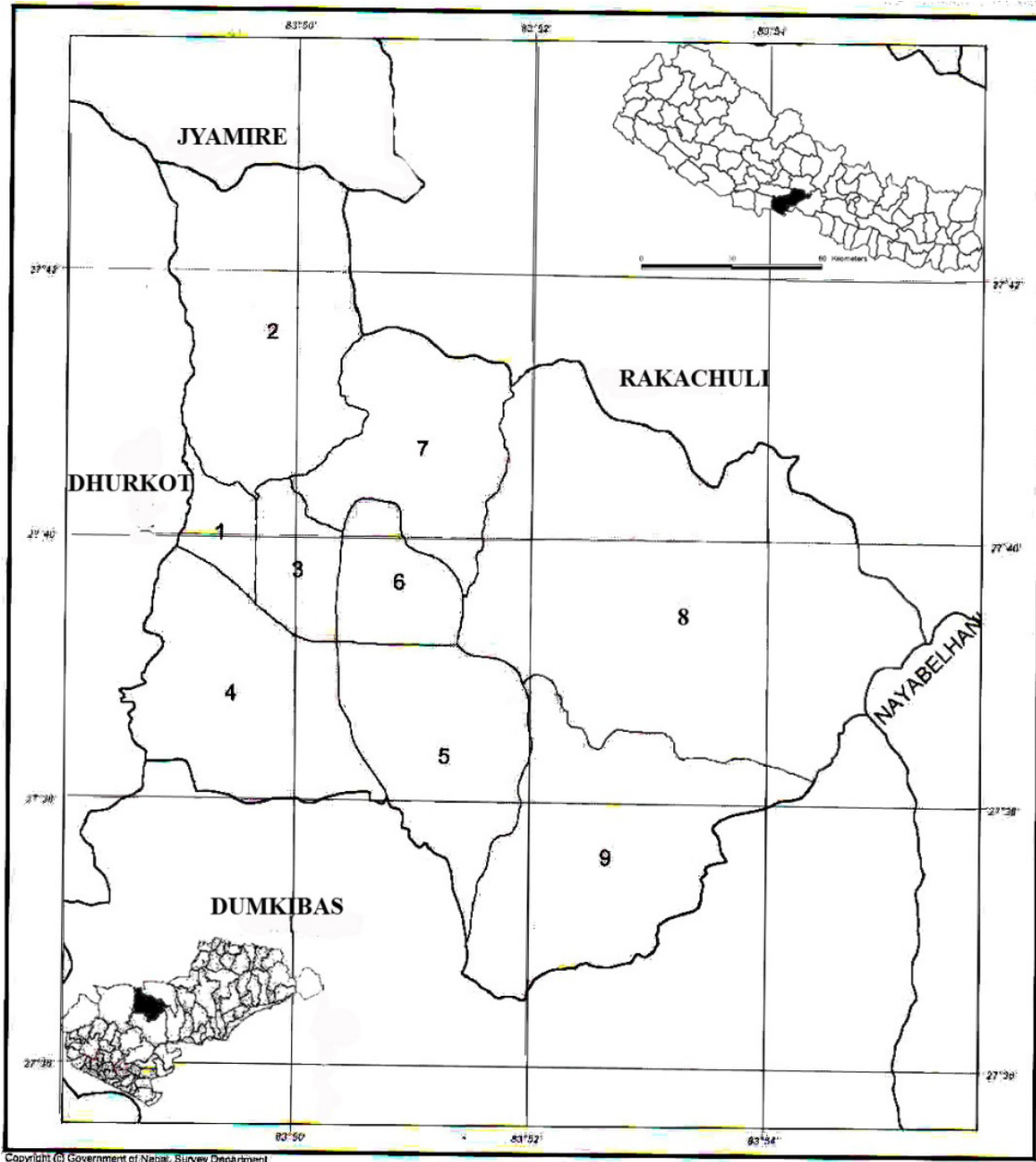


Fig. 1: Map of the study area



### 3.2 Climate

Depending upon the geography of any area the climate varies from place to place and the temperatures varies widely with aspect, altitude and cloud cover. Tropical type of climate is found in the study area. Rainfall is heavy in monsoon period which generally last for three months starting from mid June - September. The monsoon takes direction from east to west.

The data about temperature, precipitation and relative humidity of study area was unavailable so the data related to it was taken of near base station that is Simari. Climatic record of Simari for the last 3 years (2003-2005) (Appendix I) of Simari showed an average minimum temperature of 6.7 °C in January 2004 and an average maximum temperature of 40.1 °C in May 2005. The maximum temperature of the study area (near base station-Simari) is 30.92 °C and the minimum temperature is 18.8 °C. The maximum precipitation recorded during the three years period was 733mm in July 2003. The average total precipitation of the five years was 2024.3mm per annum. Relative Humidity (RH %) was highest in the month of January 2003 (95.9%) and lowest in the month of May 2005 (45.4%).

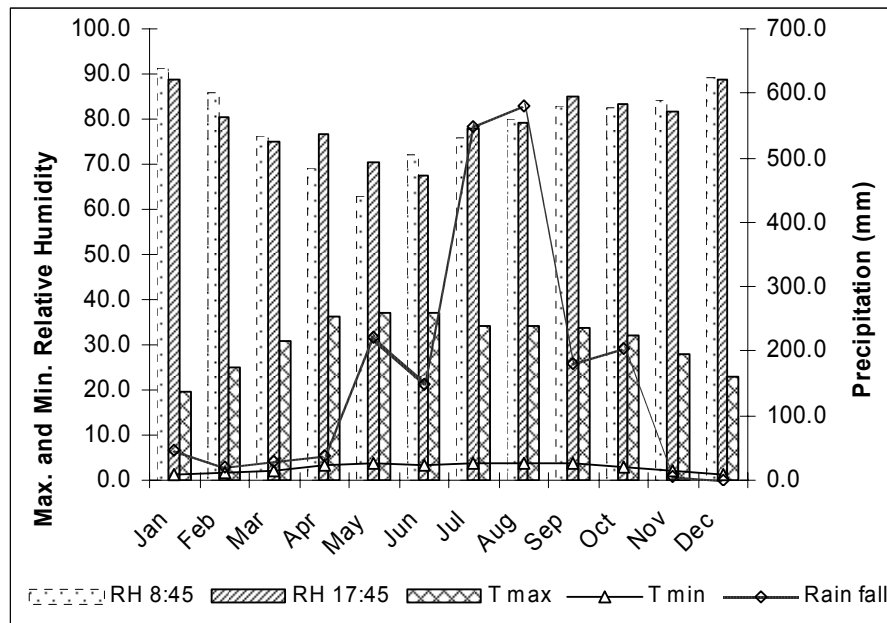


Fig. 2: Climatic data of Simari (2005). Station: Nawalparasi district

Source: Department of Hydrology and Meteorology, Kathmandu (2003-2005)

### 3.3 Vegetation

Vegetation of study area is very rich and shows tropical type of vegetation ranges below 1000m and characterized by Sal (*Shorea robusta*) forest, tropical deciduous riverine forest and tropical evergreen forest. *Shorea robusta* is the predominating species in this area, with other species including *Terminalia chebula*, *Terminalia bellirica*, *Terminalia alata*, *Phyllanthus emblica*, *Adina cordifolia*, *Aegle marmelos*, *Bombax ceiba*, *Holarrhena pubescens*, *Acacia catechu*, etc. Shrubs like *Colebrookea oppositifolia*, *Callicarpa macrophylla*, *Callotropis gigantea*, *Justicia adhatoda*, *Thespesia lampas*, *Solanum anguivii*, *Pogostemon benghalensis*, etc. are found. *Mimosa pudica*, *Artemisia indica*, *Persicaria barbata*, *Oxalis corniculata*, *Centella asiatica*, *Curculigo orchoides*, *Achyranthes bidentata*, etc. are common herb of the research area. Climbers like *Bauhinia vahlii*, *Smilax ovalifolia*, *Cuscuta reflexa*, *Lygodium japonicum*, *Cissampelos pareira*, *Piper longum*, *Periploca calophylla*, etc. are commonly found in the study area.



Photo 2: Vegetation of the study area dominated by *Shorea robusta*

### 3.4 Ethnic/Caste Composition

The total population of Benimanipur VDC is 8518 (HMG/N, 2002b) (Appendix II), in which 46.78 % are male and 53.22 % are female. The major ethnic/caste groups of Benimanipur VDC are Magar, Brahman, Chhetri, Kami, Tharu, Kumal, Damai, Newar, Gurung, Sarki, etc. Magar is most the dominating ethnic group among the other

ethnic/caste groups representing 31.89% of total population of VDC. Similarly, Brahman represents 19.98%, Chhetri represents 9.91%, Kami 8.51%, Tharu 8.09%, Kumal 7.53%, Damai 3.08%, Newar 2.71% and Gurung represents 1.51% of the total population in Benimanipur VDC. Tharu are the second dominant ethnic group among the other ethnic groups. Kami and Damai caste groups are consider together as Dalit in this study.

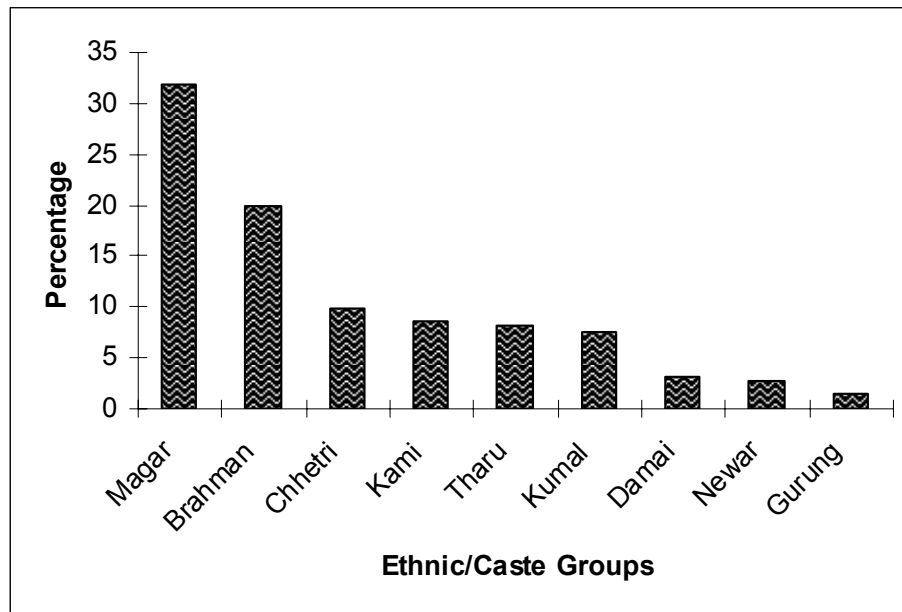


Fig. 3: Ethnic/caste group composition (source HMG/N, 2002b)

## CHAPTER IV

### 4. MATERIALS AND METHOD

This study has been carried out basically in an exploratory approach with the view of documenting the traditional ethnobotanical knowledge on the use of the plants by different ethnic/caste groups present in the study area and comparing knowledge among them. The general methodology employed during the present study are described as follows-

#### 4.1 Selection of Research Site

The people of Benimanipur VDC have a good knowledge about the pattern of use of plants. In addition they have more knowledge about multiple uses of medicinal plants. Although many works have been done in different VDCs of Nawalparasi district, no work has so far been done in Benimanipur VDC which lies in northern part of the district. The study area was chosen due to the presence of over 15 ethnic/caste groups within a small area and their rich traditional ethnobotanical knowledge and high biological diversity in the study area. Reconnaissance of the study area was done in June 2006.

#### 4.2 Collection of Ethnobotanical Information

With the help of various publications like that of Ford (1980), Martin (1995), Shrestha *et al.* (1998) etc., a discrete framework for the study was designed. It helps to show what kind of information is necessary to collect from the field what is to be done for the collection. The field work consists of two approaches i.e. survey technique and inventory technique (Martin, 1995; Cunningham, 2001). In survey technique, individual and in depth interviews and focus group discussion were conducted among the local plant users, community members and traditional faith healers, etc. In inventory technique, different plant specimens were collected from the study area and their local names were identified with part(s) used and purpose of use, etc. with the participation of knowledgeable key interviewees/people as well as by transect walk (survey) and also participating in different cultural programs and regular meeting of local people organized by Village Development

Committee and local NGOs. For the collection of information, following methods were taken-

#### **4.2.1 Field Visit**

The study area was visited four times from May 2006 to September 2007. A total of 60 days were passed in the study area including 7 days in first field visit, 11 days in second field visit, 26 days in third field visit and 16 days in fourth field visit.

First field visit was done from 30 May to 5 June 2006. During the first field visit general survey of study area was undertaken in order to obtain primary information on diversity of plants with the help of local key informants, local healers, Guruwas, social workers from this VDC etc.

The second field visit was done from 5 to 15 September 2006. This visit was mostly concentrated on collection of plant specimens because in this season flowering of most of the plants occur. General ethnobotanical knowledge from local people was also collected during this field visit.

The third field visit was done from 18 June to 13 July 2007. In this visit comparative ethnobotanical knowledge among different ethnic/caste groups about the plants occurring in the study area was undertaken. In this visit too, plant specimens were collected for herbarium preparation.

The fourth field visit was done from 10 to 25 September 2007. In this visit information on multiple use (cultural, medicinal, edible, fodder, 'marcha' preparing, fish poisoning, oil extraction, furniture, handicraft, fuel wood, alcohol and miscellaneous) pattern of plants by different ethnic/caste groups was collected. Plant specimens were also collected.

#### **4.2.2 Interview and Questionnaire**

Surveys, personal interviews and group discussions as Participatory Rural Appraisal (PRA) and Rapid Rural Appraisal (RRA) techniques were applied to reveal the specific information about traditional healing practice and ethnomedicinal uses of plants (Martin 1995). Key informants are the most important source for primary data. The key

informants included community forest user group members, local faith healers ('Guruwas'), elderly people, etc. They provided information on the uses, vernacular name, plant parts used, purpose of use, mode of preparation and modes of administration, etc. for medicinal and other purposes.

#### **4.2.2.1 PRA (Participatory Rural Appraisal)**

Group discussion was carried out by following Participatory Rural Appraisal (PRA) technique given by Martin (1995). This method was employed to get information from local people having knowledge on the different uses of plant species, location, seasonally growing condition and place of availability, state of collection, use category, and cultivation. The group discussion usually ended up with varied range of information regarding plant use and other related topics.

The major objective of the PRA was to cross check the use mentioned by the local people regarding its correct local names, parts and forms of use, purpose of use as well as place of availability.

#### **4.2.2.2 RRA (Rapid Rural Appraisal) Method**

Rapid Rural Appraisal (RRA) is a process of learning about rural condition in an intensive, interactive, and expectations manner. RRA methodology is designed for interdisciplinary investigation of socio-culturally and biologically complex rural system, which facilitates rapid and progressive learning (Martin, 1995). As part of RRA household survey was applied to collect specific information. Household survey was conducted on a random basis to obtain information on people's perception on conservation, use of plants availability and method of use of plant parts, preference of plants for certain use, etc. Semi-structured questions were asked to the local people including both male and female. Methods of cross-checking information from displaying the plants were done.

#### **4.2.3 Discussion with Traditional Healer ('Guruwas')**

Group interview were carried out with traditional healers to obtain the information on the plants that are used in traditional health care. The plant parts used, mode of

administration, sources of availability of the plants, their use in other aspect were also discussed with them.

#### 4.2.4 Plant Collection, Herbarium Preparation and Identification

Plants used for different purposes were collected. The collected plants were cross checked with local people and ‘Guruwas’ to confirm their identity in terms of vernacular names, uses and other information. Specimen collection was done in each field visit except first. Specimen collection and herbarium preparation was followed according to the standard technique of Lawrence (1967). String labels called jewellers tags were used to put the collection number with 3 or 4 duplicates. Form of plant, locality of collection, environmental aspects of collection site were also noted. Each specimen were dried and mounted with standard herbarium technique (Lawrence, 1967; Martin 1995).



Photo 3: Information on cross check with local informants (*Courtesy M.R. Gubhaju*)

Almost all plant specimens were photographed. The specimens are deposited at Tribhuvan University Central Herbarium (TUCH).

The specimens were identified with the help of standard taxonomic literature such as, Hooker (1872-1897), Hara *et al.* (1978, 1982), Hara and Williams (1979), Polunin and Stainton (1987), Stainton (1988), Rajbhandari (2001), Joshi and Joshi (2001), Grierson and Long (1983, 2001), Press *et al.* (2000), Manandhar (2002). The collected specimens were compared to voucher specimen at Tribhuvan University Central Herbarium (TUCH) and National Herbarium (KATH), Godawari. Nomenclature of the collected species was given following Press *et al.* (2000) and Baral and Kurmi (2005). Thus prepared herbarium specimens were submitted to TUCH.

#### **4.3 Data Analysis**

The information about the popular use of species were collected among eight major ethnic/caste groups *viz.* Tharu, Magar, Gurung, Kumal, Dalit, Newar, Brahman and Chhetri. The variations of indigenous knowledge among these ethnic/caste groups were analyzed. The information was obtained by interviewing ‘Guruwa’, traditional healers, key informants, local people including both male and female about diversity of the plant that is found in Benimanipur VDC. The information was obtained on the use, preparation, application, properties of plants, as well as description of the illness and also how to treat the different diseases and disorders. Based on the information obtained from eight different major ethnic/caste groups, a comparative account of their indigenous knowledge was presented. A comprehensive literature review involving comparison of collected information with the published work of similar nature was done. The species were listed in alphabetical order by family, their vernacular name, medicinal use, parts used and herbarium number. The available name of some species in different languages was also presented.

In this research work data were analyzed by using two methods. The first one is Ethnographic Validity method which was developed by Oli (2001) which shows popularity of medicinal plants among ethnic/caste groups. The second one is Informant Consensus (ICF) method which was developed by Trotter and Logon (1986) and later readopted by Heinrich (2000) for identifying potentially effective medicinal plants that shows which group of the plant required more in depth studies.



### **4.3.1 Ethnographic Validity**

Ethnographic validity method gives an idea about popularity of medicinal plants among different ethnic/caste groups residing within the same locality. The plant with high ethnographic validity means that it is very popular among the all ethnic/caste groups. The ethnographic validity was calculated using the following formula (Oli 2001).

$$\text{Validity Score} = \text{MF} \times \text{EG}$$

Where, MF = mean use frequency for a common medicinal use (average percent of the respondents among the focussed ethnic/caste groups using the plant for a common disease or disorder); EG = number of ethnic/caste groups using the plant for a common medicinal purpose.

Oli (2001) divided the plants in three validity ranks according to the ethnographic validity score of plants he obtained. But in this study plants were divided into four validity ranks, according to the ethnographic validity score of plants.

1. Very High Validity (VHV): Plants with validity score >300 (i.e. plants known to a large number of people for common medicinal use > 35% used by 7 and 8 ethnic/caste groups).
2. High Validity (HV): Plants with validity score 200-300 (i.e. plants known to 25-45% of people for common medicinal use within 6-8 ethnic/caste groups).
3. Medium Validity (MV): Plants with the validity score 100-200 (i.e. plants known to 15-35% of people for common medicinal use within 4-6 ethnic/caste groups).
4. Low Validity (LV): Plants with validity score <100 (i.e. plants known to <25% of people for common medicinal use within 1-5 ethnic/caste groups).

### **4.3.2 Informant Consensus Method (ICF)**

Consensus methodology provides an estimate of the importance of each plant species. This method also helps to identify important and interesting species for future cultural and pharmacological research.

This method also helps us to know how homogenous the ethnobotanical information is for each category. The data were quantified by adding up the individual report on the use of each plant. A taxon may be listed in several of the categories of indigenous uses; while in terms of use report, each plant could be considered only once per healer in a single category. It means that if one informant used a plant to treat more than one disease in the same category, we considered it as one use-report. Then the number of use-report ( $n_{ur}$ ) is compared to the number of species ( $n_{taxa}$ ) in each category of use. So the informant consensus factor ( $F_{ic}$ ) was calculated by using the following formula given by (Trotter and Logon, 1986).

$$F_{ic} = \frac{n_{ur} - n_{taxa}}{n_{ur} - 1}$$

Where,  $F_{ic}$  = informant consensus factor  
 $n_{ur}$  = number of use report in each category  
 $n_{taxa}$  = number of taxa.

The maximum ICF value possible is 1, when there is total consensus among the informant about the medicinal plant for a given category.

In this method the ethnobotanical research is based on the assumption that the more often a plant is reported to be useful the more often it is going to be used by the people. It means that in the usage categories, which received the highest number of mentions, are the most prevalent in the communities and also of the greatest importance to people living in the village. Quantifying the data by evaluating each use- report (ur) of a species allows one to estimate the relative importance of a plant in the local culture. Those plant are culturally important which are used by large number of healers preferably for the same category of indigenous use, while the other plants are considered to be culturally low importance that are cited as useful by only one or two informants.

This method includes not only the involvement of local healers for walking in the remote forest area for the plant collection but also for taking indigenous knowledge found in the study area. In the field visit, when plants were collected then it was identified with their local names, use with the help of local healers.

#### **4.3.2.1 Terminology Used in this Method**

A single record of use from the interviews with the local user group or local healers is termed as “use-report” for the purpose of this study. If one informant uses a plant to treat more than one disease in the same category it is known as one use-report. “Usage” is defined as the use of plant to maintain or improve health or to treat a specific ailment. A “usage category” is a group of usage that improves or maintains the health of a particular system. Cook (1995) classified the standard category of symptoms and ailments. The category is also used to classify the folk illness. Cook (1995) identified 17 disease usage categories. This research finds more than 17 usage categories. Two additional usage categories were used in this study. These categories are Animal Problem (ANP) and Poison (POI). Including two additional usage category to the Cook’s (1995) 17 usage categories, 19 usage categories are taken for the certification of 122 commonly known ailments of the study area. The usage categories that are found in the study area are as follow:

1. Animal Problem (ANP)
2. Circulatory System Disorder (CIR)
3. Culture-bound Syndrome (CUL)
4. Digestive System Disorders (DIG)
5. Endocrine System Disorders (END)
6. Genitourinary System Disorders (GEN)
7. Infections (INF)
8. Injuries (INJ)
9. Mental Disorder (MEN)
10. Metabolic System Disorder (MET)
11. Muscular Skeletal System Disorder (MUS)
12. Nervous System Disorders (NER)
13. Nutritional Disorders (NUT)
14. Poisoning Disorder (POD)
15. Pregnancy / Birth / Puerperium Disorder (PRE)
16. Respiratory System Disorders (RES)
17. Sensory System Disorders (SEN)
18. Skin cellular tissue Disorders (SKI)
19. Poison (POI)

#### **4.4 Secondary Data**

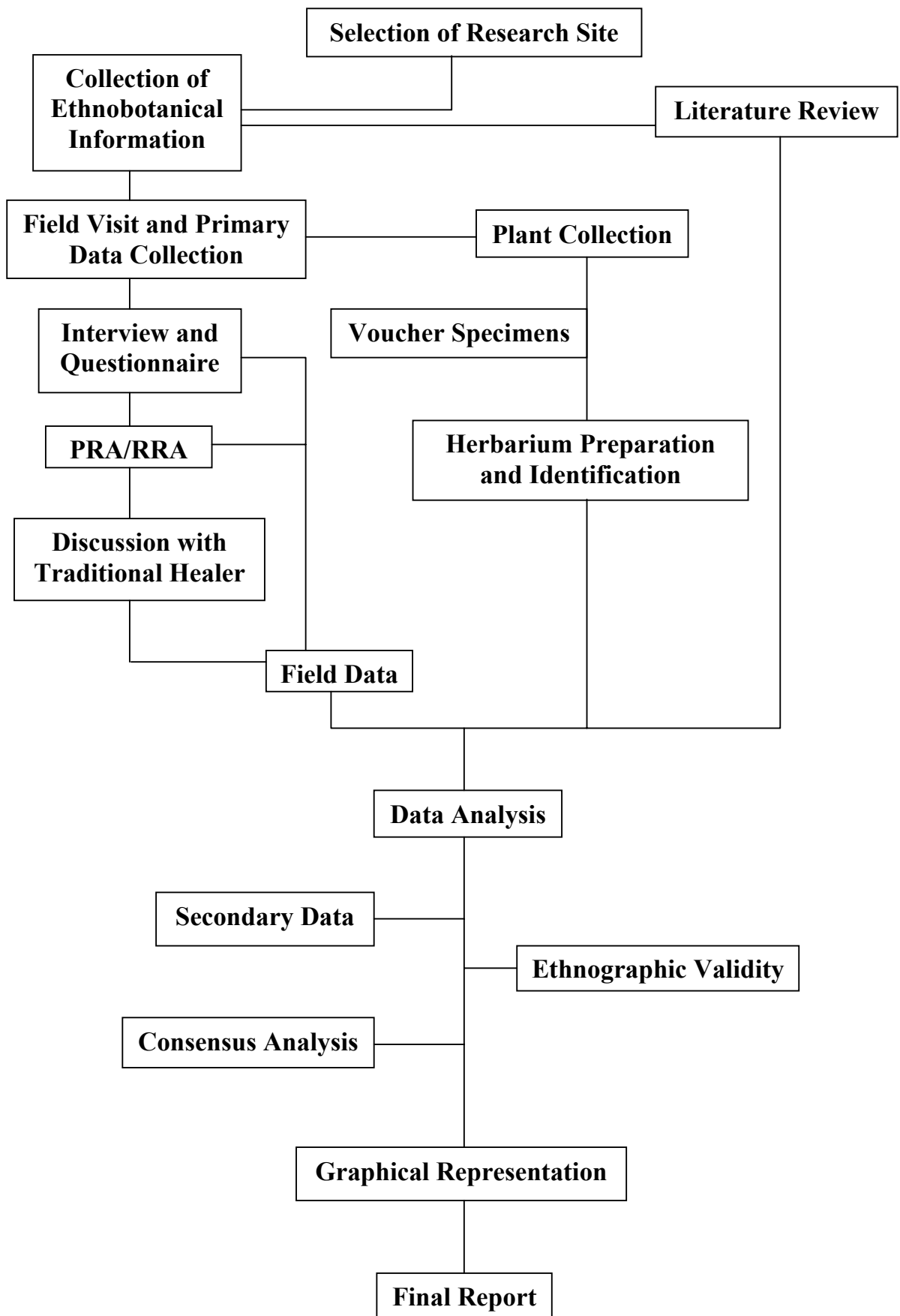
The secondary data were collected from published books and journals, articles on news papers deposited in libraries of different offices, NGOs and INGOs, Department of Hydrology and Meteorology, Babarmahal, Central Bureau of Statistics, Nepal Academy of Science and Technology (NAST), Asia Network for Small Scale Bio-resources (ANSAB), International Union for Conservation of Nature (IUCN), Department of National Park and Wildlife Conservation (DNPWC), Department of Forest Resource and Survey (DFRS) District Forest Office, Nawalparasi; Central Library, Tribhuvan University, National Herbarium Centre (KATH), and Ethnobotanical Society of Nepal (ESON), etc.

#### **4.5 Categorization of Mode of Use**

The medicinal plants were found to be used in their natural form. The modes of medicine preparation by indigenous people observed during study period are as follows-

1. Paste: It is prepared by crushing or grinding fresh plant part by mortar and pestle made up of stone.
2. Juice: An extract prepared by crushing the plant part with mortar and pestle and squeezing it or filtering through a few layers of clothes.
3. Powder: A product prepared from the plant parts which are dried in open sunlight and are crushed in dry mortar and pestle or burnt to make ash.
4. Decoction: A liquid medicinal preparation made by boiling the plant parts with water.
5. Raw: The fresh plant parts that are taken in their natural form.
6. Infusion: A liquid medicine preparation made by soaking plant parts over a night (at least 6-8 hrs).
7. Pulp: A medicine locally known as 'Ghanji' and is present in inner part of fruit.
8. Smoke: Medicine taken in the form of smoke.
9. Sticky fluid: A liquid from plant part which may be milky or not and has adhesive character like glue.
10. Spiritual casting: Medicine given or applied after casting as remedy of spiritual power.
11. Miscellaneous: The medicines which is given or applied not frequently or used in very low amount are bath, tie, fry, brush, oil, burnt and boil.

**Flow Chart 1: Methodology**



## CHAPTER V

### 5. RESULTS

Benimanipur VDC of Nawalparasi District is rich in floral diversity. It includes diversity of flora along with diverse geographical condition. The forest, grassland and even the agricultural land support a number of plant species, many of which have multiple uses value *viz.* Medicinal, fodder, 'marcha' preparing, timber, fibre, oil etc. This area is also rich in diverse ethnic/caste groups. Some members of these ethnic/caste groups have very high indigenous knowledge about the use of medicinal plants for different diseases/disorders and also other uses of plants. The members (communities) have acquired a rich knowledge on use of the plant from their ancestors and have developed their own way of living in harmony with the environment.

Altogether 50 persons were interviewed including 36% of female and 64% of male. Twenty percent of interviewers were of age between 25 and 40, 26% of interviewers were of age between 41 and 55 and 54% of interviewers were of above age 55 (Appendix X).

#### 5.1 Ethnobotany

Ethnobotanical study provided sound knowledge of local people about the utilization of plant resources for different purposes as medicinal, fodder, fruit, timber, fish poisoning, fuel wood etc (Table 1, Appendix III). The study was carried out among 8 different ethnic/caste groups in the study area *viz.* 'Brahman', 'Chhetri', 'Tharu', 'Magar', 'Newar', 'Kumal', 'Dalit' and 'Gurung'. As the people live in rural area, far from urban area, they have no easy access of using modern healthcare facilities. Therefore, they depend on traditional medicinal practices for their daily needs.

Basically, the diseases are caused by imbalance of diet, imbalance of environment, food poisoning; lack of awareness. Human also believes the disease/disorders caused by the spirits, ghost and witches. Not only the local faith healers, but the elderly people had also good knowledge on medicinal plant and their use in health care of humans as well as of animals. The traditional folk medicinal practitioners are locally popular as 'Dhami', 'Jhakri', 'Guruwa', etc. and have very good knowledge about the utilization of plant in different aspects. The communities still have faith on these healers and also believe on

ghost, witches, spiritual power, etc. So that the amulet after casting by ‘Lamas’ and ‘Dhamis’ is worn by some of them.

## 5.2 Diversity of Medicinal Plant

In the present study, a total of 170 plant species (including the species whose scientific name and family known or unknown) were recorded having multiple uses and all these species were of medicinal value. These 170 medicinal plant species were listed with their scientific name, vernacular name, English name, family, available name of some plants in local ethnic languages, flowering, fruiting, distribution in Nepal and world, collection number along with their parts used, habit, mode of use, ailments (Table 1, Appendix VIII).

These 170 plant species belong to 64 families and 138 genera. The scientific name of 7 plant species could not be ascertained so they have been listed by their local name. Among 64 families, 14 families (families having  $\geq 4$  plant species) were taken for graphical analysis. Leguminosae was found as most dominant family having highest number of species i.e including 18 plant species which was followed by Compositae (9), Moraceae (8), Gramineae (7), Euphorbiaceae (7), etc. (Figure 4).

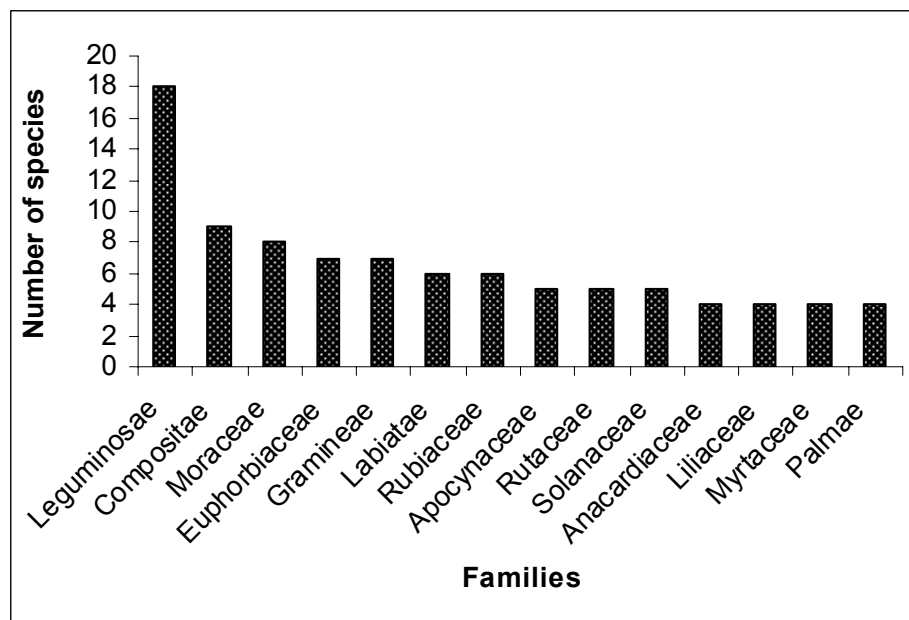


Fig. 4: Most dominant plant families in study area

Among total plant 166 we categorized as angiosperm (including 141 dicot species and 25 monocot species) and 4 as pteridophytes. Similarly, based on habit, total medicinal plants were grouped into herb, shrub, tree and climber, which comprised 51 (30.0%), 33 (19.4%), 67 (39.4%) and 19 (11.2%) respectively (Figure 5).

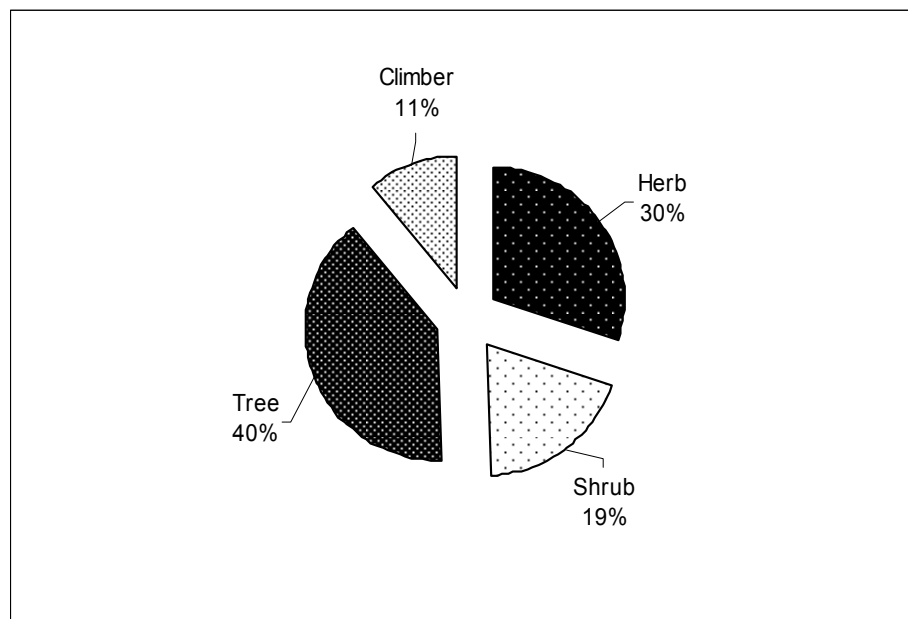


Fig. 5: Growth forms of medicinal plants



**Table 1: Medicinal plant use pattern among eight different ethnic/caste groups**

S.N.	Scientific name	Brahman	Chhetri	Tharu	Magar	Newar	Kumal	Dalit	Gurung
1	<i>Abrus precatorius</i> L.	Powder of seed is given to treat retention of urine.	Powder of seed is mixed with water and is given to treat gonorrhoea and as cooling agent. Seed is kept in eyes to clear dust.	Juice of root is mixed with water and is given to treat retention of urine.	Juice of root is mixed with water and is given to treat retention of urine.		Juice of root is given to treat eye defect.	Juice of root is given to treat eye defect and as cooling agent.	Juice of trailer stem is given to treat burning sensation of chili. Plant is used as fodder.
2	<i>Acacia catechu</i> (L. f.) Willd.	Boiled juice of inner part of stem is given to increase energy.	Paste of bark is applied on cuts. Grinded bark is used as tea.	Juice after cooking bark is given as cooling agent, sprain and inner hurts.	Juice after cooking bark is given as cooling agent.		Cooked juice of bark is either given or applied to treat sprain.	Powder of bark is given to treat gastritis and cough. Timber is used in making furniture.	Plant is used as fodder, firewood and making furniture.
3	<i>Achyranthes bidentata</i> Blume	Juice of root is given to treat menstruation disorder.	Juice of root is given to treat anorexia. Paste of root is applied on wounds and boils. Stem and leaf is essential in 'Panchami Puja' of 'Teej'.	Juice of root is given to treat anorexia. Root is used as amulet to treat fever and psycho disorder. Juice of root is given to goat to treat retention of placenta.	Juice of root is given to treat anorexia and vomiting.	Juice of root is given to treat anorexia. Plant is essential in death ceremony and 'Bratamandh'.	Stem and leaves are essential in 'Teej'.	Powder of root is given to treat gastritis. Paste of root is applied to treat boils and wounds. Stem and leaves are essential in 'Panchami Puja' of 'Teej'.	Juice of root is given to treat anorexia. Stem and leaves are essential in 'Panchami Puja' of 'Teej'. Plant is used as fodder.
4	<i>Acorus calamus</i> L.	Paste of root is given to treat cold and cough.	Paste of root is given to treat cold and cough.	Paste of root is given to treat cold and cough.	Paste of root is given to treat cold and cough. Juice of root is given to treat pneumonia to children.	Paste of root is given to treat cough.	Paste of root is given to treat cold and cough.	Juice of root is given to treat throat pain and child sickness.	Juice of root is given to treat body pain.
5	<i>Aegle marmelos</i> (L.) Correa	Powder of fruit is given to treat gastritis.	Powder of fruit is given to treat gastritis and only ripe fruit is given as cooling agent.	Juice of boiled leaf is given to treat diarrhoea. Sticky fluid from fruit is applied to treat headache.	Powder of leaf mixed with other medicinal plants and is given to treat cold, cough, gastritis and also given as cooling agent.	Fruit is given as cooling agent.	The powder of unripe fruit is given as cooling agent.	The powder of unripe fruit is given to treat gastritis. The powder of unripe fruit is given as cooling agent.	Fruit is given to treat cold. Plant is used as fodder and the plant is also used in cultural ceremonies.
6	<i>Aloe vera</i> (L.) Burm. f.	Sticky fluid of leaf is applied on burns. Sticky fluid of leaf is drunk as cooling agent.	Sticky fluid of leaf is applied to treat headache, burns and as cooling agent.	Sticky fluid of leaf is applied to treat burns and as cooling agent.	Sticky fluid of leaf is applied to treat burns and as cooling agent.	Sticky fluid of leaf is applied on burns. Fluid from leaf is drunk as cooling agent.	Sticky fluid of leaf is applied on burns.	Sticky fluid of leaf is applied on burns. Fluid from leaf is drunk as cooling agent.	Sticky fluid of leaf mixed with water is given early in the morning as cooling agent in empty stomach. Sticky fluid of leaf applied on burns and headache.
7	<i>Alstonia</i>	Powder of bark is given	Juice of bark is	Sticky fluid of bark is	Sticky fluid of bark	Juice of bark is	Juice of bark is	Juice of bark is	Juice of bark is

	<i>scholaris</i> (L.) R. Br.	to treat gastritis. Sticky fluid of bark is applied on boils.	given for abortion.	applied to treat chest pain. Male flower (non flowering) for being pregnant and female flower (flowering) is given for abortion.	is applied to treat chest pain. Male flower (non flowering) for being pregnant and female flower (flowering) is given for abortion. Juice of bark is given to ox to treat gastritis. If pigs get suffered from anorexia then they are faded in its utensils.	given for abortion.	given to domestic animals suffering from marasmus.	given for abortion.	given to treat anorexia.
8	<i>Amaranthus spinosus</i> L.	The juice of root is given as cooling agent. Paste of root is applied on sprain and swelling.	The juice of root is given as cooling agent.	Juice of shoot apex is given to treat vomiting. Juice of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea.	Juice of root is given as cooling agent.	Juice of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea and also given as cooling agent.	Juice of root is given to treat retention of urine. Leaf is eaten as vegetable.
9	<i>Amarathus</i> sp.	Juice of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea and retention of urine.	Juice of root is given to treat gonorrhoea.	Paste of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea.	Juice of root is given to treat gonorrhoea.
10	<i>Ananas comosus</i> (L.) Merr.	Fruit and juice of leaves is given as cooling agent.	Fruit or paste of leaves is mixed with milk of cow and cooked, then is given to treat fever. Fruit is also given as cooling agent.	Leaves or fruit is mixed with milk of cow and cooked, then is given to treat fever. Fruit is also given as cooling agent. Juice of fruit is also given to treat weakness.	Fruit or paste of leaves is mixed with milk of cow and cooked, then is given as cooling agent.	Fruit is mixed with flour of rice and milk of cows and is given as cooling agent.	Juice of leaves or fruit is given as cooling agent.	Juice of cooked leaves or fruit is given to treat fever and also given as cooling agent.	Fruit is boiled; sugar candy is poured and drunk as cooling agent.
11	<i>Annona squamata</i> L.	Ripe fruit is edible.	Fruit is given as cooling agent.	Ripe fruit is edible.		Ripe fruit is edible.			
12	<i>Anthocephalus chinensis</i> (Lam.) A. Rich. ex Walp.	Ripe fruit is edible, plant is used as fodder and timber is used in making furniture.	Ripe fruit is edible and plant is used as fodder.	Ripe fruit is edible.	Juice of bark is given for abortion.	Plant is used as fodder and firewood.	Plant is used as fodder and firewood.	Ripe fruit is edible and plant is used as fodder.	Plant is used as fodder and timber is used in making furniture and firewood.
13	<i>Antidesma bunius</i> (L.) Spreng.		Fruit is pickled. Plants used as fodder.	Grinded juice of root is given to treat gastritis.	Juice of root is given to treat typhoid.		Juice of root is given to treat fever.	Juice of root is given to treat gastritis.	Plant is used as fodder.
14	<i>Areca catechu</i> L.	Paste of fruit is mixed with other medicinal plants and is given to treat typhoid. Paste of fruit is applied on wounds.	Paste of fruit is applied on wounds.	Fruit is edible.	Paste of fruit is applied on wound and ringworm.	Paste of fruit is applied on wound.	Fruit is edible.	Fruit is given to treat dental carries.	Paste after rubbing seed is applied on wounds. Fruit is edible.
15	<i>Artemisia indica</i> Willd.	Paste of shoot apex is applied to treat fever and scabies. The juice of the root is given to	Juice of shoot apex is given to treat side waist pain. Juice of shoot apex is	Paste of shoot apex is applied on wounds and boils. Plant is used in paddy field as	Juice of shoot apex is mixed with other medicinal plants and is given to treat	Juice of root is given to treat gastritis.	Juice of shoot apex is given as cooling agent. Plant is essential	Juice of root is given to treat heart pain and gastritis and is applied on scabies.	Juice of root is given to treat gastritis.

		treat gastritis and anorexia.	applied to treat cuts, scabies and boils.	insecticide.	asthma. Juice of shoot apex is applied on wounds and boils. Plant is used as insecticides.		in death ceremony.	Juice of whole part is used to bath to child to treat wounds and boils.	
16	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Sticky fluid from stem is applied on foot swelling, toothache and boils.	Sticky fluid from stem kept on nepali paper and sticked on chick to treat mumps.	Sticky fluid from stem is applied on mumps.	Sticky fluid from stem is applied on wounds and mumps.	Sticky fluid from stem is applied on boils.	Sticky fluid from stem is applied on boils. Ripe fruit is edible and plant is fodder.	Powder of bark is given to treat gastritis. Sticky fluid from stem is applied on wounds and boils.	Sticky fluid from stem is applied on tooth to treat toothache. Plant is fodder.
17	<i>Asparagus racemosus</i> Willd.	Juice of root is given to treat stomach pain and to cow and buffalo to treat breast engorged. Juice of root is also given to buffalo for more production of milk.	Boiled juice of root is given for more production of milk. Root is used in making soap.	Boiled juice of root is given for more production of milk. If the cows and buffaloes are infected by insects, then its branch is touched to them and hanged under roof for one night, and is believed that the insects will transfer on its branch. Root is used in making soap.	Root is used in making soap. Hanged on roof in 'Shrawan Sakranti'.	Boiled juice of root is given for more production of milk. Hanged on roof along with leaf of <i>Semicarpus anacardium</i> in 'Shrawan Sakranti'. Root is used in making soap.	Boiled juice of root is given for more production of milk. Root is used in making soap.	Juice of root is given for more production of milk and gastritis. Root is used in making soap.	Juice of root is given to domestic animals as cooling agent. Shoot apex are pickled. Root is used in making soap.
18	<i>Azadirachta indica</i> A. Juss.	Juice of leaf poured in water and drunk to treat fever, worm infestation and as cooling agent.	Boiled leaf or bark is given to treat fever, cold and cough.	Juice of leaf poured into water and is given to treat leprosy. Boiled leaf is given to treat fever. Juice of leaf is used to wash wounds and boils.	Juice of leaf is given to treat boils, fever and black dandruff on face. Oil from seed is applied on burns. Juice of leaf is used to bath to treat fever, anorexia wounds and as cooling agent.	Juice of leaf is drunk to treat malaria. Juice of leaf is used to bath to treat fever and as cooling agent. Stem is used as brush.	Juice of leaf is drunk to treat cold. Juice of leaf is also used to bath as cooling agent.	Juice of leaf is used to bath to treat wound, boils, fever and high B.P.	Paste of leaf is given to treat headache and fever.
19	<i>Baccharoides anthelmintica</i> (L.) Moench.	Powder of seed is poured in water and drunk to treat stomach pain.	Powder of seed is poured in water and drunk to treat fever.	Juice of leaf or shoot apex is given to treat fever.	Juice of leaf or seed is given to treat pneumonia.	Juice of seed is given to domestic animals suffering from worm infestation.	Juice of seed is given to treat child sickness.	Juice of leaf is given to treat child sickness, fever, typhoid and wounds.	
20	<i>Bauhinia purpurea</i> L.	Powder of seed mixed with other medicinal plants and is given to treat gastritis.	Flower is pickled. Plant is used as fodder.	Flower is pickled. Plant is used as fodder.	Juice of bark is given to treat stomach pain. Flower is pickled. Plant is used as fodder.		Flower is pickled.	Powder of bark is given to treat gastritis.	Flower is pickled. Plant is used as fodder and firewood.
21	<i>Bauhinia scandens</i> var.	Juice of whole part is given to treat	It is believed that its stem is hanged on		Its stem is hanged on doors for safety.		Its stem is hanged on doors	Its stem is hanged on doors for	It is believed that its stem is hanged on

	<i>horsfieldii</i> (Miq.) H. Ohashi	weakness.	doors for good luck.				for protection from snake.	protection from snake.	doors for good luck.
22	<i>Bauhinia vahlii</i> Wight & Arn.	Powder of bark is given to treat gastritis only to woman. Leaf is used to make local umbrella.	Powder of bark is given to treat gastritis.	Oil obtained from seed is applied on wounds and boils. Trailer is used in making ropes.	Trailer is used in making ropes.		Oil obtained from seed is applied on wounds.	Juice of root is given to treat dysentery and typhoid. Juice of bark is given to treat gastritis.	Trailer stem is used in making ropes.
23	<i>Bauhinia variegata</i> L.	Powder of bark is given to treat gastritis.	Flower is pickled.					Powder of bark is given to treat gastritis.	Boiled flower is given to treat diarrhoea. Flower is pickled and plant is used as fodder.
24	<i>Begonia picta</i> Sm.	Paste of leaves is applied to treat wounds made by mud on foot.	Grinded leaves are mixed with grinded leaves of <i>Balsam</i> sp. ('Tihuri') and are put on hand on "Saune Sakranti".	Paste of leaves is applied to treat wounds made by mud on foot.	Paste of leaves is applied to treat wounds made by mud on foot.	Grinded leaves are mixed with grinded leaves of <i>Balsam</i> sp. ('Tihuri') and are put on hand on "Saune Sakranti".		Paste of leaves is applied on wounds made by mud on foot.	Paste of leaves is applied on wounds made by mud on foot.
25	<i>Blumea hieraciifolia</i> (D. Don) DC.	Juice of root is given to treat gastritis and anorexia.	Juice of root is given to treat gastritis and anorexia.	Root of plant is casted along with <i>Zingiber officinale</i> and 'Marcha' and is given to treat throat pain.	Powder of root is mixed with powder of root of <i>Achyranthes bidentata</i> and is given to treat anorexia.	Juice of root is given to treat abdominal pain.	Root is used in making 'Marcha'.	Juice of root is given to treat gastritis and anorexia. Root is used in making 'Marcha'.	
26	<i>Blumea lacera</i> (Burm. f.) DC.							Juice of root is given as cooling agent.	
27	<i>Boerhavia diffusa</i> L.					Juice of root is given to treat eye defect.	Juice of root is given to treat cough and asthma.		
28	<i>Bombax ceiba</i> L.	Juice of bark or root is given to treat gonorrhoea and as cooling agent.	Juice of bark or root is given to treat gonorrhoea and as cooling agent.	Juice of bark or root is given as cooling agent and gonorrhoea. Root is mixed with flour to make breads.	Juice of root is given to treat gonorrhoea and child suffering from white urine.	Juice of root is given as cooling agent.	Juice of root is given as cooling agent.	Juice of shoot apex, root or bark is given as cooling agent and gastritis.	Juice of root of juvenile plant is used to treat gonorrhoea. Plant is used as fodder and firewood. Timber is used in making furniture.
29	<i>Caesalpinia decapetala</i> (Roth) Alston	Paste of bark is applied on ringworm.	Paste of bark is applied on ringworm.	Paste of bark is applied on ringworm.	Paste of bark is applied on ringworm.	Paste of bark is applied on ringworm.	Paste of bark is applied on ringworm.	Paste of bark is applied on ringworm.	Paste of leaf is applied on ring worm.
30	<i>Calamus</i> sp.		Stem is used in making baskets, sticks, etc.	Stem is used in making sticks.	Stem is used in making sticks.			Powder of root is given to treat gastritis and as cooling agent. According to local people plant is need to 'Lama'.	Powder of root is mixed with other medicinal plants and is given to treat cold and as cooling agent .

31	<i>Callicarpa macrophylla</i> Vahl	Juice of root is given to treat child fever. Paste of root is given to treat stomatitis.	Fruit or juice of root is given to treat typhoid, stomatitis, throat boils and also given as cooling agent.	Juice of root is given to treat typhoid and fever.	Juice of fruit and root is given to treat typhoid.	Juice of fruit or root is given to treat stomatitis.	Paste of fruit or root is given to treat stomatitis.	Leaf is chewed or juice of leaf is taken to treat throat pain and stomatitis. Fruit is given to treat typhoid and grinded root is given to treat throat boils.	Juice of root after rubbing is given to treat throat pain.
32	<i>Calotropis gigantea</i> (L.) Dryand.	The sticky fluid from stem is applied on cuts and sprains.	The dried leaf or stem is smoked to treat coryza. The sticky fluid from stem is applied on sprains.	The sticky fluid from stem is applied on sprains, boils and also to keep out spines from body.	The sticky fluid from stem is applied on sprains.	The dried leaf or stem is smoked to treat coryza. The sticky fluid from stem is applied on sprains.	The sticky fluid from stem is applied on wounds, boils and sprains. Feathers are used to make pillows.	The dried stem is smoked to treat coryza. The sticky fluid from stem is applied on sprains.	Sticky fluid from stem is applied on sprains.
33	<i>Cannabis sativa</i> L.	Leaf or seed is fried in mustard oil and is given to children and domestic animal suffering from cold.	Leaf or seed is fried in mustard oil and is given to children and domestic animal suffering from cold.	Leaf and seed is smoked during stomach swelling. Leaf is fried in mustard oil and is given to goat suffering from cold.	Leaf or seed is smoked during stomach swelling.	Fried seeds are given to goat suffering from diarrhoea.	Fried seeds are given to goat suffering from cold.	Fried seed or leaf is given to treat cold.	Seed is fried in oil and is given to treat cold. Seed is pickled.
34	<i>Carica papaya</i> L.	Fruit is given to treat jaundice, gastritis and also given as cooling agent. Fruit with sticky fluid is given to treat ulcer.	Fruit is given to treat jaundice and as cooling agent. Sticky fluid of leaves is applied to treat toothache.	Fruit is given to treat jaundice and as cooling agent.	Fruit is given as cooling agent.	Fruit is given to treat jaundice and as cooling agent.	Fruit is given as cooling agent.	Fruit is given as cooling agent. Sticky fluid of leaves is applied on ringworm.	Fruit is given to treat jaundice and as cooling agent. Fruit is edible.
35	<i>Cascabela thevetia</i> (L.) Lippold			Sticky fluid of petiole of leaf is applied on mumps.				Paste of seed is applied on boils.	
36	<i>Cassia fistula</i> L.	Powder of seed is given to treat intestinal obstruction and retention of urine. Powder of fruit bark is given as cooling agent.	Juice of seed is given to treat retention of urine and as cooling agent.	Fruit is poured into water and drunk as cooling agent. Fruit is licked to treat dysentery.	Juice of root is given to treat retention of urine. Juice of leaf is mixed with lime and the paste is applied on ring worm. Paste of leaf is applied on wounds caused by mud on foot.	Powder of seed is mixed with water and is given to treat retention of urine and as cooling agent.	Seed is poured into water and is given to domestic animal to treat intestinal obstruction.	Seed is poured into water and is given to domestic animal to treat intestinal obstruction and retention of urine.	Seed poured into water and is applied as cooling agent. Paste of bark is applied to treat ring worm.
37	<i>Catunaregam uliginosa</i> (Retzius) V.V Sivarajan.		Paste of bark is applied on wounds caused by mud on foot.	Vegetable of fruit or fruit mixed with bread is given to treat diarrhoea. Sticky fluid of bark is applied on the allergy of <i>Semecarpus anacardium</i> .	Burnt fruit is applied on wounds caused by mud on foot.		Fruit is taken as vegetable.	Fruit is taken as vegetable.	
38	<i>Centella asiatica</i>	Juice of whole part is	Juice of whole part	Juice of whole part is	Juice of whole part	Juice of whole	Juice of whole	Juice of whole part	Juice of whole part

	(L.) Urb.	given as cooling agent.	is mixed with sugar candy and is given as cooling agent.	mixed with sugar candy and is given as cooling agent.	is mixed with sugar candy and is given as cooling agent.	part is given as cooling agent.	part is mixed with sugar candy and is given as cooling agent.	is mixed with sugar candy and is given as cooling agent. Juice of leaf is given to treat child sickness.	is given to treat headache.
39	<i>Cheilanthes anceps</i> Blanford	Paste of leaf either making tablet or not is given to treat gastritis. Juice of root is given to treat lower abdominal pain.	Juice of whole part is given to treat retention of urine.	Amulet of root is tied on arm to treat fever.	Stem is used after boring nose.		Ash after burning whole part is applied on wounds.	Boiled whole part is drunk to treat coryza. Powder of whole part is given to treat gastritis.	Juice of whole part is given to treat gastritis.
40	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Powder of root is mixed with powder of root of <i>Callicarpa macrophylla</i> and <i>Blumea hieraciifolia</i> and is given to children to treat gastritis. Juice of root is given to domestic animal (cow, ox etc) to treat Gastritis.	Juice of root is given to cow and buffalo to treat worm infestation and diarrhoea.	Juice of root is given to treat gastritis. Juice of root is mixed with juice of root of <i>Dipsacus inermis</i> and juice of tuber of <i>Tinospora sinensis</i> and is given to animals to increase their weight.	Juice of root is given to treat cholera. Juice of root is given to animals to increase their weight.	Juice of root is given to cow and buffaloes to treat gastritis.		Juice of root is given to treat headache and hyperplasia of spleen.	Juice of root is given as cooling agent.
41	<i>Cissampelos pareira</i> L.	Juice of whole part is given to treat gastritis.	Juice of tuber is given to treat gastritis. Juice of whole part freed on bronze utensil and is given to woman to treat bleeding.	Juice of root is given to treat cold, cough, fever and gastritis.	Juice of whole part is given to treat gastritis.	Juice of tuber is given to treat gastritis.	Juice of root is given to treat gastritis.	Juice of root is given to treat gastritis.	
42	<i>Cissus repens</i> Lam.	Fruit is edible. Plant is used as fodder.	Fruit is edible. Plant is used as fodder.	Paste of leaves is applied to treat pre-stage of wound.		Plant is used as fodder.	Plant is used as fodder.	Plant is used as fodder.	Plant is used as fodder.
43	<i>Citrus aurantifolia</i> (Christ.) Swingle	Juice of fruit is given as cooling agent.	Juice of fruit is given to treat anorexia and as cooling agent. Juice of fruit is applied on head to treat headache.	Juice of fruit is applied on head to treat headache.	Juice of fruit is applied on head to treat headache.	Juice of fruit is applied on head to treat headache.	Heated fruit is given to treat cough. Juice of fruit is applied on legs to treat wounds made by mud on foot.	Half cutting fruit is taken, put some salt on it and is heated from bark side and is applied on head to treat headache. Fruit is also given as cooling agent.	Juice of fruit is given to treat running nose and cough. Juice of fruit is also given as cooling agent. Fruit is edible.
44	<i>Citrus limon</i> (L.) Burn. f.	Juice of fruit is given as cooling agent.	Juice of fruit is given as cooling agent.	'Chuk' made from its fruit is applied on legs to treat wounds made by mud on foot.	'Chuk' made from its fruit is mixed with honey and is given to treat anorexia.	Fruit is edible.	'Chuk' made from its fruit is applied on legs to treat wounds made by mud on foot.	Juice of 'chuk' made from its fruit is applied on sprain.	Juice of fruit is given to treat running nose and cough. Fruit is edible.
45	<i>Citrus maxima</i> (Burm.) Merrill	Fruit is given as cooling agent. Paste of bark is applied on cuts.	Fruit is edible.	Fruit is edible.	Fruit is edible.	Fruit is edible.	Fruit is edible and plant is fodder.		Fruit is edible.
46	<i>Citrus medica</i> L.	Juice of bark is given to	Fruit is edible.	Fruit is edible.	Fruit is edible.	Fruit is need in	Fruit is edible.	Juice of bark is	Fruit is edible.

		treat body pain. Powder of bark is mixed with other medicinal plants and is given to treat gastritis.				'Tihar'.		given to treat coryza.	
47	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Juice of bark is given to treat coryza and headache.	Stem is smoked to treat cold.	Juice of bark is given to treat dysentery. Leaf or stem is smoked to treat coryza.	Juice of bark is given to treat dysentery. Leaf or stem is smoked to treat coryza.	Leaf is smoked to treat coryza.	Leaf is smoked to treat coryza.	Powder of bark is given to treat gastritis. Leaf is smoked to treat coryza.	Juice of stem is given to treat running nose.
48	<i>Cocos nucifera</i> L.	Water inside the fruit is given to treat gonorrhoea and as cooling agent.	Water inside the fruit is given as cooling agent.	Fruit is edible.	Oil from fruit is given as cooling agent.	Fruit is edible, plant is used to make handicraft and to worship God.	Fruit is edible and plant is used to make handicraft.	Burnt dry fruit is given to treat back bone pain.	Fruit is edible.
49	<i>Coffea arabica</i> L.	Seed is given as tea to treat cold.				Taken as tea.	Taken as tea.	Taken as tea.	Taken as tea to treat cough.
50	<i>Colebrookea oppositifolia</i> Sm.	Juice of shoot apex is given to treat gastritis.	Juice of shoot apex is dropped inside the eyes to treat cataract.	Juice of leaves is used as fish poisoning.	Paste of leaves is applied on boils.	Juice of leaves is dropped inside the eyes of cows and buffaloes to treat cataract.		Boiled shoot apex is given to treat coryza.	Juice of leaf is kept in eyes to treat cataract. Juice of leaves are used in fish poisoning.
51	<i>Colocasia esculenta</i> (L.) Schott		Leaves are edible.		Sticky fluid of leaf is applied on immature boils.			Paste of cooked leaf is given to treat dysentery.	Plant is used as fodder.
52	<i>Costus speciosus</i> (J. Konig.) Sm.	Juice of rhizome is given to cows and buffaloes to treat gastritis.		Boiled rhizome kept under the bed and steamed to cure swelling of body.	Grinded rhizome poured in water and drunk to treat gastritis and also drunk as cooling agent.	Plant is used to make baskets.	Boiled rhizome is given as cooling agent (hot is given in the evening and cool is given in morning).	Juice of rhizome is given to treat gastritis.	
53	<i>Curculigo orchioides</i> Gaertn.	Juice of root is given to treat pneumonia.	Powder of root, mixed with milk of cow and is given for increasing energy.	Powder of root, mixed with milk of cow and is given for increasing energy.					
54	<i>Curcuma caesia</i> Roxb.	Juice of tuber is given to treat gastritis.	Juice of tuber is given to treat gastritis and B.P. high.	Juice of tuber is given to treat gastritis. Paste of tuber is applied on sprain. Tuber is mixed with rice and other medicinal plants and after cooking, given to parturient.	Juice of tuber is given to treat gastritis and applied on wounds and sprain.	Juice of tuber is given to treat gastritis, anorexia and applied on sprain.	Powder of tuber is mixed with other medicinal plants and is given to treat gastritis.	Juice of tuber is given to treat sprain and gastritis.	Juice of tuber is given to treat anorexia.
55	<i>Cuscuta reflexa</i> Roxb.	Paste of the whole part is applied on skin to remove spots.	The juice of whole part is given and paste of whole part is applied to treat jaundice.	The juice of whole part is given to treat jaundice.	The juice of whole part is given to treat jaundice.	The juice of whole part is given to treat jaundice.	The juice of whole part is given to treat conjunctivitis and jaundice.	The trailing stem is tied on hand of child to treat jaundice. Juice of whole part is used for bathing to treat wounds and	Juice of whole part is given to treat anorexia. Juice of whole part is also given to domestic animals as cooling

								fever.	agent.
56	<i>Cymbopogon citratus</i> (DC.) Stapf.	Juice of leaf is given to treat gastritis.						Powder of root is given to treat gastritis.	
57	<i>Cyperus rotundus</i> L.			Juice of tuber is given to treat weakness and diarrhoea.			Juice of tuber is given to treat weakness and diarrhoea.	Juice of tuber is given as cooling agent.	
58	<i>Datura metel</i> L.	Seed is casted and used to get rid from evil spirit.	Fruit and flower is used to worship God 'Shiva'.	Very few amount of paste of seed is given to treat worm infestation. Fried seed in oil is applied to treat swelling of body.		Seed is used in 'Shivaratri'.		Very few amount of paste of seed is given to people suffering from red urine. Juice of seed is given to domestic animals to treat anorexia.	Few amount of paste of seed is given to treat cold.
59	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	The rubbed internode is applied on wounds.	Root is used to make yoke. Stem is used to make baskets and bamboo mat.	Root is used to make yoke. Stem is used to make baskets and bamboo mat.		Juice of immature leaf is given to treat pneumonia and fever.	Water inside bamboo is given to cure person who use to excrete urine on bed.	Powder of root is mixed with other medicinal plants and is given to treat gastritis.	Water inside it is given to child who used to excrete urine on bed. Young shoot apex is eaten as vegetable. Plant is fodder.
60	<i>Desmodium concinnum</i> DC.	Juice of boiled leaves is given to treat throat pain.	Plant is used as fodder.	Grinded root is used as fish poisoning.	Grinded root is used as fish poisoning.	Grinded root is used as fish poisoning.	Grinded root is used as fish poisoning.	Grinded root is used as fish poisoning.	Juice of leaf is applied to treat lice problem of kids. Plant is used as fodder.
61	<i>Desmostachya bipinnata</i> (L.) Stapf	Juice of root is given to treat worm infestation.	Juice of root is given as cooling agent. Plant is used to worship God. Plant is essential in death ceremony.	Paste of root is applied on conjunctivitis and swelling of leg. Plant is used to worship God.	Juice of root is given to treat worm infestation. Plant is hanged on door on 'Shrawan Sakranti' God.	Juice of root is given to treat worm infestation.	Juice of root is given to treat worm infestation.	Juice of root is given to treat gastritis and as cooling agent.	Plant is used as fodder. Plant is hanged on door on 'Shrawan Sakranti'.
62	<i>Dillenia pentagyna</i> Roxb.	Fruit is edible. Plant is used as fodder.	Fruit is edible.	Fruit is edible. Plant is used as fodder.	Fruit is edible. Plant is used as fodder.	Plant is used as fodder.	Fruit is edible.	Powder of bark is given to treat gastritis.	
63	<i>Dioscorea bulbifera</i> L.	Burnt tuber is given to treat worm infestation.		Burnt tuber is given to treat worm infestation.	Burnt tuber is given to treat worm infestation.	Burnt tuber is given to treat diphtheria.	Burnt tuber is given to treat worm infestation.	Burnt tuber is given to treat worm infestation.	Tuber after cooking is given to treat worm infestation.
64	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam			Oil cake of seed ('Pina') is used as fish poisoning. Ghee is extracted from seed.	Ghee is extracted from seed.	Ghee extracted from seed is applied on burns. Grinded bark is used as fish poisoning.	Ghee from seed is applied on wounds.		Juice of bark is given to treat worm infestation. Ghee is extracted from seed. Grinded bark of plant is used as fish poisoning. Plant is used as fodder and firewood.



65	<i>Dipsacus inermis</i> Wall.	Juice of root is given to treat marasmus, anorexia. Juice of root is also given to cows and buffaloes to treat gastritis.	Juice of root given to cows and buffaloes for being fat.	Juice of root is given to domestic animals for being fat.	Juice of root is mixed with juice of tuber of <i>Tinospora sinensis</i> and is given to cows and buffaloes to treat gastritis.	Root is pickled.	Juice of root is given to cows and buffaloes for being fat.	Juice of root is given to cows and buffaloes for being fat.	
66	<i>Eclipta prostrata</i> (L.) L.	Juice of whole plant is given as cooling agent and pneumonia and also applied on cuts.	Juice of whole plant is applied on wounds made by mud on foot.	Juice of whole plant is given to treat pneumonia.	Juice of whole plant is given to treat typhoid and pneumonia.	Juice of whole plant is applied to treat wounds made by mud on foot. Plant is essential in death ceremony.	Juice of whole plant is given to treat syphilis.	Juice of whole plant is given to treat pneumonia. Juice of whole plant is applied on cuts and wounds made by mud on foot.	Paste of leaf is applied on wounds. Plant is fodder.
67	<i>Elephantopus scaber</i> L.	Juice of root is given to treat gastritis and fever.	Juice of root is given to cow and ox to treat indigestion and worm infestation.	Juice of root is given to treat gastritis to ox and is also used to prepare 'Marcha'.	Juice of root is given to ox to treat gastritis and is also used to prepare 'Marcha'.	Juice of root is given to cows and buffaloes to treat anorexia.	Juice of root is given to ox to treat gastritis.	Juice of root is given to treat sickness of cows and buffaloes.	
68	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	The burnt knot of its rope mixed with local ghee and paste given to treat uterus prolapse.	Whole plant is used to make rope and roof.	Powder of root is mixed with other medicinal plants and is given to treat gastritis. Plant is used to make rope.		Plant is used to make roof.		Powder of root is mixed with other medicinal plants and is given to treat gastritis. Boiled root is given to treat asthma and coryza.	Plant is used fodder and also used to make rope.
69	<i>Euphorbia hirta</i> L.	Sticky fluid is applied on cuts and cataract. According to local people plant is used by 'Lama'.	Juice of whole part is applied on snake bite. Sticky fluid of plant is applied on cataract.	Sticky fluid of plant is applied on cataract.	Sticky fluid of plant is applied on cataract.	Sticky fluid of plant is applied on cataract.	Sticky fluid of plant is applied on snake bite & cataract of ox.	Flower is given to treat dysentery. Sticky fluid of plant is applied on cuts.	Sticky fluid of plant is applied to treat burning sensation of chilli. Sticky fluid of plant is applied on wounds.
70	<i>Euphorbia royleana</i> Boiss.	Sticky fluid of stem is mixed with water is given to treat anorexia.	Hole is made on stem by removing spine; it is heated and marked on boils. Sticky fluid from stem is kept on toothache.	Sticky fluid of immature plant is given to treat worm infestation. If eye of ox is infected by cataract, the sticky fluid from stem is marked on reverse side head.	Fruit is given as cooling agent. Ring is worn after burning stem to treat tetanus. Juice after burning leaf is dropped in ear of child to treat otitis media. Three drop of sticky fluid from stem kept in a glass of milk and drunk on Sunday and Tuesday to treat anorexia.	Sticky fluid from stem is given to treat anorexia and to child to treat worm infestation.	If eye of cows and buffaloes is infected by cataract, the sticky fluid from stem is marked on reverse side head.	Burnt fluid from stem is given to treat anorexia. Sticky fluid from stem is applied on sprain.	Sticky fluid from stem after burning is given to treat anorexia.
71	<i>Ficus benghalensis</i> L.	Powder of root is mixed with powder of bark of <i>Ficus religiosa</i> and is given to treat infertility.	Sticky fluid from leaf petiole is kept in tooth to treat toothache and mixed	Sticky fluid from leaf petiole is applied on wounds. Sticky fluid from leaf petiole is	Leaf is use to worship God and making festoon. Leaf is essential in	Sticky fluid from leaf petiole is mixed with milk of cow and is		Sticky fluid from leaf petiole is applied on pterygium and toothache. Sticky	Plant is fodder and also used in different cultural program.

			with water and is given to treat diarrhoea. Stem is used as brush to treat gingivitis and making strong tooth.	applied on pterygium. Leaf is used to make festoon.	'Pasni'	given to treat dysentery and back bone pain.		fluid from leaf petiole is used to stick 'Tika'.	
72	<i>Ficus benjamina</i> L.	Plant is used as fodder.	Plant is used as fodder.	Plant is essential in death ceremony.	Leaf is used as festoon in 'Aunshi'.	Plant is essential in death ceremony.		Powder of bark is given to treat gastritis. Plant is essential in birth and death ceremony.	Plant is essential in birth and death ceremony. Plant is used as firewood.
73	<i>Ficus hispida</i> L.f.	Fruit is edible. Plant is used as fodder.	Fruit is edible. Plant is used as fodder.	For uterus prolapse, uterus is pushed in with the help of its leaf, of domestic animal. Juice of leaf is given to treat worm infestation to cows and buffaloes and also given to treat retention of placenta.	To treat body swelling, body is baked by its leaf and steam inhalation is also taken of root to treat body swelling. For uterus prolapse, uterus is pushed in with the help of its leaf, of domestic animal. Juice of leaf of plant is given to treat worm infestation of cows and buffaloes and also given to treat retention of placenta.	Plant is used as fodder.	Plant is used as fodder.	Plant is used as fodder.	Juice is dropped in ear after burning its leaf to treat otitismedia. Plant is used as fodder.
74	<i>Ficus racemosa</i> L.	Juice of bark or shoot apex is given as cooling agent.	Ripe fruit is edible. Plant is used as fodder.	Juice of bark or shoot apex is given to treat dysentery.	Milky sticky fluid obtained from stem is mixed with juice of bark of <i>Ficus semicordata</i> and juice of whole plant of <i>Centella asiatica</i> , and is given to treat jaundice.	Milk of the plant is given to treat child sickness.	Juice of root is given to treat asthma.	Powder of bark is given to treat gastritis.	Ripe fruit is edible and plant is used as fodder.
75	<i>Ficus religiosa</i> L.		Plant is used to worship.	Paste of bark is applied on cut wounds for tumour formation. Heated coal kept inside its leaf making cone and it is blown, then juice is dropped to ear to treat preliminary deafness.	Paste of bark is applied on cut wounds for tumour formation.	Plant is used to worship.	Paste of bark is applied on cut wounds for tumour formation.	Dried paste of bark is applied on burns and cut wounds for tumour formation. Powder of bark is mixed with urine of aged ox and drunk to treat gastritis.	Plant is used to worship.
76	<i>Ficus</i>	Fruit is edible, plant	Fruit is edible, plant	Fruit is edible, plant	Juice of root is	Fruit is edible,	Fruit is edible,	Pickle of fruit is	Water of root is

	<i>semicordata</i> Buch.-Ham. ex Sm.	used as fodder and in making handicraft.	used as fodder and in making handicraft.	used as firewood, fodder and in making handicraft.	given to treat jaundice. Fruit is edible, plant used as fodder and in making handicraft.	plant used as firewood, fodder and in making handicraft.	plant used as fodder and in making handicraft.	eaten to treat dysentery. Seven numbers of leaves after casting is given to buffaloes to treat retention of placenta.	given as cooling agent. Fruit is edible and plant used in making handicraft.
77	<i>Flemingia macrophylla</i> (Willd.) Merr.	Juice of leaves is given to treat anorexia.		Juice of bark is given to treat gastritis and bleeding of woman.		Plant is used as fodder.			
78	<i>Grewia subinaequalis</i> DC.	Ripe fruit is edible. Plant is used as fodder.	Ripe fruit is edible.	Juice of root is given to treat diarrhoea. Ripe fruit is edible. Plant is used as fodder.	Timber is used in making furniture.	Ripe fruit is edible. Plant is used as fodder and firewood.	Plant is used as fodder and firewood.	Plant is used as fodder.	
79	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.		Fruit is edible.	Fruit is edible.	Fruit is edible.		Fruit is edible.	Juice of root is given to treat gastritis and child sickness.	
80	<i>Hibiscus rosasinensis</i> L.	Juice of bark or leaves or flower is given to treat typhoid.	Juice of flower is given to treat dysentery.	Juice of flower is given to treat menstruation disorder.	Juice of flower is given to treat menstruation disorder.	Juice of flower is given to treat menstruation disorder.	Juice of flower is given to treat dysentery.	Juice of flower is given to treat dysentery and also given as cooling agent.	
81	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don		Juice of bark is given to treat fever.	Juice of bark is given to treat worm infestation.		Juice of root is given to treat typhoid and arthritis.		Powder of bark is given to treat gastritis. Grinded bark is used as fish poisoning.	Juice of bark is given to treat anorexia. Plant is used as fodder.
82	<i>Imperata cylindrica</i> (L.) P. Beauv.	Juice of root is given to treat worm infestation.	Juice of root is given to treat worm infestation.	Burnt whole plant is used to bake the wounds made by mud on foot.	Juice of root is given to treat worm infestation. Burnt whole plant is used to bake the wounds made by mud on foot.	Juice of root is given to treat worm infestation.	Juice of root is given to treat worm infestation.	Root is chewed to treat worm infestation. Juice of boiled root is given to treat joint pain and cold.	Juice of root is given to treat worm infestation.
83	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Juice of root is mixed with other medicinal plants and is given to treat pneumonia.	Juice of root is given to treat fever and asthma.	Juice of root is given to treat menstruation disorder and gastritis.	Juice of root is given to treat menstruation disorder and flowing out of black blood of woman.	Branches are used to sweep.	Juice of root is given to treat vomiting with blood.	Juice of root is given to treat gastritis and side waist pain.	
84	<i>Inula cappa</i> (Buch.-Ham. ex D. Don) DC.	Juice of bark is mixed with other medicinal plants and is given to treat pneumonia.	Flower is used to worship cow in 'Tihar'		Flower is used to worship cow in 'Tihar'.			Powder of bark is mixed with other medicinal plants and is given to treat gastritis.	
85	<i>Jatropha curcus</i> L.	Sticky fluid from stem is mixed with other medicinal plants and is given to treat pneumonia. Stem is	Stem is used as brush to treat gingivitis. Sticky fluid from stem is applied on wounds caused	Burnt stem is used as brush to treat gingivitis and toothache. Juice of root is given to treat	Burnt stem is used as brush to treat gingivitis and toothache. Juice of root is given to treat		Sticky fluid from stem is mixed with milk of woman and is given to treat	Stem is used as brush to treat gingivitis. Sticky fluid from stem is applied on wounds caused	Sticky fluid from stem is applied on cuts, burns and wounds made by mud on foot.

		used as brush to treat toothache. Sticky fluid from stem is applied on sprain.	by mud on foot.	back bone pain and stomatitis.	back bone pain. Amulet of seed is tied on arm and three seed are given to treat anorexia. Sticky fluid is applied on burns and wounds caused by mud on foot.		whitening of tongue.	by mud on foot.	
86	<i>Justicia adhatoda</i> L.	Juice of cooked shoot apex is given to treat fever and sugar. The juice is also given as cooling agent.	Juice of cooked shoot apex is given to treat fever and pneumonia and juice of root is given to treat pneumonia.	Juice of cooked shoot apex is given to treat pneumonia and cough.	Juice of its leaf is mixed with juice of root of <i>Thysanolaena maxima</i> and juice of leaf of <i>Dendrocalamus hamiltonii</i> and steam inhalation is taken to treat irregular body swelling.	Juice of cooked shoot apex is given to treat fever and cough.		Steam inhalation of juice of shoot apex is taken to treat fever, swelling of foot and hand. The juice from cooked shoot apex is given to treat asthma.	Juice of shoot apex of plant is mixed with powder of bark of <i>Trichilia connaroides</i> , powder of bark of <i>Alstonia scholaris</i> , powder of bark of <i>Schima wallichii</i> and is given to treat anorexia. Juice of shoot apex is given to treat child sickness.
87	<i>Kaempferia rotunda</i> L.	Paste of root is applied on swelling of hand, leg and sprains.	Paste of root or leaf is applied to treat headache and dizziness.	Juice of root is given to treat gastritis.	Paste of root is given and applied to treat sprain.			Paste of whole part or root is applied on fracture.	Juice of root is given to treat anorexia.
88	<i>Lagerstroemia parviflora</i> Roxb.	Plant is used as fodder.	Plant is used as firewood.	Juice of flower is given to treat dysentery. Flower is also used to burn incense.	Juice of flower is given to treat diarrhoea.	Plant is used as fodder and firewood.	Plant is used as fodder.	Juice of root or leaves or flower or bark is given to treat dysentery.	Juice of bark is given to treat gastritis. Plant is used as fodder and firewood.
89	<i>Lannea coromandelica</i> (Houtt.) Merr.			Juice of bark is applied on cuts.	Juice from barks is applied on cuts. Plant is used as fodder.	Plant is used as fodder.	Juice of bark is dropped on cuts.	Juice of bark is given to treat dysentery and gastritis.	
90	<i>Lawsonia inermis</i> L.	Paste of leaf is applied on hair to control dandruff.	Paste of leaf is applied on hair to control dandruff and to treat headache. Juice of root is given to treat jaundice. Paste of leaf is applied on wound caused by mud on foot.		Paste of leaf is applied on hair to treat headache.	Paste of leaf is applied on hair to treat headache and also as cooling agent.	Paste of leaf is applied on hair to control headache.		Paste of leaf is applied on wound made by mud on foot.
91	<i>Lygodium flexuosum</i> (L.) SW.	Paste of whole part is applied on harpszoster.	Paste of whole part is applied on harpszoster.		Paste of whole part is applied on harpszoster.			Paste of whole part is applied on harpszoster.	
92	<i>Lyonia ovalifolia</i>	Paste of bark is applied	Paste of bark is		Paste of shoot apex	Paste of shoot	Goats get die	Paste of leaf is	Fruit is edible.

	(Wallich.) Drude	on scabies. Goats get ill after eating its leaves.	applied on scabies.		of immature plant is applied on scabies.	apex is applied on scabies. Goats get die after eating its leaves.	after eating its leaves.	applied on scabies.	
93	<i>Mallotus philippensis</i> (Lam.) Mull.	Juice of fruit (excluding seed) and bark is given to treat fever and gastritis.	Juice of bark is given to treat tapeworm.	Juice of bark is given to treat dysentery. It is believed that small child will cry continuously if the stick is kept in home.	Juice of shoot apex is given to treat diarrhoea.		It is believed that small child will cry continuously if the stick is kept in home on Sunday and Tuesday.	Fruit is given to ox to treat gastritis.	Leaf is mixed with leaf of <i>Vitex negundo</i> and boiled and juice is given to treat gastritis.
94	<i>Mangifera indica</i> L.	Juice of bark is given to treat gastritis.	Juice of bark is given to treat diarrhoea and gastritis.	Juice of bark is mixed with water and used to bath to treat jaundice and as cooling agent. Juice of bark is given to treat diarrhoea.	Juice of bark is mixed with water and used to bath as cooling agent.	Juice of bark is mixed with water and used to bath as cooling agent.	Juice of bark is used to bath to treat bad smelling of child.	Juice of bark is mixed with urine of cow and is given to treat gastritis.	Juice of bark is given to treat gastritis.
95	<i>Maoutia puya</i> (Hook.) Wedd.	Juice of root is given to treat gonorrhoea. Fibre from leaf is used to make ropes.					Juice of root is given as cooling agent.		
96	<i>Melia azedarach</i> L.	Juice of bark is given to treat gastritis and also given to cows, buffaloes and goats to treat worm infestation.	Juice of root is given to treat gonorrhoea.			Timber is used to make furniture.			Juice of bark is given for worm infestation. Plant is used as fodder.
97	<i>Mentha</i> sp.	Juice of shoot apex is given to treat stomach pain, fever, pneumonia and also given as coolin agent.	Juice of leaf is given to treat cold and cough. Paste of leaf is applied to treat headache.	Paste of leaf is applied to treat headache.	Juice of leaf is given to treat cold.	Stem inhalation of leaf is taken to treat headache.		Boiled whole part is given to treat diarrhoea.	
98	<i>Mentha spicata</i> L.	Juice of whole part is given as cooling agent.	Juice of whole part is given as cooling agent.	Juice of whole part is given to treat insomnia and as cooling agent.	Juice of whole part is given to treat insomnia and as cooling agent.	Juice of whole part is given as cooling agent.	Juice of whole part is given as cooling agent.	Juice of whole part is given to treat gastritis and as cooling agent.	Juice of whole part is given as cooling agent. Leaf is pickled.
99	<i>Mimosa pudica</i> L.	Juice of whole part is given to treat fever, anorexia and stomach pain.	Boiled root is given to treat gastritis.	Juice of root is given to treat dysentery. Amulet of root is tied on arm to treat night blindness.	Amulet of root is tied on waist to treat child sickness.		Juice of root is given to treat child sickness.	Juice of root is given to treat child sickness, gastritis, insomnia and also given as cooling agent.	Juice of root is given to treat anorexia. Plant is used as fodder.
100	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Juice of root is either applied or given to treat sprain and fracture.	Powder of burnt root is applied on wounds and boils.	Ash of whole part is applied on wounds and boils. Ash of the stem is grinded mixed with mustard oil and applied on wounds and boils. Ash of whole part is used to make explosive.	Juice of root is given to treat typhoid. Used to make explosive. Juice of root is applied on sprains. Ash of whole part is used to make explosive.	Juice of root is mixed with other medicinal plants and is given to treat fracture.	Ash of whole part is applied on burns.	Powder of whole part is given to treat gastritis.	Juice of bark of plant is used in fish poisoning. Plant is used as fodder.

101	<i>Moringa oleifera</i> Lam.	Fruit is given as cooling agent.	Fruit is given as cooling agent.	Juice of shoot apex is given as cooling agent.	Fruit is edible.	Juice of bark is given as cooling agent.	Juice of seed is given as cooling agent.	Juice of shoot apex or seed is given as cooling agent.	
102	<i>Morus macroura</i> Miq.	Juice of root is given to treat worm infestation.	Juice of root is given to treat worm infestation.	Fruit causes dysentery and hot .	Juice of root is given to treat worm infestation.	Juice of root is given to treat worm infestation.	Plant is used as fodder.	Juice of root is given to treat worm infestation. Powder of bark is given to treat gastritis.	Juice of root is given to treat worm infestation. Plant is used as fodder.
103	<i>Mucuna pruriens</i> L. DC.	Juice of root is given to treat menstruation disorder.		Juice of root or fruit is given to cows and buffaloes to increase sex desire.	Juice of root is given to cows and buffaloes to make fertile. Grinded bark is used as fish poisoning.	Plant is used for chasing rats.		Juice of root without touched by woman given to cows and buffaloes to make them fertile also to increase sex desire.	
104	<i>Musa paradisiaca</i> L.	Ripe fruit is given to treat constipation and as cooling agent.	Unripe fruit is given to treat diarrhoea. The juice of fruit is given as cooling agent.	Burnt unripe fruit is given to treat diarrhoea.	Paste of root is applied on head to treat headache.	Unripe fruit is given to treat diarrhoea. Water obtained from root is given as cooling agent.	Unripe fruit is given to treat diarrhoea.	Fruit is given as cooling agent. Unripe fruit is given to treat dysentery and anorexia. Sticky fluid from stem is applied on ringworm.	Juice of fruit is given as cooling agent. Fruit is edible. Plant is used as fodder.
105	<i>Mussaenda frondosa</i> L.	Juice of shoot apex is given to women and domestic animal to treat breast engorged. Juice of root is given to treat eye defect.	Plant is used as fodder.	Juice of shoot apex is applied on wounds caused by mud on foot.	Juice of shoot apex is applied on wounds caused by mud on foot.	Juice of root is given to cows and buffaloes to treat breast engorged.	Paste of shoot apex is applied on wounds caused by mud on foot.	Powder of root is given to treat gastritis. Paste of leaf is applied on wounds caused by mud on foot.	Plant is used as fodder.
106	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Juice of stem is given to treat gonorrhoea. Paste of seed is applied on tooth to make it strong.	Paste of seed is applied on tooth to make it strong.	Paste of heated seed is applied on tooth to make it strong. Boiled stem or leaves is used to bake to treat uterus swelling.	Paste of seed is applied on tooth to make it strong.	Paste of seed is applied on tooth to make it strong.	Paste of seed is applied on tooth to make it strong.	Paste of seed is applied on tooth to make it strong.	Paste of seed is applied on tooth to make it strong.
107	<i>Nephrolepis auriculata</i> (L.) Trimen	Fruit is mixed with other medicinal plants to treat gonorrhoea.							
108	<i>Nicotiana tobacum</i> L.	Juice of shoot apex mixing with other medicinal plants is given to treat snake bite. Juice of whole part is applied to goat to remove flea. Juice of whole plant is used as insecticide in winter.	Juice of leaf is given to treat worm infestation. Juice of whole plant is used as insecticides.	Juice of leaf is applied on skin to remove leeches. Paste of leaf is used to kill snakes.	Paste of shoot apex is applied on tooth to treat toothache.	Juice of whole part is used as insecticide.		Fried seed in ghee is given to treat gastritis. Juice of whole part is used as insecticide.	Juice of leaf is given to treat worm infestation.
109	<i>Nyctanthes arbor-tristis</i> L.	Juice of bark or flower or leaf is given to treat sugar.							
110	<i>Ocimum basilium</i> L.	Seed is poured into water and drunk as cooling agent.	Seed is poured into water and drunk as cooling agent.	Juice of whole part is applied on arthritis. Whole plant is used in	Juice of leaf is applied or given as cooling agent.	Juice of leaf is mixed with leaf of <i>Ocimum</i>	Seed either boiled or only poured in water is drunk as	Seed is poured into water and drunk as cooling agent.	

				'Kul Puja' on 'Pitri Aushi'.	Powder of fruit is given to treat typhoid, cold and cough. Juice of leaf is applied to cure allergy of <i>Semecarpus anacardium</i> .	<i>tenuiflorum</i> and juice is given to treat cough.	cooling agent.	Powder of fruit is given to child to treat child sickness.	
111	<i>Ocimum tenuiflorum</i> L.	Juice of leaf mixed with water is given as cooling agent and to child to treat pneumonia.	Boiled leaf is drunk to treat cold, cough and fever.	Boiled juice of whole part is given to treat fever, stomatitis, otitismedia, cough and typhoid.	Boiled juice of whole part is given to treat fever, stomatitis, otitismedia and cough. Boiled juice of whole plant is also given to treat cold and pneumonia.	Boiled whole part is given to treat cold and cough.	Its tea is taken to treat cold and cough.	Boiled leaf is drunk to treat cold cough and fever. Boiled leaf is also given to treat child sickness.	Juice of boiled leaf is given to treat cough and fever.
112	<i>Oroxylum indicum</i> (L.) Kurz	Juice of pulp of seed is given to treat menstruation disorder.	Juice of pulp of seed is given to treat asthma.	Juice of pulp of seed or bark is given to treat typhoid. Fruit is edible. Plant is used as fodder.	Juice of pulp of seed or bark is given to treat typhoid. Juice is mixed with other medicinal plants and is given to treat typhoid and asthma.	Juice of seed is given to treat typhoid and headache.	Juice of seed is given to ox to treat lame.	Pulp of seed is given to treat cough. Powder of bark is given to treat gastritis.	Juice of bark is applied on wounds for tumour formation. Plant is used as fodder.
113	<i>Oxalis corniculata</i> L.	Juice of whole part is given to treat dizziness. Juice after grinding whole part is dropped in eyes to treat conjunctivitis.	Juice of whole part is given as cooling agent. Juice of whole part is dropped in eyes to treat conjunctivitis.	Juice is given to treat chest pain and also as cooling agent. Juice mixed with juice of whole part of <i>Centella asiatica</i> , is given to treat fever. Juice after grinding whole part is dropped in eyes to treat conjunctivitis.	Juice mixed with juice of whole part of <i>Centella asiatica</i> , is given to treat fever. Juice is given as cooling agent.	Juice after boiling whole part is given to treat fever and also as cooling agent.	Juice is given and applied to treat headache.	Juice is given to treat joint pain and as cooling agent.	Whole part boiled in water and is given to treat cold and as cooling agent.
114	<i>Periploca calophylla</i> (Wight) Falc.	Powder or juice of whole part is given to treat sprain and back bone pain.	Paste of trailer stem is applied on fracture.	Paste of trailer stem is applied on sprain. Trailer stem is tied on sprain.	Juice of trailer stem also given to treat sprain. Paste of trailer stem is applied on sprain or trailer stem is tied on sprain.	Paste of trailer stem is applied on fracture.	Paste of trailer stem is applied on sprain.	Powder of whole part is given to treat gastritis and sprain. Paste of trailer stem is applied on sprain and fracture.	Paste of root is given and applied to treat sprain and fracture. Plant is used as fodder.
115	<i>Persea odoratissima</i> (Nees) Kosterm.	Juice of bark is given to treat fever and also given as cooling agent. Paste of bark is mixed with rice flour to make bread ('Sel Roti').	Paste of bark is mixed with rice flour to make bread ('Sel Roti').	Paste of bark is mixed with rice flour to make bread ('Sel Roti').	Paste of bark is mixed with rice flour to make bread ('Sel Roti').	Paste of bark is mixed with rice flour to make bread ('Sel Roti').	Paste of bark is mixed with rice flour to make bread ('Sel Roti').	Paste of bark is mixed with rice flour to make bread ('Sel Roti').	

116	<i>Persicaria barbata</i> (L.) Hara	Grinded whole part is used as fish poisoning.	Grinded whole part is used as fish poisoning.	Juice of shoot apex is given to treat anorexia. Grinded whole part is used as fish poisoning.	Grinded whole part is used as fish poisoning.	Grinded whole part is used as fish poisoning.	Grinded whole part is used as fish poisoning.	Grinded whole part is used as fish poisoning.	Grinded whole part is used as fish poisoning. Plant is used as fodder.
117	<i>Phoenix loureiri</i> Kunth	Pickle of pulp of tuber is given to treat gonorrhoea. Fruit is given to treat cold.	Juice of root is given as cooling agent.	Unripe fruit is given to treat diarrhoea.	Juice of root is given to treat retention of urine.	Plant is used in making roof.		Powder of root is given to treat gastritis.	Ripe fruit is edible. Plant is used as fodder and in making handicraft.
118	<i>Phyllanthus emblica</i> L.	Powder of fruit, mixed with other medicinal plants and is given to treat gastritis. Fruit is boiled in water and dried and is given to treat skin diseases.	Powder of fruit, mixed with other medicine and is given to treat gastritis and stomach pain.	Powder of fruit, mixed with other medicinal plants and is given to treat gastritis.		Boiled and dried fruit is given to treat cough.	Powder of fruit, mixed with other medicinal plants and is given to treat gastritis.	Powder of fruit, mixed with other medicinal plants and is given to treat gastritis.	Juice of leaf is given to reduce burning sensation of chilli. Fruit is edible. Plant is used as fodder and firewood.
119	<i>Piper longum</i> L.	Fruit is given to treat cough. Juice of trailer stem is given to treat cough and asthma.	Fruit is chewed to treat cough. Burnt fruit is given to treat cough.	Fruit or juice of root is given to treat cough.	Fruit or juice of root is given to treat cough and gastritis.	Fruit is given to treat cough.	Fruit is given to treat cough. Fruit is also used as spices.	Fruit is given to treat cough and gastritis.	Powder of fruit is mixed with powder of fruit of <i>Terminalia chebula</i> and <i>Terminalia bellirica</i> and is given to treat gastritis. Plant is used as fodder.
120	<i>Piper mullesua</i> D.Don	Fruit is given to children to treat cough.		Leaf is used as 'Paan'.	Plant is fodder.		Fruit is given to children to treat cough. Plant is fodder.		
121	<i>Plumeria rubra</i> L.	Juice of bark is given to treat anorexia.	Juice of bark is given to treat anorexia. Juice of cooked bark is given to buffalo to increase sex desire.	Juice from bark is given to treat anorexia, stomach pain and diarrhoea.	Juice of bark is given to treat anorexia. Milky sticky fluid of leaf is applied on extreme wounds.	Juice of bark is given to treat anorexia.		Juice of bark is given to treat anorexia.	Juice of bark is given to treat anorexia.
122	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Juice of root is given to treat cough. Boiled root is given to treat extreme cough.	Juice of boiled shoot apex is given to treat fever, pneumonia, cold and cough.	Juice of boiled shoot apex is given to treat fever, pneumonia, cold and cough. Juice of boiled shoot apex is also applied to treat fever, pneumonia, cold and cough.	Boiled juice of whole part is given to treat cold. Boiled juice is also applied to treat headache and body pain.	Boiled juice of shoot apex is given to treat cold, cough and headache.	Boiled juice of shoot apex is given to treat cough.	Boiled shoot apex or root is given to child to treat cold, fever and gastritis.	Juice of shoot apex is given to treat running nose and headache. Juice of leaf is applied to treat running nose and headache.
123	<i>Premna barbata</i> Wall. ex Schauer	Juice of bark is given as cooling agent.	Juice of bark is given to treat diarrhoea and as cooling agent.	Juice of bark is given as cooling agent. Juice of bark is used to bath as cooling agent.	Sicky fluid after cutting bark is mixed with milk of cow and buffalo (50/50) and is given as cooling agent.	Juice of leaf and bark is given to animal to treat breast engorged.	Juice of bark is given as cooling agent.	Juice of bark is given to treat gastritis and as cooling agent.	Juice of bark is given as cooling agent. Plant is used as fodder and firewood.
124	<i>Prunus persica</i> (L.) Batsch	The juice of leaves is applied on wounds	The juice of leaves is applied on hoof of	The juice of leaves is applied on wound	The juice of leaves is applied on whole	The juice of leaves is applied	The juice of leaves is applied	The juice of shoot apex is applied on	



		caused due to gangrene. If domestic animals are infected with body lice and flea, the juice of leaves is used to bath them.	ox to treat wounds caused by gangrene.	caused by gangrene.	body then it was polished by red mud to treat wounds caused by gangrene to domestic animal.	on wound caused by gangrene.	on wound caused by gangrene.	wound caused by gangrene.	
125	<i>Psidium guajava</i> L.	Juice of bark is given to treat fever. Juice of shoot apex or fruit is given to treat diarrhoea and indigestion.	Juice of shoot apex or bark is given to treat diarrhoea.	Juice of shoot apex is mixed with salt and is given to treat worm infestation. Juice of bark is given to treat worm infestation.	Juice of shoot apex is given to treat diarrhoea, dysentery and pneumonia.	Juice of shoot apex is given to treat pneumonia.	Juice of shoot apex is given to treat diarrhoea.	Juice of shoot apex or bark is given to treat headache, dysentery and coryza.	Juice of bark is given to treat gastritis and diarrhoea.
126	<i>Punica granatum</i> L.	Juice of bark of fruit is given to treat diarrhoea. Seed is given to treat dysentery.	Paste of bark is applied on foot to treat wound made by mud.						Paste of bark of fruit is given to increase energy.
127	<i>Pyrus communis</i> L.	Fruit is given as cooling agent. Ripe fruit is edible.	Fruit is given as cooling agent. Ripe fruit is edible.	Ripe fruit is edible. Plant is used as firewood.	Ripe fruit is edible. Plant is used as firewood.	Ripe fruit is edible. Plant is used as firewood.	Ripe fruit is edible. Plant is used as firewood.	Fruit is given as cooling agent. Ripe fruit is edible.	Fruit is edible.
128	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Paste of root is applied to wounds. Root is used to kill dog.		Powder of root poured in one spoonful water and is given to treat extreme fever. Juice of root is given to treat fever.	Powder of root poured in one spoonful water and is given to treat extreme fever. Juice of root is given to treat fever.	Root is used to kill dog.	Juice of root is given to treat diarrhoea.	Powder of root is given to treat gastritis. Juice of root is given to treat heart pain. Root is used to kill dog.	
129	<i>Ricinus communis</i> L.	Paste of root is applied on fracture, sprain and backbone pain.	The extracted oil from seed is used as lubricants in cart-wheel.	The extracted oil from seed is applied on wounds and foot crack. Heated stone is wrapped by its leaf and fomented on wounds.	The extracted oil from seed is applied on foot cracks and gingivitis.	Oil is extracted from seed.	The extracted oil from seed is applied on wounds and boils.	The pulp of seed is heated in oil and given to treat anorexia and marasmus and also applied on body pain.	
130	<i>Rubus ellipticus</i> Sm.	The juice of root is given to treat fever. The juice of root and shoot apex is given to treat pneumonia.	The powder of root mixed with other medicinal plants and is given to treat gastritis.			Juice of root is given to infertile cows, buffaloes and goat.		The powder of root mixed with other medicinal plants and is given to treat gastritis and ulcer.	
131	<i>Saccharum officinarum</i> L.	Juice of stem is given to treat jaundice and as cooling agent.	Juice of stem is given to treat jaundice and also as cooling agent.	Juice of stem is given to treat jaundice and as cooling agent.	Leaves are given to cow and buffaloes to treat retention of placenta.	Juice of stem is given to treat jaundice and as cooling agent.	Leaf is used to make 'Marcha'. Plant is used as fodder.	Juice of stem is given to treat jaundice and as cooling agent.	Juice of stem is drunk to treat jaundice. Stem is edible.
132	<i>Scoparia dulcis</i> L.	Juice of shoot apex or root is given to treat sugar and also given as cooling agent.	Juice of leaf is given as cooling agent.	Juice of whole part is given as cooling agent.	Juice of whole part is given as cooling agent.	Juice of whole part is given as cooling agent.	Juice of whole part is given as cooling agent.	Juice of leaf is given as cooling agent.	Juice of leaf is given as cooling agent.
133	<i>Semecarpus anacardium</i> L.f.	Paste of black fruit is applied to domestic animals to treat bald	Its black fruit and leaf is need in baptism. Plant is	Burnt fruit kept in water and water is drunk to treat throat	Sticky fluid obtained after burning black seed	Paste of fruit is applied on foot cracks. Plant is	Sticky fluid obtained after burning black fruit	Powder of bark is mixed with other medicinal plants and	Red fruit is edible. Plant is used as fodder. Plant is

		pattern. It is believed that if it is burnt in baptism, its allergy is never seen in future.	used in 'Shrawan Sakranti'.	pain. Heated sticky fluid from fruit is applied on wounds.	is applied on foot crack. Plant is used in 'Shrawan Sakranti'.	used in 'Shrawan Sakranti'.	is applied on foot crack.	is given to woman suffering from blood impurity. Sticky fluid after burning black fruit is applied on foot crack.	used in 'Shrawan Sakranti'.
134	<i>Senna occidentalis</i> (L.) Link	Seed is poured into water and water is drunk to treat insomnia and also as cooling agent.	Powder of fried seed is given to treat cough.		Powder of seed is given to treat insomnia and anorexia. Powder of seed is given as cooling agent.	Powder of fried seed is given as cooling agent.	Powder of fried seed is given to treat cough.	Juice of seed is given to small child to treat vomiting and diarrhoea. Powder of fried seed is given to treat coughs and as cooling agent.	Juice of leaf is given to treat cough. Plant is used as fodder.
135	<i>Senna tora</i> (L.) Roxb.	Paste of seed is given for vomiting after snake bite.	Seed poured into water and drunk as cooling agent.	Oil is extracted from seed.	Powder of seed is mixed with other medicinal plants and is given to treat typhoid.	Powder of fruit is given to treat abdominal pain and fever.	Pickle of seed is given to treat cough.	Seed poured into water and drunk as cooling agent. Paste of shoot apex is applied to treat child sickness.	Juice of leaf is given as cooling agent.
136	<i>Shorea robusta</i> Gaertn.	Powder of bark is given to treat gastritis.	Juice of bark is given to treat diarrhoea. Bark is used to make polish. Sal incense and seed is used for making soap.	Juice of Sal incense or grinded bark is given to treat diarrhoea and dysentery.	Juice of Sal incense or grinded bark is given to treat diarrhoea and dysentery.	Bark is chewed to treat cough.	Juice of bark is given to treat dysentery.	Juice of bark is given to treat diarrhoea and gastritis.	Juice of boiled bark is given to treat gastritis. Plant is used as fodder and firewood. Timber is used in making furniture.
137	<i>Sida cordifolia</i> L.	Juice of leaves is given to treat typhoid. Paste of leaves is applied on boils.	Paste of leaves is applied on boils.	Paste of leaves is applied on boils.	Paste of leaves is applied on boils, tetanus and breast engorged.		Leaves are grinded with rice and paste is applied on boils.	Leaves are grinded with rice and paste is applied on boils.	Plant is used as fodder.
138	<i>Smilax ovalifolia</i> Roxb. ex D. Don		It is believed that if the plant is kept in home, home will be safe from witches.	Juice of root is given to treat weakness and marasmus.				Powder of root is given to treat gastritis. Amulet of root is tied on arm to be safe from witches and ghost.	Shoot apex is taken as vegetable and plant is used as fodder.
139	<i>Solanum anguivi</i> Lam.	Juice from leaf is given to treat headache. Juice of seed is given to treat constipation. Paste of seed is applied on head.	Juice of leaf is given as cooling agent. Paste of seed is applied to treat headache.	Juice of seed is given to treat headache and fever. Paste of seed is applied to treat headache.	Juice of seed is given to treat headache and also given as cooling agent. Paste of seed is applied to treat headache.		Juice of seed is given to treat headache. Paste of seed is applied to treat headache.	Juice of seed is given to treat headache. Paste of seed is applied to treat headache. Paste of seed is also applied to treat high blood pressure and bile juice problem.	Juice of seed is given to treat headache.
140	<i>Solanum nigrum</i> L.	Juice of leaf is given to cows and buffaloes to treat epilepsy.	Fruit is edible.	Juice of root is given to treat vomiting.	Juice of seed and shoot apex is given to treat gastritis. Shoot apex is mixed with fruit of <i>Momordica</i>	Juice of root or fruit is given as cooling agent.	Plant is used as fodder.	Juice of shoot apex is given to treat child sickness.	

					<i>charantia</i> , seed of <i>Sapindus mukorosii</i> , inflorescence tip of <i>Thysanolaena maxima</i> , 'Chuk' and ash and paste is prepared and is given to treat mental disorder to cow and buffaloes.				
141	<i>Solanum virginianum</i> L.	Powder of fruit is used to treat toothache.	Powder of fruit is used to treat toothache.	Powder of fruit is mixed with paste of whole part of <i>Eclipta prostrata</i> and root of <i>Callicarpa macrophylla</i> and is given to treat typhoid.	Powder of fruit is used to treat toothache.	Fruit is smoked to treat toothache.	Powder of fruit is used to treat toothache.	Powder of fruit is used to treat toothache. Amulet of root is tied on waist of child to treat child sickness, diarrhoea and vomiting. Fruit is used to make soap.	Fruit is smoked to treat toothache.
142	<i>Solena amplexicaulis</i> (Lam.) Gandhi	Juice of root is given to treat breast engorged.	Amulet of root is tied on arm to treat pneumonia.	Juice of root is given as cooling agent. Amulet of root is tied on arm to treat psycho disorder.	Juice of root is given to child to treat psycho disorder and gastritis.	Juice of root is given to treat menstruation disorder.	Amulet of root is tied to treat psycho disorder.	Juice of root is given to treat anorexia and marasmus. Amulet of root is tied on arm as cooling agent and child sickness.	Paste of seed is given as cooling agent. Plant is used as fodder.
143	<i>Spilanthes calva</i> DC.	Juice of fruit is given to treat gastritis and cold. Paste of fruit is put on tooth to treat toothache.	Juice of fruit is given to treat cold.		Paste of fruit is put on tooth to treat toothache.	Fruit is used to make Marcha.	Hot juice of fruit is given to treat cough.	Hot soup of flower is given to treat cold and gastritis. Paste of fruit is put on tooth to treat toothache.	Juice of flower is given to treat cold. Flower is placed on tooth to treat toothache.
144	<i>Spondias pinnata</i> (L. f.) Kurz		Paste of bark is applied on wounds caused by mud on foot. Ripe fruit is edible.		Paste of leaf is applied on wounds caused by mud on foot.	Ripe fruit is edible.	Ripe fruit is edible.	Powder of fruit mixed with powder of rhizome of <i>Zingiber officinale</i> and paste of bulb of <i>Allium sativum</i> , is given to treat coryza. Powder of seed is given to treat gastritis. Paste of leaf is applied on wounds caused by mud on foot.	Plant is used as fodder and firewood.
145	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Juice of root is given to treat menstruation disorder and worm infestation.	Paste of root is applied on boils.	Juice of root is given to treat fever.				Powder of root is given to treat gastritis.	
146	<i>Syzygium cumini</i> (L.) Skeels	Powder of bark is given to treat gastritis.	Juice of bark is given to treat diarrhoea.	Juice of bark is given to treat diarrhoea. Grinded bark is used	Grinded bark is used as fish poisoning.	Powder of fruit is given to treat sugar.		Juice of bark is given to treat dysentery and	Ripe fruit is edible.

				as fish poisoning.				gastritis.	
147	<i>Syzygium</i> sp.	Powder of bark is mixed with other medicinal plants and is given to treat gastritis.	Dried leaf is enrolled in green leaf and smoked to treat coryza.	Juice of grinded bark is used as fish poisoning.			Leaf is smoked to treat coryza. Leaf is kept on head in sunrise and left in sunset to treat migraine.	Leaf is smoked to treat coryza and bark is given to treat gastritis.	
148	<i>Tamarindus indica</i> L.	Squash of fruit is drunk as cooling agent.	Fruit is pickled.	Juice of leaf mixing with other medicinal plants and is given to treat extreme fever.				Fruit is given to treat gastritis.	Fruit is pickled. Timber is use to make furniture.
149	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C.Chr.	Juice of root is given to treat lower abdominal pain and extreme bleeding (woman).	Juice of root is given to treat lower abdominal pain.	Juice of root is given to treat lower abdominal pain.	Juice of root is given to treat lower abdominal pain.	Young shoot apex is taken as vegetable.	Ash of whole plant is applied on burns.	Juice of root is given to treat dysentery, diarrhoea and gastritis.	Juice of root is given to treat diarrhoea and stomach pain. Young shoot apex is taken as vegetable. Plant is used as fodder.
150	<i>Terminalia alata</i> Heyne ex Roth	Juice of bark is given to treat gastritis and indigestion. Juice of bark is given to cows and buffaloes to treat constipation.	Plant is used as fodder and firewood.	Juice of bark is given to treat diarrhoea and dysentery. Plant is used as fodder and firewood. Timber is used in making furniture.	Bark is boiled and juice is applied on wounds. Plant is used as fodder and timber is used in making furniture.	Plant is used as fodder and firewood. Timber is used in making furniture.	Juice of boiled bark is applied on cuts.	Juice of leaves is dropped on cuts.	Plant is used as fodder and firewood.
151	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Powder of seed is given to treat gastritis.	Powder of bark and seed is given to treat gastritis.	Powder of seed is given to treat gastritis and cough. Paste of bark is used to treat the allergy of <i>Semecarpus anacardium</i> by massaging.	Paste of bark is used to treat the allergy of <i>Semecarpus anacardium</i> by massaging.		Powder of seed is given to treat gastritis.	Powder of seed is given to treat gastritis.	Powder of seed is given to treat gastritis. Plant is used as fodder, firewood and to make furniture.
152	<i>Terminalia chebula</i> Retz.	Burnt seed is given to treat cough.	Powder of seed is mixed with other medicinal plants and is given to treat gastritis.	Burnt seed is given to treat cough and gastritis.	Burnt seed is given to treat cough.		Powder of seed is mixed with other medicinal plants and is given to treat gastritis.	Burnt seed is given to treat cough and gastritis.	Burnt seed is given to treat cough. Powder of seed is given to treat gastritis.
153	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Paste of root is applied on breast engorged and wound.	Juice of root is given to treat gonorrhoea.	Paste after rubbing root is given to treat breast engorged, gastritis and weakness. The necklace of root is hanged to neck of cows, buffaloes, and goat when they are ill.			The juice of root is given to treat fever to child.	Powder of root mixed with other medicinal plants and is given to treat gastritis.	Plant is used as fodder.
154	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	The juice of root is given to treat pneumonia and paste	The juice from the root is given to treat gastritis.	The juice from the root is given to treat gonorrhoea.	Juice of root of plant is mixed with juice of leaf of	Juice of shoot apex or root is given to treat		Juice of root is given to treat gastritis.	Plant used as fodder and handicraft.

		of root is applied on boils.			<i>Justicia adhatoda</i> and juice of leaf of <i>Dendrocalamus hamiltonii</i> and steam inhalation is taken to treat irregular body swelling.	typhoid.			
155	<i>Tinospora sinensis</i> (Lour.) Merr.	Juice of tuber is given to treat gastritis.	Juice of tuber is given to treat gastritis. Juice of trailer stem is given to buffalo for more production of milk.	Juice of tuber is given to treat gastritis, to both man and animal.	Juice of tuber is given to treat gastritis.	Juice of tuber is given to treat gastritis.	Juice of tuber is given to treat gastritis.	Juice of tuber is given to treat gastritis.	Powder of tuber after drying is given as cooling agent.
156	<i>Trichosanthes tricuspidata</i> Lour.			Juice of root is given to treat retention of placenta. Amulet of root is tied on arm to treat fever and psycho disorder.	Amulet of root is tied on arm to treat fever and psycho disorder. According to local people, water (keeping in its tuber's utencil) is fed to hens to cure its sickness.	Paste of fruit is applied to treat the retention of placenta. Paste of root is applied to buffalo to treat breast engorged.		Paste of root or fruit is applied to treat breast engorged.	Amulet of root is tied to domestic animal's neck to treat retention of placenta.
157	<i>Tridax procumbens</i> L.	Plant is used as fodder. Whole part is used to make 'Marcha'.	Plant is used as fodder.	Paste of flower is kept on tongue to treat stomatitis. Plant is used as fodder.	Juice of leaves is dropped on cuts. Plant is used as fodder. Whole part is used to make 'Marcha'.	Whole part is used to make 'Marcha'.	Plant is used as fodder.	Juice of whole part is given to treat anorexia.	Plant is used as fodder. Whole part is used to make 'Marcha'.
158	<i>Viscum album</i> L.	Juice of tuber is given to treat diarrhoea and gastritis. Paste of bark is applied on fracture.	Paste of bark or leaf is applied on back bone pain, fracture, sprain and waist pain. Juice of bark or leaf is given to treat back bone pain, fracture, sprain and waist pain.	Juice of bark or leaf is given to treat fracture and sprain. Paste of bark or leaf is applied on fracture and sprain.	Juice of bark or leaf is given to treat fracture and sprain. Paste of bark or leaf is applied on fracture and sprain.	Juice of bark is applied on sprain and fracture.	Juice of bark is applied on sprain.	Juice of bark or root is given to treat fracture and sprain. Bark is also mixed with bread to make medicine to treat sprain and fracture. Paste of bark or root is applied on fracture and sprain.	Grinded leaf is mixed with bread and is given to treat sprain.
159	<i>Vitex negundo</i> L.	Juice of shoot apex is given to treat anorexia. Grinded shoot apex is mixed with root of <i>Mimosa pudica</i> and juice is given to treat uterus prolapse. Juice of shoot apex is dropped in eye of domestic animal to treat cataract.	Juice of root is given to treat gonorrhoea. Amulet of shoot apex is tied on waist of child to treat psycho disorder.	Boiled leaf is inhaled to treat coryza. Branches are kept inside the cage of hens to remove small insects ('Sulsule').	Boiled leaf is inhaled to treat coryza. Branches are kept inside the cage of hens to remove small insects ('Sulsule').	Boiled leaf is inhaled to treat headache.	Branches are kept inside the cage of hens to remove small insects ('Sulsule').	Juice of leaf is dropped in nose to treat coryza. Grinded leaf is inhaled to treat asthma. Its branch is used in child sickness to exorcize.	Leaf mixed with leaf of <i>Malotus philippensis</i> and boiled and juice is given to treat gastritis.
160	<i>Woodfordia</i>	Juice of flower is given	Juice of flower is	Flower and juice bark	Juice of flower is	Juice of flower is	Juice of flower	Juice of flower and	Flower is given to

	<i>fruticosa</i> (L.) Kurz	to treat dysentery.	given to treat dysentery. Flower is given to treat diarrhoea. Bark is used for making polish.	is given to treat dysentery. Juice of leaf and fruit mixed with juice of leaf of <i>Aegle marmelos</i> and is given to treat vomiting and diarrhoea.	given to treat dysentery. Juice of shoot apex is given to treat diarrhoea.	given to treat dysentery.	and bark is given to treat dysentery.	bark is given to treat dysentery.	treat dysentery. Plant is used as fodder.
161	<i>Xerompis spinosa</i> (Thunb.) Keay	Fruit is edible, plant used as fodder and grinded bark or fruit is used in fish poisoning.	Fruit is edible, plant used in handicraft and grinded bark or fruit is used in fish poisoning.	Juice of fruit is kept in water and water is used to bath as cooling agent. Grinded fruit is used as fish poisoning.	Fruit is edible and used as fish poisoning.	Fruit is edible and used as fish poisoning.	Fruit is edible and used as fish poisoning.	Pickle of immature fruit is given to treat malaria.	Fruit is edible and used as fish poisoning.
162	<i>Zizyphus mauritiana</i> Lam.	Pulp of seed is given to treat measles and headache.	Pulp of seed mixed with milk of black goat and is given to treat measles.	The grinded pulp of seed given to treat measles. Paste of seed is applied as cooling agent.	Pulp of seed given to treat measles. Paste of seed is applied as cooling agent.	Juice of root or seed is given to treat dysentery and gastritis and pulp of seed is given to treat measles.	Juice of root is given as cooling agent. Pulp of seed is given to treat measles.	Juice of root or shoot apex or seed is given to treat measles to child and gastritis.	Its seed and soil of termite's nest is cooked by mixing water and is given to treat measles.
163	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Pulp of seed is given to treat diarrhoea. Juice of root is given to treat typhoid and worm infestation. Root is chewed and paste after chewing is applied on wounds made by snake bite.	Pulp of seed is mixed with milk of black goats and is given to treat measles.	Juice of root is given as cooling agent, diarrhoea and dysentery.	Root is chewed and paste after chewing is applied on wounds made by snake bite.	Juice of root is given to treat anorexia and gastritis. Pulp of seed is applied on measles.	Pulp of seed is given to treat cough.	Pulp of seed is mixed with milk of black goats and is given to treat measles.	
164	Unkonwn 1		Oil is extracted from seed. Plant is used as fodder.	Juice of root is given to treat dysentery.		Plant is used as fodder.	Plant is used as fodder.	Juice of bark is given to treat diarrhoea. Powder of root mixing with powder of bark of other medicinal plants, is given to treat typhoid and side waist pain.	
165	Unkonwn 2	Fruit is edible and the plant is fodder.	Leaf is essential in death ceremony to present 'Pinda' to forefathers on it.	Sticky fluid from stem is applied on boils.	Plant is fodder	Plant is fodder	Fruit is edible.	Seed is chewed to treat dysentery.	Fruit is edible and the plant is fodder.
166	Unkonwn 3	Paste of root is applied on burns.	Juice of root is given to treat dog bite and paste of root is applied on wound caused by dog bite. Juice of root is given to cow and buffaloes to treat gastritis.	Juice of root is given to goats if they ate poisonous grass. Paste of root is applied on dog bite and snake bite.	Juice of root is mixed with juice of root of <i>Achyranthes bidentata</i> and <i>Elephantopus scaber</i> and is given to treat anorexia. Juice of root is	Juice of root or leaf is given to treat anorexia.	Juice of stem or leaf is applied on snake bite.	Paste of root is applied to treat scorpio bite, dog bite and headache.	

					given to treat snake and scorpio bite and paste of root is applied on snake and scorpio bite.				
167	Unkonwn 4	Juice of whole plant is given as cooling agent.	Juice of whole plant is given as cooling agent. Paste of whole part is applied as cooling agent.	Juice of whole plant is given as cooling agent.	Juice of whole plant is given as cooling agent.	Juice of whole plant is given as cooling agent.	Juice of whole plant is given as cooling agent.	Powder of whole part is given to treat gastritis. Juice of whole part is applied on sprain and is given as cooling agent.	Plant is used as fodder.
168	Unkonwn 5			Rhizomes are fried on mustard oils and are applied on arthritis. Plant is used as fish poisoning.	Plant is used as fodder.				
169	Unkonwn 6	Juice of root is given to treat fever. Fruit is edible and plant is used as firewood.	Fruit is edible and plant is used as fodder.	Plant is used as fodder and firewood.	Fruit is edible and plant is used as fodder.	Fruit is edible and plant is used as firewood.	Plant is used as fodder.	Plant is used as fodder.	
170	Unkonwn 7	Juice of bark is given to treat jaundice and abdominal disorder.	Juice of bark is given to treat jaundice and also applied to treat jaundice.	Juice of bark is mixed with flour of rice which is baked and is given to treat jaundice.	Paste of bark is applied to treat jaundice.	Juice of bark is given to treat jaundice.	Juice of bark is given to treat jaundice.	Juice of bark is given to treat jaundice. Juice of bark is also used to bath to treat jaundice.	

### 5.3 Variation in Ethnomedicinal Knowledge among Different Ethnic/Caste Groups

The ethnobotanical study carried out in showed the great variation in the use pattern of medicinal plants among eight different ethnic/caste groups (Table 1).

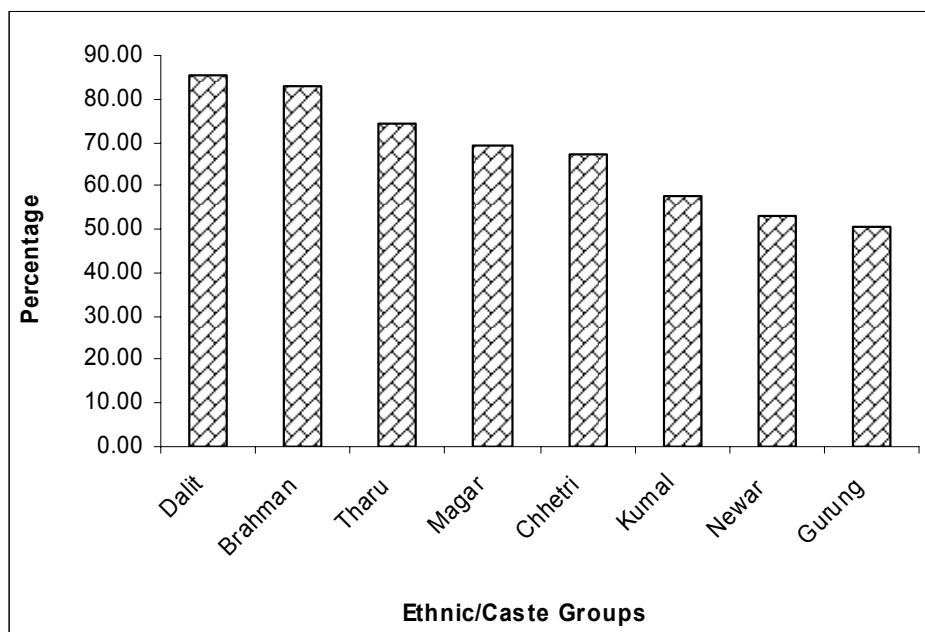


Fig. 6: Ethnomedicinal Knowledge variation among eight ethnic/caste groups

Out of 170 medicinal plants, 145 species (85.29%) were known to Dalit as they had very rich knowledge about medicinal use of plants, followed by Brahman having good knowledge of 141 (82.94%) medicinal plants. Similarly, Tharu had knowledge of about 126 (74.12%), Magar about 118 (69.41%), Chhetri about 114 (67.06%), Kumal about 98 (57.65%), Newar about 90 (52.94%) and Gurung had knowledge of about 86 (50.59%) plant species (Figure 6).

Some medicinal plants were not used for a single purpose but depending upon the traditional medicinal practices different ethnic/caste groups has typical knowledge about the use of medicinal plants. Different plants might be used to treat same disease/disorder by different ethnic/caste groups or there might be difference in mode of use or difference in parts use (Table 1). Basically there were two ways of medicinal use, one oral and other applied externally. In case of oral use, the highest use of medicine was in the form of juice (44.25%) followed by the powder (18.82%), as raw (10.45%), as decoction (9.76%), as paste (4.88%), as infusion



(2.09%), as pulp, in the form of smoke and sticky fluid (1.74%) each and miscellaneous (sum of the modes which were not used frequently) (4.53%) (Figure 7).

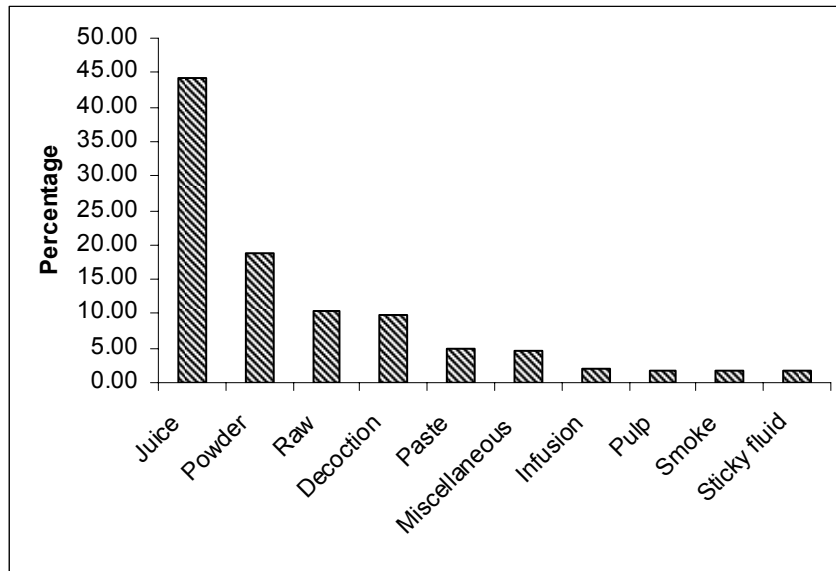


Fig. 7: Oral mode of use of medicinal plants

In case of applied mode of use, paste of the plants was highly used to treat ailments. Among 170 species of medicinal plants 49 (39.20%) medicinal plants were used in the form of paste followed by juice (15.20%), as sticky fluid (13.60%), as spiritual casting (9.60%), as decoction (4.80%), as powder (3.20%) as pulp (1.60%) and miscellaneous (12.80%) (Figure 8).

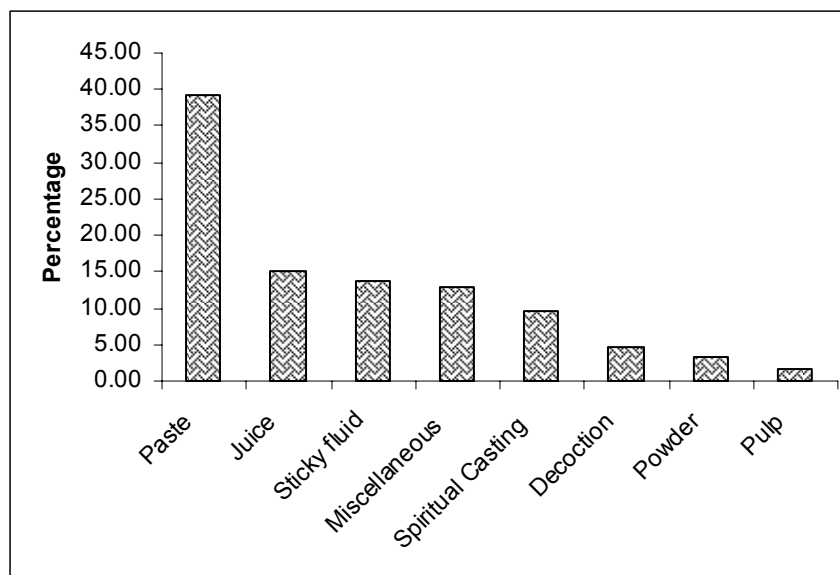


Fig. 8: Mode of use of medicinal plants (Applied)

Similarly, different parts of plants were used to treat different ailments. The plant parts that were used for medicinal purpose were whole part, root, stem, leaves, shoot apex, flower, fruit, seed, bark, rhizome, tuber, etc. The most frequently utilized plant parts among 170 medicinal plant species recorded from study area were 19.2% (69) roots, followed by 18.1% (65) leaves, 13.6% (49) barks, 12.8% (46) fruits, 8.1% (29) shoot apexes, 7.8% (28) whole parts, 7.8% (28) seeds, 7.5% (27) stems, 2.8% (10) flowers, 1.9% (7) tubers and 0.6% (2) rhizomes (Figure 9).

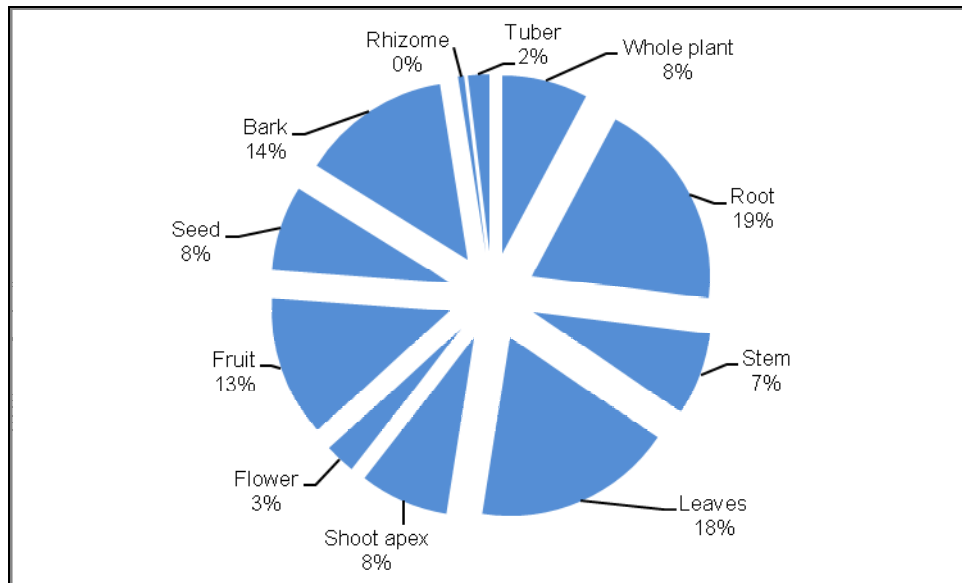


Fig. 9: Percentage of parts used of medicinal plants

#### 5.4 Preference of Medicinal Plant

Variation was also observed on the medicinal plants preferred to treat same disease/disorder (Table 1). Among 170 medicinal plants, some of the plants were very popular and frequently used by all ethnic/caste groups while some plants were used only by one ethnic/caste group.

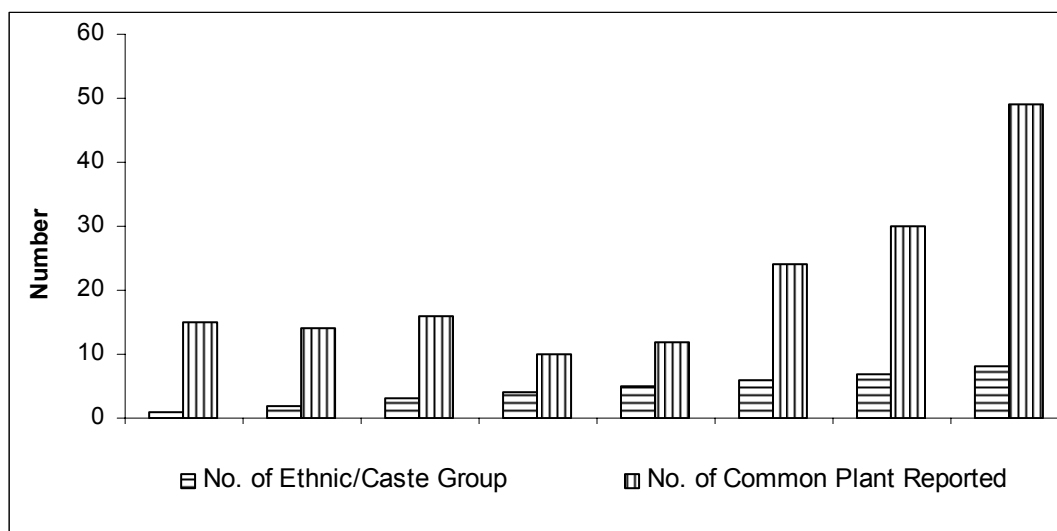


Fig. 10: Number of common plants used by eight ethnic/caste groups

Out of total plant species, 49 (28.82%) species of medicinal plants were used by all ethnic/caste groups, 30 (17.65%) species were used by seven ethnic/caste groups, 24 (14.12%) species were used by six ethnic/caste groups, 12 (7.06%) species were used by five ethnic/caste groups, 10 (5.88%) species were used by four ethnic/caste groups, 16 (9.41%) species were used by three ethnic/caste groups, 14 (8.24%) species were used by two ethnic/caste groups and 15 (8.82%) species were used by only one ethnic/caste group (Figure 10, Table 1, Appendix IV).

### 5.5 Multiple Uses of Plants by Different Ethnic/Caste Groups

Medicinal plants are not only used to treat diseases/disorders but they have a multiple use as food, fodder, fuelwood, fish poisoning, 'Marcha' preparation, etc. People may use same plant for different purposes based on the knowledge obtained from their ancestors and own experiences. Such knowledge may also be varied in people in different localities and cultures they are following.

Multiple uses (edible, fodder, fuelwood, cultural, handicraft, furniture, fish poisoning, 'Marcha' preparation, oil extract, alcohol and miscellaneous) of medicinal plants were also documented among eight ethnic/caste groups. Although medicinal use knowledge was found to be high in Dalit and Brahman in comparison to Tharu and other ethnic/caste groups but Tharus had exceptionally high knowledge about multiple uses of plant as edible, fodder, fuelwood,

handicraft, fish poisoning, 'Marcha' preparation, oil extraction and alcohol preparation (Figure 11, Appendix III).

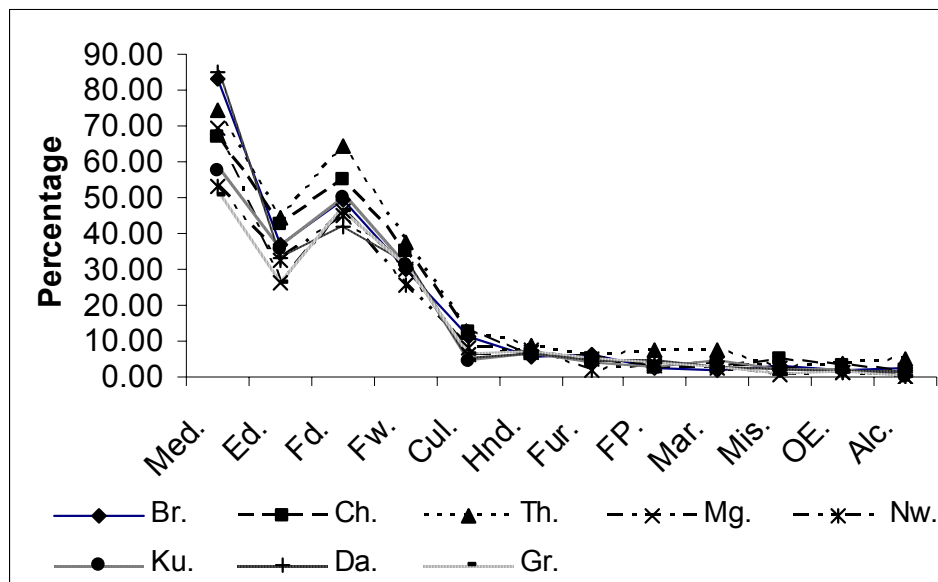


Fig. 11: Knowledge variation in multiple uses of plants among eight ethnic/caste groups

### 5.6 Common Medicinal Plant Reported to treat Common Disease

Many plants have common use for common disease/disorder and out of 170 medicinal plants reported 12 species of medicinal plants were used by eight ethnic/caste groups to treat 9 common diseases/disorders which was followed by 18 species were used by 7 ethnic/caste groups to treat 12 common diseases/disorders, 15 species were used by 6 ethnic/caste groups to treat 12 common diseases/disorders, 27 species were used by 5 ethnic/caste groups to treat 17 common diseases/disorders, 33 species were used by 4 ethnic/caste groups to treat 24 common diseases/disorders, 51 species were used by 3 ethnic/caste groups to treat 29 common diseases/disorders, 112 species were used by 2 ethnic/caste groups to treat 49 common diseases/disorders and 498 species were used by only 1 ethnic/caste group to treat 107 common diseases/disorders (Figure 12, Appendix IV).

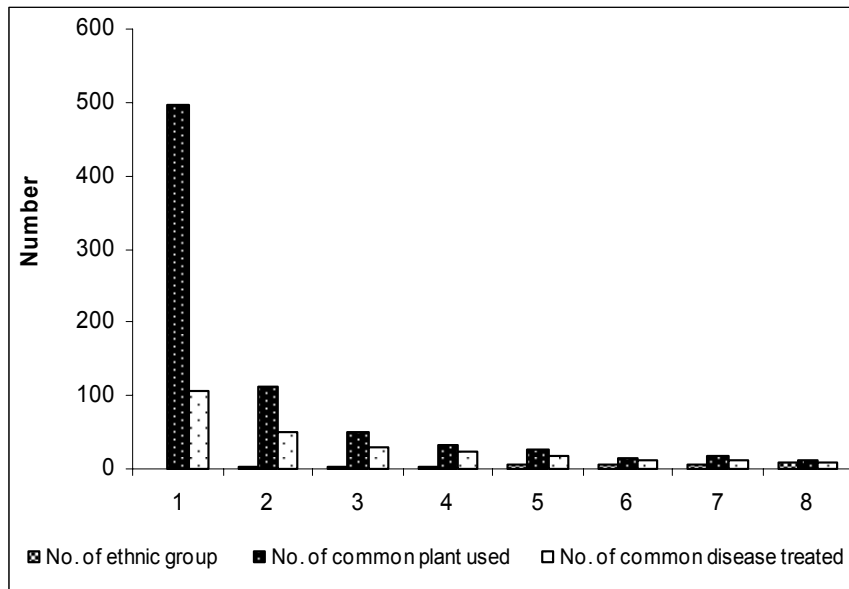


Fig. 12: Number of common plants reported to treat common disease

### 5.7 Medicinal Plants having high Ethnographic Validity used for Common Disease/Disorder

Appendix IV and V shows the frequency for a common medicinal use in terms of percentage of respondent in each ethnic/caste group using the medicinal plant for a common diseases/disorders and score of ethnographic validity.

The ethnographic validity of 170 medicinal plant species was calculated. Among total medicinal plant species, 10 plant species had very high validity score that ranges from 300-420 validity score, 25 plant species had high validity score that ranges from 200-300 validity score, 29 plant species had medium validity score in which 3 plant species were repeated and ranges from 100-200 validity score and 702 plant species (most plant species were repeated) had low validity score that was below 100 ethnographic validity score (Figure 13). Due to high repetition of plant species with low ethnographic validity score, plant species having low validity score were not presented in Appendix V.

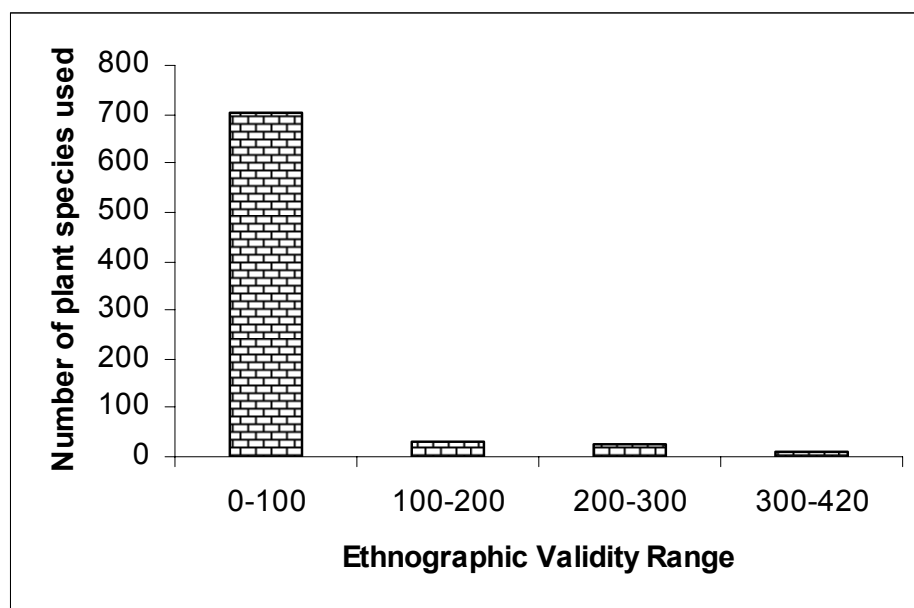


Fig. 13: Relationship between Ethnographic validity and number of plants used

Ethnographic validity score of each plant species to treat different ailments had been calculated for 170 plants. Among them 64 medicinal plant species (in which 6 plant species were repeated) had been found to have high ethnographic validity (including very high, high and medium ethnographic validity score). Among 64 plant species having high ethnographic validity, 22 species were chosen for comparative study with previous use report given by various researchers (Table 2). To select these 22 plant species, cultivated, alien and weed species were excluded and plant species having mean frequency less than 30% were also excluded (Appendix V).

**Table 2: Comparison of medicinal uses of plants between present finding and previous works**

S. N o.	Scientific name	Parts use	Uses (Present finding)	Uses reported previously
1	<i>Caesalpinia decapetala</i> (Roth) Alston	Lf, Br	Ringworm	1. Laxative (Kunwar <i>et al.</i> , 2006)
2	<i>Calotropis gigantea</i> (L.) Dryand.	Sf, Lf, St	Cuts, sprain, coryza, boils, wounds	1. Swelling (Manandhar, 1985) 2. Boils (Manandhar, 1988, 1998) 3. Sinusities (Bhattarai, 1990, 1992c, 1993a) 4. Sprain (Bhattarai, 1991) 5. Anthelmintic (Bhattarai, 1992a) 6. Scabies (Bhattarai, 1992c) 7. Wound, skin infection, cough (Muller-Boker, 1993)

				8. Abortion (Bhattarai,1994)
				9. Rheumatism,burns, dysentery (Siwakoti & Varma, 1996)
				10. Sprain, cold, cough, sinusities (Kunwar <i>et al.</i> , 2006)
3	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Br, St, Lf	Coryza, headache, cold, dysentery,gastritis, running nose	1. Muscular swelling (Manandhar, 1988) 2. Sinusities(Kunwar <i>et al.</i> , 2006 )
4	<i>Curcuma caesia</i> Roxb.	Tu	Gastritis, High B.P., sprain,wound, anorexia	
5	<i>Dioscorea bulbifera</i> L.	Tu	Worm infestation,diphtheria	1. Aphlodiesiac, pergative, stomachic; in piles, syphilis (Tiwari and Joshi, 1990a) 2. Cough,cold (Bhattarai,1993a,1993c) 3. Worms and germs (Manandhar, 1995 1998) 4. Ulcers,piles,dysentery,syphilis (Siwakoti & Varma, 1996) 5. Vermifuge (Kunwar <i>et al.</i> , 2006)
6	<i>Morus macroura</i> Miq.	Rt	Gastritis, wound infestation	1. Anthelmintic (Bhattarai, 1992a)
7	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Se, St, Lf	Gonorrhoea, tooth strong, uterus swelling	
8	<i>Periploca calophyllia</i> (Wight) Falc.	Wp, St, Rt	Back bone pain, fracture, gastritis, sprain	1. To set dislocated bone (Manandhar, 1994)
9	<i>Persicaria barbata</i> (L.) Hara	Wp, Sa	Anorexia, fishpoisoning	1. Scabies (Manandhar,1991)
10	<i>Piper longum</i> L.	Fr, St, Rt	Asthma, cough, gastritis	1. Stomachic,carminative,tonic;in bronchitis, asthma, cold, snake bite (Tiwari and Joshi, 1990b) 2. Hooping cough (Bhattarai,1993a) 3. Cold (Muller-Boker, 1993) 4. Stomachic, carminative, alterative, tonic, expectorant, snake bite, scorpio-sting (Siwakoti & Varma, 1996)
11	<i>Plumeria rubra</i> L.	Br, St	Anorexia, diarrhoea, sexually active, stomach pain, wound	1. Drastic purgative; in toothache,carious teeth (Tiwari and Joshi, 1990b) 2. Amoebic dysentery (Manandhar, 1993) 3. Puragative, febrifuge (Siwakoti & Varma, 1996) 4. Dysentery (Kunwar <i>et al.</i> , 2006)
12	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Wp, Rt, Sa, Lf	Cough, fever, pneumonia, cold, headache, body pain, gastritis, running nose	1. Dysentery (Manandhar, 1985,1991) 2. Diarrhoea (Manandhar, 1988) 3. Cough, cold (Manandhar, 1989,1992) 4. Fever (Manandhar, 1993) 5. Bleeding, diarrhoea, dysentery (Siwakoti & Varma, 1996)
13	<i>Premna barbata</i> Wall. ex Schauer	Br, Lf, Sf	Breast engorged, as cooling agent, diarrhoea, gastritis	1. Wounds (Manandhar, 1991) 2. Fever (Kunwar <i>et al.</i> , 2006)
14	<i>Solanum anguivi</i> Lam.	Se, Lf	Constipation, headache, as cooling agent,fever,B.P high, bile juice problem	1. Insomnia (Manandhar, 1985) 2. Carminative, expectorant (Siwakoti & Varma, 1996)
15	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Se, Br	Allergy, cough, gastritis	1.Astringent, tonic, antipyretic, laxative, sedative; in diarrhoea, leprosy, dyspepsia, bronchitis, headache (Tiwari and Joshi, 1990b) 2.Bronchitis (Muller-Boker, 1993) 3.Piles, dropsy diarrhoea, leprosy, headache,fever (Siwakoti & Varma, 1996) 4. Fever (Manandhar, 1998) 5.Diarrhoea, headache (Joshi & Joshi, 2000 ) 6. Gastritis (Kunwar <i>et al.</i> , 2006)
16	<i>Tinospora sinensis</i> (Lour.) Merr.	Tu, St	As cooling agent, gastritis, production of more milk	1. Cough (Manandhar, 1988) 2. Fever, body-aches (Bhattarai, 1993c)

				3. Fever, jaundice, diabetes, liver swelling, dyspepsia, indigestion, stomachache, hyperacidity (Kunwar <i>et al.</i> , 2006)
17	<i>Viscum album</i> L.	Tu, Br, Lf, Rt	Diarrhoea, gastritis, fracture, backbone pain, waist pain, sprain	1. Muscular swelling, boils, wounds (Manandhar, 1988) 2. Wound (Manandhar, 1989) 3. Dislocation of bone, boils, wounds (Manandhar, 1992) 4. Joint pain (Kunwar <i>et al.</i> , 2006).
18	<i>Woodfordia fruticosa</i> (L.) Kurz	Fl, Br, Lf, Fr, Sa	Diarrhoea, dysentery, vomiting	1. Sprain and pain (Manandhar, 1985) 2. Stomach ache (Manandhar, 1989) 3. Leucorrhoea (Bhattarai, 1990) 4. Diarrhoea, dysentery (Bhattarai, 1990-1992) 5. Astringent, haemostatic, antipyretic, leucorrhoea, dysentery, burn (Tiwari and Joshi, 1990b) 6. Stomachalgia (Bhattarai, 1991) 7. Dysentery (Manandhar, 1991) 8. Diarrhoea, dysentery (Bhattarai, 1993b) 9. Indigestion (Manandhar, 1993) 10. Menorrhagia, leukorrhoea (Bhattarai, 1994) 11. Fever (Manandhar, 1994) 12. Bloody stool (Manandhar, 1995) 13. Stimulant in pregnancy, dysentery, stomachache (Siwakoti & Varma, 1996) 14. Boils, stomatitis (Manandhar, 1998) 15. Scabies, vomiting (Joshi & Joshi, 2000) 16. Dysentery (Kunwar <i>et al.</i> , 2006)
19	<i>Xeromphis spinosa</i> (Thunb.) Keay	Imf	Malaria, as cooling agent, Fishpoisoning	
20	<i>Zizyphus mauritiana</i> Lam.	Pu, Se, Rt, Sa	Measles, headache, as cooling agent, dysentery, gastritis	1. Dysentery (Manandhar, 1985) 2. Stomach disorder (Manandhar, 1989) 3. Diarrhoea, dysentery (Bhattarai, 1990-1992) 4. Abdominal pain, antipyretic (Bhattarai, 1991) 5. Measles (Bhattarai, 1990, 1992c, Manandhar, 1994) 6. Chickens pox, heartburn (Muller-Boker, 1993) 7. Indigestion (Manandhar, 1995) 8. Blood purifier, anorexia, fever, wounds (Siwakoti & Varma, 1996) 9. Dysuria (Kunwar <i>et al.</i> , 2006)
21	Unknown 4	Wp	As cooling agent, gastritis, sprain	
22	Unknown 7	Br	Abdominal disorder, jaundice	

Sf= Sticky fluid; Lf= Leaf; St =Stem; Br = Bark; Tu = Tuber; Se = Seed; Rt = Root; Wp = Whole part; Sa = Shoot apex; Fr= Fruit; Imf= Immature fruit; Fl = Flower; Pu = Pulp

## 5.8 Indigenous Knowledge and Consensus

By analyzing the information obtained from field, a total of 170 plant species were identified to be used to treat 122 ailments (Table 3) and consensus analysis of these 170 plant species was done which was given below-



**Table 3: Usage categories, the number of medicinal plant species used for each specific usage and use report for each specific usage**

S N	Used for	NT	Name of species used	Family	F	UR
1	<b>Animal Problem (ANP) – 3</b>					
	Being fat, Increase weight	1	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	15
		2	<i>Dipsacus inermis</i> Wall.	Dipsacaceae	H	
Hen's sickness	1	<i>Trichosanthes tricuspidata</i> Lour.	Cucurbitaceae	C	1	
2	<b>Circulatory System Disorder (CIR) – 9</b>					
	B.P. high	1	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	6
		2	<i>Curcuma caesia</i> Roxb.	Zingiberaceae	H	
		3	<i>Solanum anguivi</i> Lam.	Solanaceae	S	
	Throat boils	1	<i>Callicarpa macrophylla</i> Vahl	Verbenaceae	S	2
	Throat pain	1	<i>Acorus calamus</i> L.	Araceae	H	10
		2	<i>Blumea hieraciifolia</i> (D. Don) DC.	Compositae	H	
		3	<i>Callicarpa macrophylla</i> Vahl	Verbenaceae	S	
		4	<i>Desmodium concinnum</i> DC	Leguminosae	S	
5		<i>Semecarpus anacardium</i> L.f.	Anacardiaceae	T		
3	<b>Culture-bound syndromes (CUL) – 17</b>					
	Child sickness	1	<i>Acorus calamus</i> L.	Araceae	H	29
		2	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
		3	<i>Centella asiatica</i> (L.) Urb.	Umbelliferae	H	
		4	<i>Ficus racemosa</i> L.	Moraceae	T	
		5	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.	Cucurbitaceae	C	
		6	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
		7	<i>Mimosa pudica</i> L.	Leguminosae	S	
		8	<i>Ocimum basilium</i> L.	Labiatae	H	
		9	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
		10	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
		11	<i>Solanum nigrum</i> L.	Solanaceae	H	
		12	<i>Solanum virginianum</i> L.	Solanaceae	S	
		13	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
		14	<i>Vitex negundo</i> L.	Verbenaceae	T	
	Insomnia	1	<i>Mentha spicata</i> L.	Labiatae	H	7
		2	<i>Mimosa pudica</i> L.	Leguminosae	S	
3		<i>Senna occidentalis</i> (L.) Link	Leguminosae	S		
4	<b>Digestive System Disorder (DIG) – 181</b>					
	Abdominal disorder	1	Unknnonwn 7	Unknnonwn 6	T	1
	Abdominal pain	1	<i>Blumea hieraciifolia</i> (D. Don) DC.	Compositae	H	2
		2	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
	Burning sensation of chilli	1	<i>Abrus precatorius</i> L.	Leguminosae	C	4
		2	<i>Euphorbia hirta</i> L.	Euphorbiaceae	H	
		3	<i>Phyllanthus emblica</i> L.	Euphorbiaceae	T	
	Cholera	1	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	3
	Constipation	1	<i>Musa paradisiaca</i> L.	Musaceae	H	3
		2	<i>Solanum anguivi</i> Lam.	Solanaceae	S	
		3	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
	Dental carries	1	<i>Areca catechu</i> L.	Palmae	T	2
	Diarrhoea	1	<i>Aegle marmelos</i> (L.) Correa	Rutaceae	T	87
		2	<i>Bauhinia variegata</i> L.	Leguminosae	T	
		3	<i>Cannabis sativa</i> L.	Cannabaceae	H	
		4	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	
		5	<i>Cyperus rotundus</i> L.	Cyperaceae	H	
		6	<i>Ficus benghalensis</i> L.	Moraceae	T	
		7	<i>Grewia subinaequalis</i> DC.	Tiliaceae	T	
		8	<i>Lagerstroemia parviflora</i> Roxb.	Lythraceae	T	
		9	<i>Mallotus philippensis</i> (Lam.) Mull.	Euphorbiaceae	T	
		10	<i>Mangifera indica</i> L.	Anacardiaceae	T	
		11	<i>Mentha</i> sp.	Labiatae	H	
12		<i>Musa paradisiaca</i> L.	Musaceae	H		
13		<i>Phoenix loureiri</i> Kunth	Palmae	T		
14		<i>Plumeria rubra</i> L.	Apocynaceae	T		
15		<i>Premna barbata</i> Wall. ex Schauer	Verbenaceae	T		
16		<i>Psidium guajava</i> L.	Myrtaceae	T		
17		<i>Punica granatum</i> L.	Punicaceae	T		
18		<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Apocynaceae	S		
19		<i>Senna occidentalis</i> (L.) Link	Leguminosae	S		
20		<i>Shorea robusta</i> Gaertn.	Dipterocarpaceae	T		

	21	<i>Solanum capsicoides</i> All.	Solanaceae	S	
	22	<i>Syzygium cumini</i> (L.) Skeels	Myrtaceae	T	
	23	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C. Chr.	Dryopteridaceae	H	
	24	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
	25	<i>Viscum album</i> L.	Loranthaceae	S	
	26	<i>Woodfordia fruticosa</i> (L.) Kurz	Lythraceae	S	
	27	<i>Xeromphis uliginosa</i> (Retz.) Maheshw.	Rubiaceae	T	
	28	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
	29	Unknown 1	Leguminosae	C	
Dysentery	1	<i>Bauhinia vahlii</i> Wight & Arn.	Leguminosae	C	79
	2	<i>Cassia fistula</i> L.	Leguminosae	T	
	3	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Myrtaceae	T	
	4	<i>Colocasia esculenta</i> (L.) Schott	Araceae	H	
	5	<i>Euphorbia hirta</i> L.	Euphorbiaceae	H	
	6	<i>Ficus benghalensis</i> L.	Moraceae	T	
	7	<i>Ficus racemosa</i> L.	Moraceae	T	
	8	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.	Moraceae	T	
	9	<i>Hibiscus rosa-sinensis</i> L.	Malvaceae	S	
	10	<i>Lagerstroemia parviflora</i> Roxb.	Lythraceae	T	
	11	<i>Lannea coromandelica</i> (Houtt.) Merr.	Anacardiaceae	T	
	12	<i>Mallotus philippensis</i> (Lam.) Mull.	Euphorbiaceae	T	
	13	<i>Mimosa pudica</i> L.	Leguminosae	S	
	14	<i>Musa paradisiaca</i> L.	Musaceae	H	
	15	<i>Psidium guajava</i> L.	Myrtaceae	T	
	16	<i>Punica granatum</i> L.	Punicaceae	T	
	17	<i>Shorea robusta</i> Gaertn.	Dipterocarpaceae	T	
	18	<i>Syzygium cumini</i> (L.) Skeels	Myrtaceae	T	
	19	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C. Chr.	Dryopteridaceae	H	
	20	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
	21	<i>Woodfordia fruticosa</i> (L.) Kurz	Lythraceae	S	
	22	<i>Zizyphus mauritiana</i> Lam.	Rhamnaceae	T	
	23	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
	24	Unknonwn 1	Leguminosae	C	
	25	Unknonwn 2	Unknonwn 1	T	
Gastritis	1	<i>Acacia catechu</i> (L. f.) Willd.	Leguminosae	T	31
	2	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	3
	3	<i>Aegle marmelos</i> (L.) Correa	Rutaceae	T	
	4	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	
	5	<i>Antidesma bunius</i> (L.) Spreng.	Euphorbiaceae	T	
	6	<i>Artemisia indica</i> Willd.	Compositae	H	
	7	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Moraceae	T	
	8	<i>Asparagus racemosus</i> Willd.	Liliaceae	H	
	9	<i>Bauhinia purpurea</i> L.	Leguminosae	T	
	10	<i>Bauhinia vahlii</i> Wight & Arn.	Leguminosae	C	
	11	<i>Bauhinia variegata</i> L.	Leguminosae	T	
	12	<i>Blumea hieraciifolia</i> (D. Don) DC.	Compositae	H	
	13	<i>Bombax ceiba</i> L.	Bombacaceae	T	
	14	<i>Calamus</i> sp.	Palmae	S	
	15	<i>Carica papaya</i> L.	Caricaceae	T	
	16	<i>Cheilanthes anceps</i> Blanford	Pteridaceae	H	
	17	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	
	18	<i>Cissampelos pareira</i> L.	Menispermaceae	C	
	19	<i>Citrus medica</i> L.	Rutaceae	T	
	20	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Myrtaceae	T	
	21	<i>Colebrookea oppositifolia</i> Sm.	Labiatae	S	
	22	<i>Costus speciosus</i> (J. Konig.) Sm.	Zingiberaceae	H	
	23	<i>Curcuma caesia</i> Roxb.	Zingiberaceae	H	
	24	<i>Cymbopogon citratus</i> (DC.) Stapf.	Gramineae	H	
	25	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	Gramineae	T	
	26	<i>Desmostachya bipinnata</i> (L.) Stapf	Gramineae	H	
	27	<i>Dillenia pentagyna</i> Roxb.	Dilleniaceae	T	
	28	<i>Dipsacus inermis</i> Wall.	Dipsacaceae	H	
	29	<i>Elephantopus scaber</i> L.	Compositae	H	
	30	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	Gramineae	H	
	31	<i>Ficus benjamina</i> L.	Moraceae	T	
	32	<i>Ficus racemosa</i> L.	Moraceae	T	
	33	<i>Ficus religiosa</i> L.	Moraceae	T	
	34	<i>Flemingia macrophylla</i> (Willd.) Merr.	Leguminosae	S	
	35	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.	Cucurbitaceae	C	
	36	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	

	37	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	
	38	<i>Inula cappa</i> (Buch.-Ham. ex D. Don) DC.	Compositae	S	
	39	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	
	40	<i>Lagerstroemia parviflora</i> Roxb.	Lythraceae	T	
	41	<i>Lannea coromandelica</i> (Houtt.) Merr.	Anacardiaceae	T	
	42	<i>Mallotus philippensis</i> (Lam.) Mull.	Euphorbiaceae	T	
	43	<i>Mangifera indica</i> L.	Anacardiaceae	T	
	44	<i>Melia azedarach</i> L.	Meliaceae	T	
	45	<i>Mentha spicata</i> L.	Labiatae	H	
	46	<i>Mimosa pudica</i> L.	Leguminosae	S	
	47	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
	48	<i>Morus macroura</i> Miq.	Moraceae	T	
	49	<i>Mussaenda frondosa</i> L.	Rubiaceae	S	
	50	<i>Nicotiana tobacum</i> L.	Solanaceae	S	
	51	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	
	52	<i>Periploca calophylla</i> (Wight) Falc.	Asclepidaceae	C	
	53	<i>Phoenix loureiri</i> Kunth	Palmae	T	
	54	<i>Phyllanthus emblica</i> L.	Euphorbiaceae	T	
	55	<i>Piper longum</i> L.	Piperaceae	C	
	56	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
	57	<i>Premna barbata</i> Wall. ex Schauer	Verbenaceae	T	
	58	<i>Psidium guajava</i> L.	Myrtaceae	T	
	59	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Apocynaceae	S	
	60	<i>Rubus ellipticus</i> Sm.	Rosaceae	S	
	61	<i>Shorea robusta</i> Gaertn.	Dipterocarpaceae	T	
	62	<i>Smilax ovalifolia</i> Roxb. ex D. Don	Liliaceae	C	
	63	<i>Solanum nigrum</i> L.	Solanaceae	H	
	64	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
	65	<i>Spilanthes calva</i> DC.	Compositae	H	
	66	<i>Spondias pinnata</i> (L. f.) Kurz	Anacardiaceae	T	
	67	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Gentianaceae	H	
	68	<i>Syzygium cumini</i> (L.) Skeels	Myrtaceae	T	
	69	<i>Syzygium</i> sp.	Myrtaceae	T	
	70	<i>Tamarindus indica</i> L.	Leguminosae	T	
	71	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C.Chr.	Dryopteridaceae	H	
	72	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
	73	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Combretaceae	T	
	74	<i>Terminalia chebula</i> Retz.	Combretaceae	T	
	75	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Malvaceae	S	
	76	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Gramineae	H	
	77	<i>Tinospora sinensis</i> (Lour.) Merr.	Menispermaceae	C	
	78	<i>Viscum album</i> L.	Loranthaceae	S	
	79	<i>Vitex negundo</i> L.	Verbenaceae	T	
	80	<i>Zizyphus mauritiana</i> Lam.	Rhamnaceae	T	
	81	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
	82	Unknwon 3	Unknwon 2	H	
	83	Unknwon 4	Unknwon 3	C	
Heart pain	1	<i>Artemisia indica</i> Willd.	Compositae	H	2
	2	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Apocynaceae	S	
Indigestion	1	<i>Elephantopus scaber</i> L.	Compositae	H	5
	2	<i>Psidium guajava</i> L.	Myrtaceae	T	
	3	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
Intestinal obstruction	1	<i>Cassia fistula</i> L.	Leguminosae	T	5
Stomach pain	1	<i>Asparagus racemosus</i> Willd.	Liliaceae	H	10
	2	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
	3	<i>Bauhinia purpurea</i> L.	Leguminosae	T	
	4	<i>Mentha</i> sp.	Labiatae	H	
	5	<i>Mimosa pudica</i> L.	Leguminosae	S	
	6	<i>Phyllanthus emblica</i> L.	Euphorbiaceae	T	
	7	<i>Plumeria rubra</i> L.	Apocynaceae	T	
	8	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C.Chr.	Dryopteridaceae	H	
Toothache	1	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Moraceae	T	43
	2	<i>Carica papaya</i> L.	Caricaceae	T	
	3	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
	4	<i>Ficus benghalensis</i> L.	Moraceae	T	
	5	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
	6	<i>Nicotiana tobacum</i> L.	Solanaceae	S	
	7	<i>Solanum virginianum</i> L.	Solanaceae	S	
	8	<i>Spilanthes calva</i> DC.	Compositae	H	
Tooth strong	1	<i>Ficus benghalensis</i> L.	Moraceae	T	19

	Ulcer	2	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Rubiaceae	S	3
		1	<i>Carica papaya</i> L.	Caricaceae	T	
	2	<i>Rubus ellipticus</i> Sm.	Rosaceae	S		
	Vomiting	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	7
		2	<i>Amaranthus spinosus</i> L.	Amaranthaceae	H	
		3	<i>Senna occidentalis</i> (L.) Link	Leguminosae	S	
		4	<i>Solanum nigrum</i> L.	Solanaceae	H	
5		<i>Solanum virginianum</i> L.	Solanaceae	S		
6	<i>Woodfordia fruticosa</i> (L.) Kurz	Lythraceae	S			
Vomiting with blood	1	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	1	
<b>5</b>	<b>Endocrine System Disorder (END) – 6</b>					
Bile juice problem	1	<i>Solanum anguivi</i> Lam.	Solanaceae	S	1	
Hyperplasia of spleen	1	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	2	
Sugar	1	<i>Justicia adhatoda</i> L.	Acanthaceae	S	4	
	2	<i>Nyctanthes arbor-tristis</i> L.	Oleaceae	T		
	3	<i>Scoparia dulcis</i> L.	Scrophulariaceae	H		
	4	<i>Syzygium cumini</i> (L.) Skeels	Myrtaceae	T		
<b>6</b>	<b>Genitourinary System Disorder (GEN) – 32</b>					
Bleeding (woman)	1	<i>Cissampelos pareira</i> L.	Menispermaceae	C	4	
	2	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C.Chr.	Dryopteridaceae	H		
	3	<i>Flemingia macrophylla</i> (Willd.) Merr.	Leguminosae	S		
Blood impurity in woman	1	<i>Semecarpus anacardium</i> L.f.	Anacardiaceae	T	1	
Flowing out of black blood	1	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	1	
Infertility	1	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	8	
	2	<i>Ficus benghalensis</i> L.	Moraceae	T		
	3	<i>Mucuna pruriens</i> L. DC.	Leguminosae	C		
	4	<i>Rubus ellipticus</i> Sm.	Rosaceae	S		
Lower abdominal pain	1	<i>Cheilanthes anceps</i> Blanford	Pteridaceae	H	9	
	2	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C.Chr.	Dryopteridaceae	H		
Menstruation disorder	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	20	
	2	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S		
	3	<i>Hibiscus rosa-sinensis</i> L.	Malvaceae	S		
	4	<i>Mucuna pruriens</i> L. DC.	Leguminosae	C		
	5	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T		
	6	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C		
7	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Gentianaceae	H			
Red urine	1	<i>Datura metel</i> L.	Solanaceae	H	1	
Retention of urine	1	<i>Abrus precatorius</i> L.	Leguminosae	C	28	
	2	<i>Amaranthus spinosus</i> L.	Amaranthaceae	H		
	3	<i>Amaranthus</i> sp.	Amaranthaceae	H		
	4	<i>Cassia fistula</i> L.	Leguminosae	T		
	5	<i>Cheilanthes anceps</i> Blanford	Pteridaceae	H		
	6	<i>Phoenix loureiri</i> Kunth	Palmae	T		
Sexually active	1	<i>Mucuna pruriens</i> L. DC.	Leguminosae	C	8	
	2	<i>Plumeria rubra</i> L.	Apocynaceae	T		
Syphilis	1	<i>Eclipta prostrata</i> (L.) L.	Compositae	H	2	
Uterus prolapse	1	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	Gramineae	H	2	
	2	<i>Vitex negundo</i> L.	Verbenaceae	T		
Uterus swelling	1	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Rubiaceae	S	2	
White urine	1	<i>Bombax ceiba</i> L.	Bombacaceae	T	1	
<b>7</b>	<b>Infection (INF) – 204</b>					
Cold	1	<i>Acorus calamus</i> L.	Araceae	H	64	
	2	<i>Aegle marmelos</i> (L.) Correa	Rutaceae	T		
	3	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T		
	4	<i>Cannabis sativa</i> L.	Cannabaceae	H		
	5	<i>Cissampelos pareira</i> L.	Menispermaceae	C		
	6	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Myrtaceae	T		
	7	<i>Coffea arabica</i> L.	Rubiaceae	S		
	8	<i>Datura metel</i> L.	Solanaceae	H		
	9	<i>Imperata cylindrica</i> (L.) P. Beauv.	Gramineae	H		
	10	<i>Mentha</i> sp.	Labiatae	H		
	11	<i>Ocimum basilium</i> L.	Labiatae	H		
	12	<i>Ocimum tenuiflorum</i> L.	Labiatae	H		
	13	<i>Phoenix loureiri</i> Kunth	Palmae	T		
	14	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H		
	15	<i>Spilanthes calva</i> DC.	Compositae	H		
Cooling agent	1	<i>Abrus precatorius</i> L.	Leguminosae	C	38	
	2	<i>Acacia catechu</i> (L. f.) Willd.	Leguminosae	T		
	3	<i>Aegle marmelos</i> (L.) Correa	Rutaceae	T		
	4	<i>Aloe vera</i> (L.) Burm. f.	Liliaceae	H		

	5	<i>Amaranthus spinosus</i> L.	Amaranthaceae	H	
	6	<i>Ananas comosus</i> (L.) Merr.	Bromeliaceae	H	
	7	<i>Annona squamata</i> L.	Annonaceae	T	
	8	<i>Artemisia indica</i> Willd.	Compositae	H	
	9	<i>Asparagus racemosus</i> Willd.	Liliaceae	H	
	10	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
	11	<i>Blumea lacera</i> (Burm. f.) DC.	Compositae	H	
	12	<i>Bombax ceiba</i> L.	Bombacaceae	T	
	13	<i>Calamus</i> sp.	Palmae	S	
	14	<i>Callicarpa macrophylla</i> Vahl	Verbenaceae	S	
	15	<i>Carica papaya</i> L.	Caricaceae	T	
	16	<i>Cassia fistula</i> L.	Leguminosae	T	
	17	<i>Centella asiatica</i> (L.) Urb.	Umbelliferae	H	
	18	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	
	19	<i>Citrus aurantifolia</i> (Christ.) Swingle	Rutaceae	T	
	20	<i>Citrus limon</i> (L.) Burn. f.	Rutaceae	T	
	21	<i>Citrus maxima</i> (Burm.) Merrill	Rutaceae	T	
	22	<i>Cocos nucifera</i> L.	Palmae	T	
	23	<i>Costus speciosus</i> (J. Konig.) Sm.	Zingiberaceae	H	
	24	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	
	25	<i>Cyperus rotundus</i> L.	Cyperaceae	H	
	26	<i>Desmostachya bipinnata</i> (L.) Stapf	Gramineae	H	
	27	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
	28	<i>Ficus racemosa</i> L.	Moraceae	T	
	29	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.	Moraceae	T	
	30	<i>Hibiscus rosa-sinensis</i> L.	Malvaceae	S	
	31	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
	32	<i>Lawsonia inermis</i> L.	Lythraceae	S	
	33	<i>Mangifera indica</i> L.	Anacardiaceae	T	
	34	<i>Maoutia puya</i> (Hook.) Wedd.	Urticaceae	S	
	35	<i>Maoutia puya</i> (Hook.) Wedd.	Urticaceae	S	
	36	<i>Mentha</i> sp.	Labiatae	H	
	37	<i>Mentha spicata</i> L.	Labiatae	H	
	38	<i>Mimosa pudica</i> L.	Leguminosae	S	
	39	<i>Moringa oleifera</i> Lam.	Moringaceae	T	
	40	<i>Musa paradisiaca</i> L.	Musaceae	H	
	41	<i>Ocimum basilium</i> L.	Labiatae	H	
	42	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
	43	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
	44	<i>Persea odoratissima</i> (Nees) Kosterm.	Lauraceae	T	
	45	<i>Phoenix loureiri</i> Kunth	Palmae	T	
	46	<i>Premna barbata</i> Wall. ex Schauer	Verbenaceae	T	
	47	<i>Pyrus communis</i> L.	Rosaceae	T	
	48	<i>Saccharum officinarum</i> L.	Gramineae	H	
	49	<i>Scoparia dulcis</i> L.	Scrophulariaceae	H	
	50	<i>Senna occidentalis</i> (L.) Link	Leguminosae	S	
	51	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
	52	<i>Solanum anguivi</i> Lam.	Solanaceae	S	
	53	<i>Solanum nigrum</i> L.	Solanaceae	H	
	54	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
	55	<i>Tamarindus indica</i> L.	Leguminosae	T	
	56	<i>Tinospora sinensis</i> (Lour.) Merr.	Menispermaceae	C	
	57	<i>Xerompis spinosa</i> (Thunb.) Keay	Rubiaceae	S	
	58	<i>Zizyphus mauritiana</i> Lam.	Rhamnaceae	T	
	59	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
	60	Unknonwn 4	Unknonwn 3	C	
Dandruff	1	<i>Lawsonia inermis</i> L.	Lythraceae	S	3
Diphtheria	1	<i>Dioscorea bulbifera</i> L.	Dioscoreaceae	C	2
Fever	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	10
	2	<i>Ananas comosus</i> (L.) Merr.	Bromeliaceae	H	6
	3	<i>Antidesma bunius</i> (L.) Spreng.	Euphorbiaceae	T	
	4	<i>Artemisia indica</i> Willd.	Compositae	H	
	5	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
	6	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
	7	<i>Callicarpa macrophylla</i> Vahl	Verbenaceae	S	
	8	<i>Cheilanthes anceps</i> Blanford	Pteridaceae	H	
	9	<i>Cissampelos pareira</i> L.	Menispermaceae	C	
	10	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	
	11	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	Gramineae	T	
	12	<i>Elephantopus scaber</i> L.	Compositae	H	

		13	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	
		14	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	
		15	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
		16	<i>Mallotus philippensis</i> (Lam.) Mull.	Euphorbiaceae	T	
		17	<i>Mentha</i> sp.	Labiatae	H	
		18	<i>Mimosa pudica</i> L.	Leguminosae	S	
		19	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
		20	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
		21	<i>Persea odoratissima</i> (Nees) Kosterm.	Lauraceae	T	
		22	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
		23	<i>Psidium guajava</i> L.	Myrtaceae	T	
		24	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Apocynaceae	S	
		25	<i>Rubus ellipticus</i> Sm.	Rosaceae	S	
		26	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
		27	<i>Solanum anguivi</i> Lam.	Solanaceae	S	
		28	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Gentianaceae	H	
		29	<i>Tamarindus indica</i> L.	Leguminosae	T	
		30	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Malvaceae	S	
		31	<i>Trichosanthes tricuspidata</i> Lour.	Cucurbitaceae	C	
		32	Unknnonwn 6	Unknnonwn 5	T	
Gingivitis		1	<i>Ficus benghalensis</i> L.	Moraceae	T	14
		2	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		3	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
Gonorrhoea		1	<i>Abrus precatorius</i> L.	Leguminosae	C	47
		2	<i>Amaranthus spinosus</i> L.	Amaranthaceae	H	
		3	<i>Amarathus</i> sp.	Amaranthaceae	H	
		4	<i>Bombax ceiba</i> L.	Bombacaceae	T	
		5	<i>Cocos nucifera</i> L.	Palmae	T	
		6	<i>Maoutia puya</i> (Hook.) Wedd.		S	
		7	<i>Melia azedarach</i> L.	Meliaceae	T	
		8	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Rubiaceae	S	
		9	<i>Nephrolepis auriculata</i> (L.) Trimen	Nephrolepidaceae	H	
		10	<i>Phoenix loureiri</i> Kunth	Palmae	T	
		11	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Malvaceae	S	
		12	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Gramineae	H	
		13	<i>Vitex negundo</i> L.	Verbenaceae	T	
Growth of gangrene		1	<i>Prunus persica</i> (L.) Batsch	Rosaceae	C	18
Hot and cold		1	<i>Calamus</i> sp.	Palmae	S	4
		2	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
Inner hurts		1	<i>Acacia catechu</i> (L. f.) Willd.	Leguminosae	T	1
Jaundice		1	<i>Carica papaya</i> L.	Caricaceae	T	63
		2	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	
		3	<i>Ficus racemosa</i> L.	Moraceae	T	
		4	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.	Moraceae	T	
		5	<i>Lawsonia inermis</i> L.	Lythraceae	S	
		6	<i>Mangifera indica</i> L.	Anacardiaceae	T	
		7	<i>Saccharum officinarum</i> L.	Gramineae	H	
		8	Unknnonwn 7	Unknnonwn 6	T	
Malaria		1	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	2
		2	<i>Xerompis spinosa</i> (Thunb.) Keay	Rubiaceae	S	
Measles		1	<i>Zizyphus mauritiana</i> Lam.	Rhamnaceae	T	22
		2	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
Mud wound		1	<i>Begonia picta</i> Sm.	Begoniaceae	H	55
		2	<i>Cassia fistula</i> L.	Leguminosae	T	
		3	<i>Catunaregam uliginosa</i> (Retzius) V.V Sivarajan.	Rubiaceae	T	
		4	<i>Citrus aurantifolia</i> (Christ.) Swingle	Rutaceae	T	
		5	<i>Citrus limon</i> (L.) Burn. f.	Rutaceae	T	
		6	<i>Eclipta prostrata</i> (L.) L.	Compositae	H	
		7	<i>Imperata cylindrica</i> (L.) P. Beauv.	Gramineae	H	
		8	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		9	<i>Lawsonia inermis</i> L.	Lythraceae	S	
		10	<i>Mussaenda frondosa</i> L.	Rubiaceae	S	
		11	<i>Punica granatum</i> L.	Punicaceae	T	
		12	<i>Spondias pinnata</i> (L. f.) Kurz	Anacardiaceae	T	
Mumps		1	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Moraceae	T	5
		2	<i>Cascabela thevetia</i> (L.) Lippold	Apocynaceae	T	
Swelling		1	<i>Amaranthus spinosus</i> L.	Amaranthaceae	H	17
		2	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Moraceae	T	
		3	<i>Cannabis sativa</i> L.	Cannabaceae	H	
		4	<i>Costus speciosus</i> (J. Konig.) Sm.	Zingiberaceae	H	

		5	<i>Datura metel</i> L.	Solanaceae	H	
		6	<i>Desmostachya bipinnata</i> (L.) Stapf	Gramineae	H	
		7	<i>Ficus hispida</i> L.f.	Moraceae	T	
		8	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
		9	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	
		10	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Gramineae	H	
	Tapeworm	1	<i>Mallotus philippensis</i> (Lam.) Mull.	Euphorbiaceae	T	1
	Tetanus	1	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	5
		2	<i>Sida cordifolia</i> L.	Malvaceae	S	
	Typhoid	1	<i>Antidesma bunius</i> (L.) Spreng.	Euphorbiaceae	T	45
		2	<i>Areca catechu</i> L.	Palmae	T	
		3	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
		4	<i>Bauhinia vahlii</i> Wight & Arn.	Leguminosae	C	
		5	<i>Callicarpa macrophylla</i> Vahl	Verbenaceae	S	
		6	<i>Eclipta prostrata</i> (L.) L.	Compositae	H	
		7	<i>Hibiscus rosa-sinensis</i> L.	Malvaceae	S	
		8	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	
		9	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
		10	<i>Ocimum basilium</i> L.	Labiatae	H	
		11	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
		12	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	
		13	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
		14	<i>Sida cordifolia</i> L.	Malvaceae	S	
		15	<i>Solanum virginianum</i> L.	Solanaceae	S	
		16	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Gramineae	H	
		17	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
		18	Unknonwn 1	Leguminosae	C	
	Worm infestation	1	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	85
		2	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
		3	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	
		4	<i>Datura metel</i> L.	Solanaceae	H	
		5	<i>Desmostachya bipinnata</i> (L.) Stapf	Gramineae	H	
		6	<i>Dioscorea bulbifera</i> L.	Dioscoreaceae	C	
		7	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam	Sapotaceae	T	
		8	<i>Elephantopus scaber</i> L.	Compositae	H	
		9	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
		10	<i>Ficus hispida</i> L.f.	Moraceae	T	
		11	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	
		12	<i>Imperata cylindrica</i> (L.) P. Beauv.	Gramineae	H	
		13	<i>Melia azedarach</i> L.	Meliaceae	T	
		14	<i>Morus macroura</i> Miq.	Moraceae	T	
		15	<i>Nicotiana tobacum</i> L.	Solanaceae	S	
		16	<i>Psidium guajava</i> L.	Myrtaceae	T	
		17	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Gentianaceae	H	
		18	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
8	<b>Injuries (INJ) – 41</b>					
	Burns	1	<i>Aloe vera</i> (L.) Burm. f.	Liliaceae	H	37
		2	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
		3	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam	Sapotaceae	T	
		4	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		5	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
		6	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C. Chr.	Dryopteridaceae	H	
		7	Unknonwn 3	Unknonwn 2	H	
	Cuts	1	<i>Acacia catechu</i> (L. f.) Willd.	Leguminosae	T	30
		2	<i>Artemisia indica</i> Willd.	Compositae	H	
		3	<i>Calotropis gigantea</i> (L.) Dryand.	Asclepiadaceae	S	
		4	<i>Citrus maxima</i> (Burm.) Merrill	Rutaceae	T	
		5	<i>Eclipta prostrata</i> (L.) L.	Compositae	H	
		6	<i>Euphorbia hirta</i> L.	Euphorbiaceae	H	
		7	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		8	<i>Lansea coromandelica</i> (Houtt.) Merr.	Anacardiaceae	T	
		9	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
		10	<i>Tridax procumbens</i> L.	Compositae	H	
	Wound	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	69
		2	<i>Areca catechu</i> L.	Palmae	T	
		3	<i>Artemisia indica</i> Willd.	Compositae	H	
		4	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Moraceae	T	
		5	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
		6	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
		7	<i>Bauhinia vahlii</i> Wight & Arn.	Leguminosae	C	

		8	<i>Calotropis gigantea</i> (L.) Dryand.	Asclepiadaceae	S	
		9	<i>Cheilanthes anceps</i> Blanford	Pteridaceae	H	
		10	<i>Cissus repens</i> Lam.	Vitaceae	C	
		11	<i>Curcuma caesia</i> Roxb.	Zingiberaceae	H	
		12	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	
		13	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	Gramineae	T	
		14	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam	Sapotaceae	T	
		15	<i>Eclipta prostrata</i> (L.) L.	Compositae	H	
		16	<i>Euphorbia hirta</i> L.	Euphorbiaceae	H	
		17	<i>Ficus benghalensis</i> L.	Moraceae	T	
		18	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
		19	<i>Plumeria rubra</i> L.	Apocynaceae	T	
		20	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Apocynaceae	S	
		21	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
		22	<i>Semecarpus anacardium</i> L.f.	Anacardiaceae	T	
		23	<i>Terminalia alata</i> Heyne ex Roth	Combretaceae	T	
		24	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Malvaceae	S	
<b>9</b>	<b>Mental Disorder (MEN) – 1</b>					
	Mental disorder	1	<i>Solanum nigrum</i> L.	Solanaceae	H	1
<b>10</b>	<b>Metabolic System Disorder (MET) – 1</b>					
	Bad smelling of child	1	<i>Mangifera indica</i> L.	Anacardiaceae	T	1
<b>11</b>	<b>Muscular-Skeletal System Disorder (MUS) – 38</b>					
	Arthritis	1	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	5
		2	<i>Ocimum basilium</i> L.	Labiatae	H	
		3	Unknonwn 5	Unknonwn 4	S	
	Back bone pain	1	<i>Cocos nucifera</i> L.	Palmae	T	8
		2	<i>Ficus benghalensis</i> L.	Moraceae	T	
		3	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		4	<i>Periploca calophyllia</i> (Wight) Falc.	Asclepidaceae	C	
		5	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
		6	<i>Viscum album</i> L.	Loranthaceae	S	
	Body pain	1	<i>Acorus calamus</i> L.	Araceae	H	4
		2	<i>Citrus medica</i> L.	Rutaceae	T	
		3	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
		4	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
	Fracture	1	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	31
		2	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
		3	<i>Periploca calophyllia</i> (Wight) Falc.	Asclepidaceae	C	
		4	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
		5	<i>Viscum album</i> L.	Loranthaceae	S	
	Joint pain	1	<i>Imperata cylindrica</i> (L.) P. Beauv.	Gramineae	H	2
		2	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
	Lame	1	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	1
	Sprain	1	<i>Acacia catechu</i> (L. f.) Willd.	Leguminosae	T	88
		2	<i>Amaranthus spinosus</i> L.	Amaranthaceae	H	
		3	<i>Calotropis gigantea</i> (L.) Dryand.	Asclepiadaceae	S	
		4	<i>Citrus limon</i> (L.) Burm. f.	Rutaceae	T	
		5	<i>Curcuma caesia</i> Roxb.	Zingiberaceae	H	
		6	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
		7	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		8	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	
		9	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
		10	<i>Periploca calophyllia</i> (Wight) Falc.	Asclepidaceae	C	
		11	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
		12	<i>Viscum album</i> L.	Loranthaceae	S	
		13	Unknonwn 4	Unknonwn 3	C	
	Waist pain	1	<i>Artemisia indica</i> Willd.	Compositae	H	4
		2	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	
		3	<i>Viscum album</i> L.	Loranthaceae	S	
		4	Unknonwn 1	Leguminosae	C	
<b>12</b>	<b>Nervous System Disorder (NER) – 25</b>					
	Epilepsy	1	<i>Solanum nigrum</i> L.	Solanaceae	H	1
	Headache	1	<i>Aegle marmelos</i> (L.) Correa	Rutaceae	T	76
		2	<i>Aloe vera</i> (L.) Burm. f.	Liliaceae	H	
		3	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
		4	<i>Centella asiatica</i> (L.) Urb.	Umbelliferae	H	
		5	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Liliaceae	H	
		6	<i>Citrus aurantifolia</i> (Christ.) Swingle	Rutaceae	T	
		7	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Myrtaceae	T	
		8	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	



		9	<i>Lawsonia inermis</i> L.	Lythraceae	S	
		10	<i>Mentha</i> sp.	Labiatae	H	
		11	<i>Musa paradisiaca</i> L.	Musaceae	H	
		12	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	
		13	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
		14	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
		15	<i>Psidium guajava</i> L.	Myrtaceae	T	
		16	<i>Solanum anguivi</i> Lam.	Solanaceae	S	
		17	<i>Vitex negundo</i> L.	Verbenaceae	T	
		18	<i>Zizyphus mauritiana</i> Lam.	Rhamnaceae	T	
		19	Unknonwn 3	Unknonwn 2	H	
	Migraine	1	<i>Syzygium</i> sp.	Myrtaceae	T	1
	Psycho disorder	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	8
		2	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
		3	<i>Trichosanthes tricuspidata</i> Lour.	Cucurbitaceae	C	
		4	<i>Vitex negundo</i> L.	Verbenaceae	T	
<b>13</b>	<b>Nutritional Disorder (NUT) – 44</b>					
	Anorexia	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	96
		2	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	
		3	<i>Artemisia indica</i> Willd.	Compositae	H	
		4	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
		5	<i>Blumea hieraciifolia</i> (D. Don) DC.	Compositae	H	
		6	<i>Citrus aurantifolia</i> (Christ.) Swingle	Rutaceae	T	
		7	<i>Citrus limon</i> (L.) Burn. f.	Rutaceae	T	
		8	<i>Curcuma caesia</i> Roxb.	Zingiberaceae	H	
		9	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	
		10	<i>Datura metel</i> L.	Solanaceae	H	
		11	<i>Dipsacus inermis</i> Wall.	Dipsacaceae	H	
		12	<i>Elephantopus scaber</i> L.	Compositae	H	
		13	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
		14	<i>Flemingia macrophylla</i> (Willd.) Merr.	Leguminosae	S	
		15	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	
		16	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		17	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
		18	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	
		19	<i>Mimosa pudica</i> L.	Leguminosae	S	
		20	<i>Musa paradisiaca</i> L.	Musaceae	H	
		21	<i>Persicaria barbata</i> (L.) Hara	Polygonaceae	H	
		22	<i>Plumeria rubra</i> L.	Apocynaceae	T	
		23	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
		24	<i>Senna occidentalis</i> (L.) Link	Leguminosae	S	
		25	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
		26	<i>Tridax procumbens</i> L.	Compositae	H	
		27	<i>Vitex negundo</i> L.	Verbenaceae	T	
		28	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
		29	Unknonwn 3	Unknonwn 2	H	
	Dizziness	1	<i>Kaempferia rotunda</i> L.	Zingiberaceae	H	2
		2	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
	Increase energy	1	<i>Acacia pennata</i> (L.) Willd.	Leguminosae	C	6
		2	<i>Curculigo orchioides</i> Gaertn.	Hypoxidaceae	H	
		3	<i>Punica granatum</i> L.	Punicaceae	T	
	Marasmus	1	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	7
		2	<i>Dipsacus inermis</i> Wall.	Dipsacaceae	H	
		3	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
		4	<i>Smilax ovalifolia</i> Roxb. ex D. Don	Liliaceae	C	
		5	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
	Weakness	1	<i>Ananas comosus</i> (L.) Merr.	Bromeliaceae	H	8
		2	<i>Bauhinia scandens</i> var. <i>horsfieldii</i> (Miq.) H. Ohashi	Leguminosae	C	
		3	<i>Cyperus rotundus</i> L.	Cyperaceae	H	
		4	<i>Smilax ovalifolia</i> Roxb. ex D. Don	Liliaceae	C	
		5	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Malvaceae	S	
<b>14</b>	<b>Poisoning Disorder (POD) – 7</b>					
	Dog bite	1	Unknonwn 3	Unknonwn 2	H	3
	Snake bite	1	<i>Euphorbia hirta</i> L.	Euphorbiaceae	H	14
		2	<i>Nicotiana tobacum</i> L.	Solanaceae	S	
		3	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
		4	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
		5	Unknonwn 3	Unknonwn 2	H	
	Scorpio bite	1	Unknonwn 3	Unknonwn 2	H	2

15 Poisons (POI) – 13					
Fish poisoning	1	<i>Colebrookea oppositifolia</i> Sm.	Labiatae	S	83
	2	<i>Desmodium concinnum</i> DC.	Leguminosae	S	
	3	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam	Sapotaceae	T	
	4	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Apocynaceae	T	
	5	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
	6	<i>Mucuna pruriens</i> L. DC.	Leguminosae	C	
	7	<i>Persicaria barbata</i> (L.) Hara	Polygonaceae	H	
	8	<i>Syzygium cumini</i> (L.) Skeels	Myrtaceae	T	
	9	<i>Syzygium</i> sp.	Myrtaceae	T	
	10	<i>Xerompis spinosa</i> (Thunb.) Keay	Rubiaceae	S	
	11	Unknnonwn 5	Unknnonwn 4	S	
Insectide	1	<i>Artemisia indica</i> Willd.	Compositae	H	8
	2	<i>Nicotiana tobacum</i> L.	Solanaceae	S	
16 Pregnancy / Birth / Puerperium Disorder (PRE) – 17					
Abortion	1	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	12
	2	<i>Anthocephalus chinensis</i> (Lam.) A. Rich. ex Walp.	Rubiaceae	T	
Breast engorged	1	<i>Asparagus racemosus</i> Willd.	Liliaceae	H	17
	2	<i>Mussaenda frondosa</i> L.	Rubiaceae	S	
	3	<i>Premna barbata</i> Wall. ex Schauer	Verbenaceae	T	
	4	<i>Sida cordifolia</i> L.	Malvaceae	S	
	5	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
	6	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Malvaceae	S	
	7	<i>Trichosanthes tricuspidata</i> Lour.	Cucurbitaceae	C	
Production of more milk	1	<i>Asparagus racemosus</i> Willd.	Liliaceae	H	16
	2	<i>Tinospora sinensis</i> (Lour.) Merr.	Menispermaceae	C	
Retention of placenta	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	16
	2	<i>Elephantopus scaber</i> L.	Compositae	H	
	3	<i>Ficus hispida</i> L.f.	Moraceae	T	
	4	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.	Moraceae	T	
	5	<i>Saccharum officinarum</i> L.	Gramineae	H	
	6	<i>Trichosanthes tricuspidata</i> Lour.	Cucurbitaceae	C	
17 Respiratory System Disorder (RES) – 66					
Asthma	1	<i>Artemisia indica</i> Willd.	Compositae	H	16
	2	<i>Boerhavia diffusa</i> L.	Nyctaginaceae	H	
	3	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	Gramineae	H	
	4	<i>Ficus racemosa</i> L.	Moraceae	T	
	5	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	
	6	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
	7	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	
	8	<i>Piper longum</i> L.	Piperaceae	C	
	9	<i>Vitex negundo</i> L.	Verbenaceae	T	
Chest pain	1	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	7
	2	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
Coryza	1	<i>Calotropis gigantea</i> (L.) Dryand.	Asclepiadaceae	S	52
	2	<i>Cheilanthes anceps</i> Blanford	Pteridaceae	H	
	3	<i>Citrus medica</i> L.	Rutaceae	T	
	4	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Myrtaceae	T	
	5	<i>Colebrookea oppositifolia</i> Sm.	Labiatae	S	
	6	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	Gramineae	H	
	7	<i>Psidium guajava</i> L.	Myrtaceae	T	
	8	<i>Spondias pinnata</i> (L. f.) Kurz	Anacardiaceae	T	
	9	<i>Syzygium</i> sp.	Myrtaceae	T	
	10	<i>Vitex negundo</i> L.	Verbenaceae	T	
Cough	1	<i>Acacia catechu</i> (L. f.) Willd.	Leguminosae	T	12
	2	<i>Acorus calamus</i> L.	Araceae	H	
	3	<i>Aegle marmelos</i> (L.) Correa	Rutaceae	T	
	4	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
	5	<i>Boerhavia diffusa</i> L.	Nyctaginaceae	H	
	6	<i>Cissampelos pareira</i> L.	Menispermaceae	C	
	7	<i>Citrus aurantifolia</i> (Christ.) Swingle	Rutaceae	T	4
	8	<i>Citrus limon</i> (L.) Burn. f.	Rutaceae	T	
	9	<i>Coffea arabica</i> L.	Rubiaceae	S	
	10	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
	11	<i>Mentha</i> sp.	Labiatae	H	
	12	<i>Ocimum basilium</i> L.	Labiatae	H	
	13	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
	14	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	
	15	<i>Phyllanthus emblica</i> L.	Euphorbiaceae	T	

		16	<i>Piper betle</i> L.	Piperaceae	C	
		17	<i>Piper longum</i> L.	Piperaceae	C	
		18	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
		19	<i>Senna occidentalis</i> (L.) Link	Leguminosae	S	
		20	<i>Senna tora</i> (L.) Roxb.	Leguminosae	S	
		21	<i>Shorea robusta</i> Gaertn.	Dipterocarpaceae	T	
		22	<i>Spilanthes calva</i> DC.	Compositae	H	
		23	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Combretaceae	T	
		24	<i>Terminalia chebula</i> Retz.	Combretaceae	T	
		25	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Rhamnaceae	S	
	Pneumonia	1	<i>Acorus calamus</i> L.	Araceae	H	35
		2	<i>Baccharoides anthelmintica</i> (L.) Moench.	Compositae	H	
		3	<i>Curculigo orchioides</i> Gaertn.	Hypoxidaceae	H	
		4	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	Gramineae	T	
		5	<i>Eclipta prostrata</i> (L.) L.	Compositae	H	
		6	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Leguminosae	S	
		7	<i>Inula cappa</i> (Buch.-Ham. ex D. Don) DC.	Compositae	S	
		8	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		9	<i>Justicia adhatoda</i> L.	Acanthaceae	S	
		10	<i>Mentha</i> sp.	Labiatae	H	
		11	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
		12	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
		13	<i>Psidium guajava</i> L.	Myrtaceae	T	
		14	<i>Rubus ellipticus</i> Sm.	Rosaceae	S	
		15	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Cucurbitaceae	C	
		16	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Gramineae	H	
	Running nose	1	<i>Citrus aurantifolia</i> (Christ.) Swingle	Rutaceae	T	7
		2	<i>Citrus limon</i> (L.) Burn. f.	Rutaceae	T	
		3	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Myrtaceae	T	
		4	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Labiatae	H	
18	<b>Sensory System Disorder (SEN) – 21</b>					
	Cataract	1	<i>Colebrookea oppositifolia</i> Sm.	Labiatae	S	22
		2	<i>Euphorbia hirta</i> L.	Euphorbiaceae	H	
		3	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
		4	<i>Vitex negundo</i> L.	Verbenaceae	T	
	Conjunctivitis	1	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	8
		2	<i>Desmostachya bipinnata</i> (L.) Stapf	Gramineae	H	
		3	<i>Oxalis corniculata</i> L.	Oxalidaceae	H	
	Eye defect	1	<i>Abrus precatorius</i> L.	Leguminosae	C	6
		2	<i>Boerhavia diffusa</i> L.	Nyctaginaceae	H	
		3	<i>Mussaenda frondosa</i> L.	Rubiaceae	S	
	Night blindness	1	<i>Mimosa pudica</i> L.	Leguminosae	S	1
	Otitismedia	1	<i>Ficus hispida</i> L.f.	Moraceae	T	4
		2	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	
		3	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
	Preliminary deafness	1	<i>Ficus religiosa</i> L.	Moraceae	T	1
	Pterygium	1	<i>Ficus benghalensis</i> L.	Moraceae	T	4
	Stomatitis	1	<i>Callicarpa macrophylla</i> Vahl	Verbenaceae	S	16
		2	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	
		3	<i>Ocimum tenuiflorum</i> L.	Labiatae	H	
		4	<i>Tridax procumbens</i> L.	Compositae	H	
	Whitening of tongue	1	<i>Jatropha curcus</i> L.	Euphorbiaceae	T	1
19	<b>Skin / Subcutaneous Cellular Tissue Disorder (SKI) – 38</b>					
	Allergy	1	<i>Catunaregam uliginosa</i> (Retzius) V.V Sivarajan.	Rubiaceae	T	6
		2	<i>Ocimum basilium</i> L.	Labiatae	H	
		3	<i>Semecarpus anacardium</i> L.f.	Anacardiaceae	T	
		4	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Combretaceae	T	
	Bald pattern	1	<i>Semecarpus anacardium</i> L.f.	Anacardiaceae	T	1
	Black dandruff on face	1	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	1
	Boils	1	<i>Achyranthes bidentata</i> Blume	Amaranthaceae	H	59
		2	<i>Alstonia scholaris</i> (L.) R. Br.	Apocynaceae	T	
		3	<i>Artemisia indica</i> Willd.	Compositae	H	
		4	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Moraceae	T	
		5	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	
		6	<i>Bauhinia vahlii</i> Wight & Arn.	Leguminosae	C	
		7	<i>Calotropis gigantea</i> (L.) Dryand.	Asclepiadaceae	S	
		8	<i>Cascabela thevetia</i> (L.) Lippold	Apocynaceae	T	
		9	<i>Colebrookea oppositifolia</i> Sm.	Labiatae	S	
		10	<i>Colocasia esculenta</i> (L.) Schott	Araceae	H	
		11	<i>Euphorbia royleana</i> Boiss.	Euphorbiaceae	S	

	12	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Leguminosae	T	
	13	<i>Ricinus communis</i> L.	Euphorbiaceae	S	
	14	<i>Sida cordifolia</i> L.	Malvaceae	S	
	15	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Gentianaceae	H	
	16	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Gramineae	H	
	17	Unknonwn 2	Unknonwn 1	T	
Foot crack	1	<i>Ricinus communis</i> L.	Euphorbiaceae	S	13
	2	<i>Semecarpus anacardium</i> L.f.	Anacardiaceae	T	
Harphzoster	1	<i>Lygodium flexuosum</i> (L.) SW.	Schizaeaceae	C	9
Leprosy	1	<i>Azadirachta indica</i> A. Juss.	Meliaceae	T	2
Ring worm	1	<i>Areca catechu</i> L.	Palmae	T	31
	2	<i>Carica papaya</i> L.	Caricaceae	T	
	3	<i>Cassia fistula</i> L.	Leguminosae	T	
	4	<i>Caesalpinia decapetala</i> (Roth) Alston	Leguminosae	S	
	5	<i>Musa paradisiaca</i> L.	Musaceae	H	
Scabies	1	<i>Lyonia ovalifolia</i> (Wallich.) Drude	Ericaceae	S	15
	2	<i>Artemisia indica</i> Willd.	Compositae	H	
Skin disease	1	<i>Cuscuta reflexa</i> Roxb.	Convolvulaceae	C	3
	2	<i>Phyllanthus emblica</i> L.	Euphorbiaceae	T	
Tumour formation	1	<i>Ficus religiosa</i> L.	Moraceae	T	11
	2	<i>Oroxylum indicum</i> (L.) Kurz	Bignoniaceae	T	

\*NT = Number of taxa; \*\*F = Form; \*\*\*UR = Use report

Ailments that were reported for 170 medicinal plants were categorized into 19 usage categories (Table 3). Different disease/disorders observed in the study area were categorized on the basis of work carried out by Cook (1995) who categorized ailments studied into 17 usage categories. Two additional usage categories were added which were not mentioned by Cook (1995) in his usage category. The number of mentions in each disease and the number of taxa used in each disease was collected, but there was overlapping of many common species used in several mention of usage category. By using the number of taxa and use report, “Informant Consensus Factor” ( $F_{ic}$ ) was calculated.

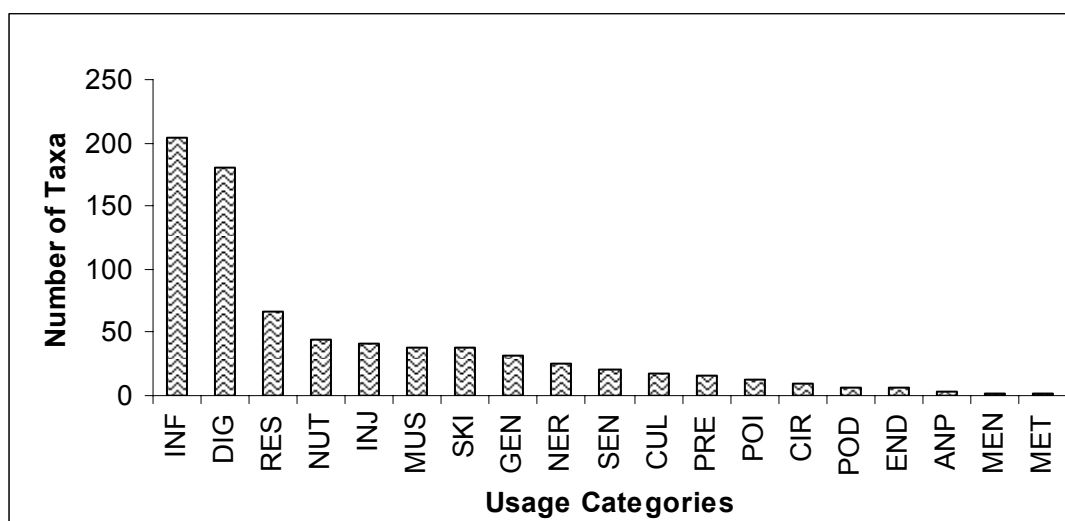


Fig. 14: Distribution of medicinal plant species among the 19 usage category

Number of medicinal plant used for each usage category is given in figure 14. In this study, the usage category “Infection” (INF) was found to have high number of taxa which include 204 taxa which was followed by “Digestive System Disorder” (181 taxa), “Respiratory System Disorder” (66 taxa), “Nutritional Disorder” (44 taxa), “Injuries” (41 taxa), “Muscular-Skeletal System Disorder” (38 taxa), “Skin/Subcutaneous Cellular Tissue Disorder” (38 taxa), “Genitourinary System Disorder” (32 taxa), “Nervous System Disorder” (25 taxa), “Sensory System Disorder” (21 taxa), “Culture-bound Syndromes” (17 taxa), “Pregnancy/Birth/Puerperium Disorder” (16 taxa), “Poisons” (13 taxa), “Circulatory System Disorder” (9 taxa), “Poisoning Disorder” (7 taxa), “Endocrine System Disorder” (6 taxa), “Animal Problem” (3 taxa), “Mental Disorder” (1 taxa) and “Metabolic System Disorder” (1 taxa).

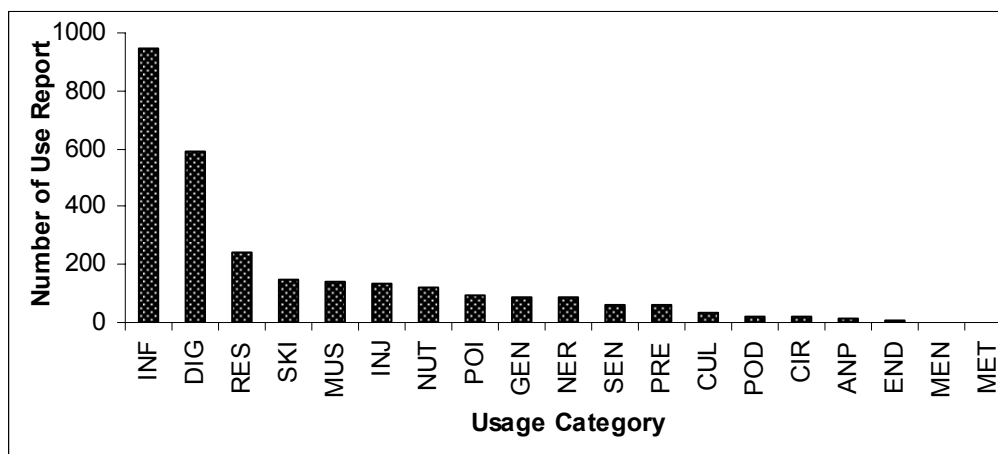


Fig. 15: Use report among 19 usage category

Total number of use report in each usage category is presented in figure 15. In this study it was observed that the “Infection” has highest number of use report i.e. 946 which was followed by “Digestive System Disorder” (589), “Respiratory System Disorder” (241), “Skin/Subcutaneous Cellular Tissue Disorder” (151), “Muscular-Skeletal System Disorder” (143), “Injuries” (136), “Nutritional Disorder” (119), “Poison” (91), “Genitourinary System Disorder” (87), “Nervous System Disorder” (86), “Sensory System Disorder” (63), “Pregnancy/Birth/Puerperium Disorder” (61), “Culture-bound Syndrome” (36), “Poisoning Disorder” (19), “Circulatory System Disorder” (18), “Animal Problem” (16), “Endocrine System Disorder” (7), “Mental Disorder” (1) and “Metabolic System Disorder” (1).

Informant’s consensus factor ( $F_{ic}$ ) was calculated using number of taxa and number of use report (Table 4) as given by Trotter and Logon (1986).

**Table 4: Informants consensus factor ( $F_{ic}$ ) for each usage category**

S. No.	Usage category	No. of Taxa	No. of Use report	$F_{ic}$
1	Animal Problem (ANP)	3	16	0.87
2	Poisons (POI)	13	91	0.87
3	Infection (INF)	204	946	0.79
4	Skin / Subcutaneous Cellular Tissue Disorder (SKI)	38	151	0.75
5	Pregnancy / Birth / Puerperium Disorder (PRE)	16	61	0.75
6	Muscular-Skeletal System Disorder (MUS)	38	143	0.74
7	Respiratory System Disorder (RES)	66	241	0.73
8	Nervous System Disorder (NER)	25	86	0.72
9	Injuries (INJ)	41	136	0.70
10	Digestive System Disorder (DIG)	181	589	0.69
11	Sensory System Disorder (SEN)	21	63	0.68
12	Poisoning Disorder (POD)	7	19	0.67
13	Genitourinary System Disorder (GEN)	32	87	0.64
14	Nutritional Disorder (NUT)	44	119	0.64
15	Culture-bound syndromes (CUL)	17	36	0.54
16	Circulatory System Disorder (CIR)	9	18	0.53
17	Endocrine System Disorder (END)	6	7	0.17
18	Mental Disorder (MEN)	1	1	0
19	Metabolic System Disorder (MET)	1	1	0

After calculating the  $F_{ic}$  value, it was found that 9 of 19 usage categories show value greater or equal to 0.70 which represent high level of consensus. Usage category “Animal Problem” and “Poison” had maximum  $F_{ic}$  value in comparison with others which account 0.87. These were followed by “Infection” (0.79), “Skin / Subcutaneous Cellular Tissue Disorder” (0.75), “Pregnancy/Birth/Puerperium Disorder” (0.75), “Muscular-Skeletal System Disorder” (0.74), “Respiratory System Disorder” (0.73), “Nervous System Disorder” (0.72), “Injuries” (0.70) “Digestive System Disorder” (0.69), “Sensory System Disorder” (0.68), “Poisoning Disorder” (0.67), “Genitourinary System Disorder” (0.64), “Nutritional Disorder” (0.64), “Culture-bound Syndromes” (0.54), “Circulatory System Disorder” (0.53), “Endocrine System Disorder” (0.17), “Mental Disorder” (0.00) and “Metabolic System Disorder” (0.00).

### 5.9 Ailments with the High Number of use-report along with Number of Taxa

Among 19 usage category it was observed that 17 ailments (figure 16) belonging to 9 usage category had high use report (greater than 50). Ailment as cooling agent had very high number of use report (387) with 60 numbers of taxa. Similarly, gastritis had also high number of use report (313) with 83 numbers of taxa. Likewise, cough had 124 use report with 25 numbers of taxa, fever had 106 use report with 32 numbers of taxa, anorexia had 96 use report with 29 numbers of taxa, sprain had 88 use report with 13 numbers of taxa, diarrhoea has 87 use report with 29 numbers of taxa, worm infestation had 85 use report with 18 numbers of taxa, fish poisoning had 83 use report with 11 numbers of taxa, dysentery had 79 use report with 25 numbers of taxa, headache had 76 use report with 19 numbers of taxa, wound had 69 use report

with 24 numbers of taxa, cold had 64 use report with 15 numbers of taxa, jaundice had 63 use report with 8 numbers of taxa, boils had 59 use report with 17 numbers of taxa, mud wound had 55 use report with 12 numbers of taxa and coryza had 52 use report with 10 numbers of taxa (Figure 16).

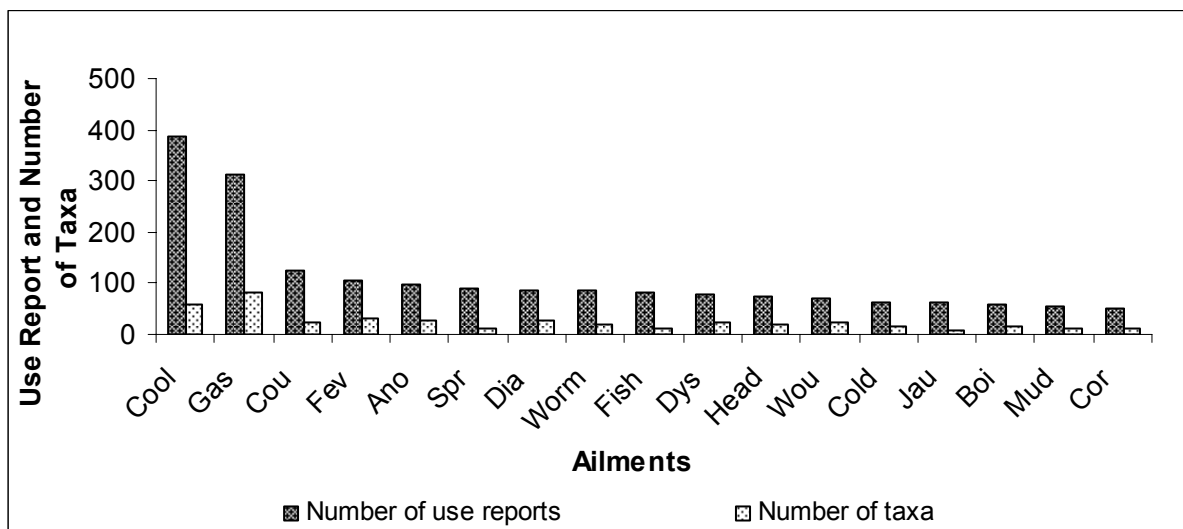


Fig. 16: Ailments with the high number of use-report along with number of taxa

### 5.10 Prioritized Medicinal Plant Species for Conservation in Benimanipur VDC

Total 170 medicinal plants, were not all frequently found in the study area. Some of them are in process of threat and should be conserved for upcoming generation otherwise it may completely disappear. Out of 170 medicinal plants, 15 plants species less frequently found were selected that should be conserved. These 15 medicinal plants (table 5) were selected by excluding alien and cultivated plants, plants having no trade value and observing the abundance in the study area and also on the basis of ranking score (Appendix VII).

The factors that cause the destruction of the plants are trade, habitat destruction, whole plant or plant parts used, unscientific and unsustainable harvesting and frequency of their utilization. These factors were scored as follows: if whole part was used it was scored 3, underground part also scored 3, reproductive part scored 2 and vegetative part scored 1.

Frequency of the utilization is expressed in terms of number of ethnic/caste groups using the plant species. If 7-8 ethnic/caste groups were using the same plant they were scored by 4, in case of 5-6 by 3, 3-4 by 2 and 1-2 by 1. The medicinal plants that were in threat in local level were categorized step by step which is clearly shown in Flow Chart 2. Among 15 plant species (Table 5) 4 plant species viz. *Alstonia scholaris*, *Asparagus racemosus*, *Curculigo orchioides*, *Rauvolfia serpentina* had been already kept in IUCN and CAMP threat categories while *Rauvolfia serpentina* had been kept in CITES II and MFSC as conserving plant (Table 5).

**Table 5: Plant species to be conserved in Benimanipur VDC**

S.no	Scientific name	IUCN category	CITES	CAMP(2001)	MFSC(2007)
1	<i>Abrus precatorius</i> L.				
2	<i>Alstonia scholaris</i> (L.) R. Br.	LC (IUCN, 2006)		VU	
3	<i>Asparagus racemosus</i> Willd.	VU (IUCN 1994)		VU	
9	<i>Bauhinia scandens</i> var. <i>horsfieldii</i> (Miq.) H. Ohashi				
4	<i>Bombax ceiba</i> L.				
5	<i>Curculigo orchioides</i> Gaertn.	VU (IUCN 1994)		VU	
6	<i>Dioscorea bulbifera</i> L.				
7	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam				
8	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.				
10	<i>Persea odoratissima</i> (Nees) Kosterm.				
11	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	E (Shrestha and Joshi, 1996)	II (CITES 2006)	CR	PP(II)
12	<i>Terminalia bellirica</i> (Gaertn.) Roxb.				
13	<i>Terminalia chebula</i> Retz.				
14	<i>Tinospora sinensis</i> (Lour.) Merr.				
15	<i>Woodfordia fruticosa</i> (L.) Kurz				

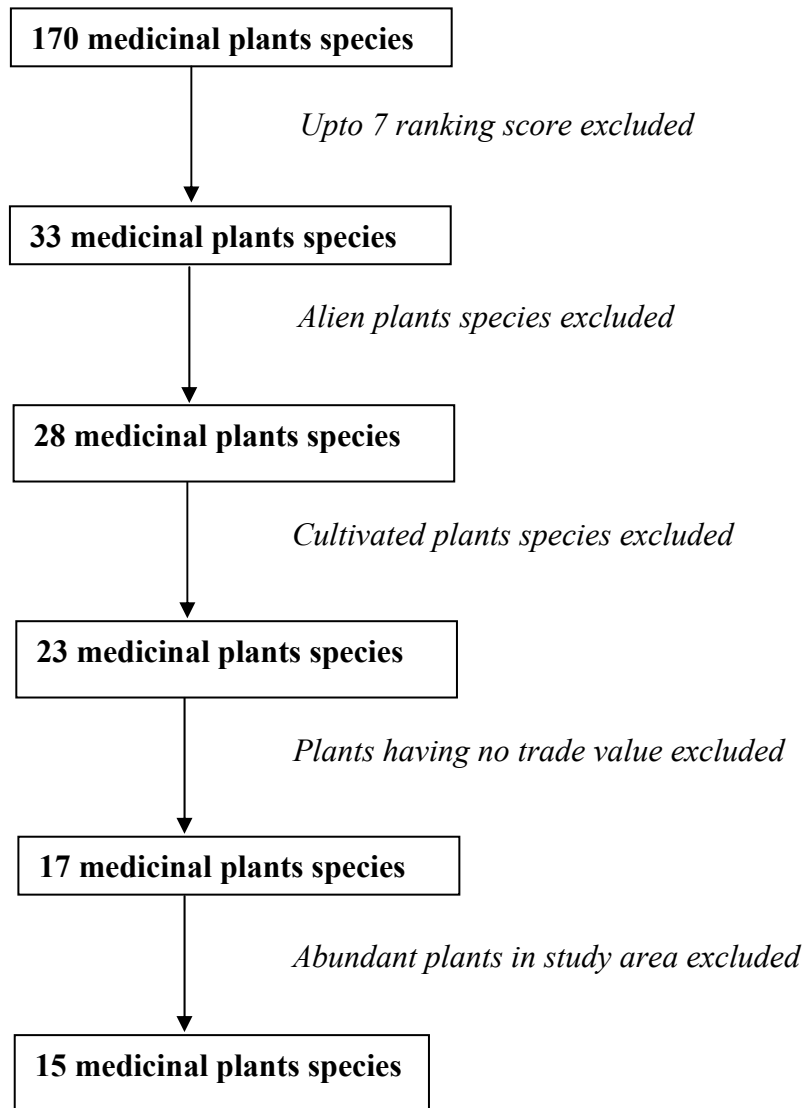
**N.B.:** LC: Least concern, VU: Vulnerable, E: Endangered, CR: Critically endangered, PP: Protected plant

CITES Appendix II: Species not at threatened but which could become endanger if trade is not controlled.

Protected plant II: Ban on export outside the country, except the processed product on permission of Department of forest.



**Flow Chart 2: Prioritized medicinal plants species for conservation in Benimanipur VDC**



## CHAPTER VI

### 6. DISCUSSION

#### 6.1 General Overview

Benimanipur VDC, which lies on northern side of Nawalparasi district in western Nepal, was selected as present study area to explore the ethnobotanical knowledge of major eight ethnic/caste groups *viz.* Brahman, Chhetri, Tharu, Magar, Newar, Kumal, Dalit and Gurung. The study mainly focussed on the use of medicinal plants for treating different diseases/disorders. No ethnobotanical work has been previously carried out in this area. This may be a new work for documenting traditional knowledge among eight different ethnic/caste groups from this area.

All information and finding presented here are primarily based on field observation, interview and group discussion with local faith healers ('Guruwas'), community leaders, social workers and elderly people from the focussed ethnic/caste groups living in the study area. Apart from medicinal knowledge they also had knowledge about multiple uses of medicinal plants. Some elderly people and faith healers of study area tried to keep secrete about indigenous use of medicinal plants.

On comparing knowledge about indigenous use of plant species as medicine in between male and female, male were found to have more knowledge while female had more knowledge about other uses of plant species rather than medicinal use. This may be because female are involved more in household work than male and they use plant resources for different purposes like making net, basket, rope etc. People have retained their traditional knowledge and practices to fulfil their daily needs. The people of age group more than 55 years old had good knowledge about medicinal use of plants.

#### 6.2 Diversity of Medicinal Plant

Total 170 medicinal plant species were enumerated belonging to 64 families and 138 genera in which Leguminosae was observed as the largest family comprising 18 plant species. Out of 170 medicinal plant species, 166 species belong to angiosperm and 4 species belong to pteridophytes. The recorded medicinal plants were reported to treat altogether 122 ailments. The medicinal plants species were analyzed with respect to frequency of plant family, habit, parts

used, mode of use, etc. Based on their habit type, these are grouped as herb, shrub, tree and climber. It was found that trees were used most commonly as medicinal plant in the study area which account 67 (39.4%) of total used medicinal plant. The high frequency of trees in study area may indicate a unique preference for tree species. Among 170 medicinal plants studied 51 (30.0%) belongs to herb, 33 (19.4%) belongs to shrub and 19 (11.2%) belongs to climber.

### **6.3 Variation in Ethnomedicinal Knowledge among Different Ethnic/Caste Groups**

Ethnobotanical knowledge varied among 8 ethnic/caste groups (Figure 6) where Dalit had very good knowledge on medicinal plant. They were familiar about 85.29% medicinal plants out of total plant studied. This may be because Dalit people were found economically poor so that they are depended on the natural product that obtains from plants. Among the Dalit not only the elderly people but also the young generation were found following the traditional medicinal practices to treat different ailments. Gurung people were found to have very less knowledge (50.59%) among eight ethnic/caste groups. This may be because they were recently migrated from another part of country and their population was also very low in the study area. Knowledge transmission from old generation to new generation was not found in Gurung community because the young generation show no more interest on the use of plants. Data showed that 49 species of plants were very popular among all ethnic/caste groups. Out of 49 medicinal plants 12 plant species were used by all ethnic/caste groups to treat nine common disease/disorders. But within one ethnic/caste group there is large number of species used as medicine.

Basically there were two mode of treatment; oral and applied. Oral mode of use again sub categorized into 10 different sub-categories. In this observation it was observed that people of study area mostly use medicine in the form of juice (44.25%, Figure 7), which was followed by powder form (18.82%), raw (10.45%), decoction (9.76%), paste (4.88%), miscellaneous (4.53%), infusion (2.09%) and in the form of pulp, smoke and sticky fluid (1.74%).

Similarly mode of use applied was also again sub categorized into 8 sub-categories. In this case paste (39.20%) form was very popular among eight ethnic/caste groups for application on body (Figure 8) followed by juice (15.20%), sticky fluid (13.60%), miscellaneous (12.80%), spiritual casting (9.60%), decoction (4.80%), powder (3.20%) and pulp (1.60%).

Preference of parts used was different among eight ethnic/caste groups. From a same plant, one used the root, other used the bark, other used the leaf and so on to treat same disease. Therefore, the parts used preferred by local inhabitants was categorized into 11 different categories *viz.* whole part, root, stem, leaf, shoot apex, flower, fruit, seed, bark, rhizome and tuber. Figure 9 showed that the highly used plant parts reported was root, i.e. 19.2% (69). The high importance of the underground part was attributed to having high concentration of bioactive compounds (Moore, 1994). Therefore people mostly prefer root as medicine which was followed by leaves (18.1%), bark (13.6%), fruit (12.8%), shoot apex (8.1%), whole part (7.8%), stem (7.5%), flower (2.8%), tuber (1.9%) and rhizome (0.6%).

#### **6.4 Multiple Uses of Medicinal Plants**

The plant species used by different ethnic/caste groups were preferred not only for medicinal purpose but they were also used for other purposes such as food, fodder, fuel wood, fish poisoning, 'Marcha' preparation, etc. There is variation in the knowledge about the multiple uses of plants in the study area (Figure 11). Among 12 multiple uses of plant species 'Tharus' were found to have exceptionally high knowledge about multiple uses of plant as edible, fodder, fuel wood, handicraft, fish poisoning, 'Marcha' preparing plants, oil extraction and alcohol. This may be because among all ethnic/caste groups they were most ancient and local inhabitant ethnic group in the study area. More often they collect food material from the forest. They prepare different handicraft products such as mat, basket, fishing net, etc. for their own use as well as to trade. Almost in every cultural program they prefer alcoholic products as a compulsory drink so they have very good knowledge about plant species in 'Marcha' and alcohol preparation.

The Dalit as well as Brahman had comparatively high knowledge about the medicinal use of plant species. This may be because they were migrant from hilly areas to study area in the past. They have good knowledge about medicinal uses of plant species of both found in hills and Terai region which they borrowed from ancient local inhabitant, the Tharu, who supported them in providing additional knowledge.

## 6.5 Medicinal Plants having High Ethnographic Validity

Out of 170 medicinal plant species studied 64 plant species showed high ethnographic validity. Medicinal use of only 22 plant species were compared with previous finding by different researcher, and the 22 species were selected on the basis of mean frequency greater than 30 and the alien species and cultivated species were excluded (Table 2, Appendix V). It is more time consuming to go through each and every ethnobotanical literature to compare the present findings and previous findings of the medicinal use of plants. Therefore only available literatures were followed to compare present findings with previous findings.

The bark and leaf of *Caesalpinia decapetala* was used to cure ringworm in present study but Kunwar *et al.*, (2006) reported use of plant as laxative which was not similar with present finding (Table 2).

The leaf, stem and sticky fluid of *Calotropis gigantea* was found to be used to treat sprain, coryza (sinusitis), boils, wounds and cuts in present study. Bhattarai (1991) and Kunwar *et al.*, (2006) reported similar use of plants to treat sprain while Bhattarai (1990, 1992c, 1993a), Kunwar *et al.*, (2006) reported use of plant to treat sinusitis which was also similar to present finding. Manandhar (1988, 1998) reported similar use of plants to treat boils. Muller-Boker (1993) reported similar use of plants to treat wound. Use of plant to cure cut is new finding which was not reported in previous finding. The other uses of plants reported by different researcher have been presented in Table 2.

The bark, stem and leaf of *Cleistocalyx operculatus* was used to cure coryza (sinusitis), headache, cold, dysentery, gastritis and running nose in present study. Kunwar *et al.*, (2006) reported similar use of plants for sinusitis. Use of plant to treat headache, cold, dysentery, gastritis, and running nose were not found in previous literatures. The other uses of plants reported by different researcher have been presented in Table 2.

The tuber of *Curcuma caesia* was used to treat gastritis, high blood pressure, sprain, wound and anorexia in present study. The present findings had not been reported by earlier workers. So all present finding are new.

The tuber of *Dioscorea bulbifera* was reported to cure worm infestation and diphtheria in present study. Manandhar (1995, 1998) reported similar use of plants to treat worm infestation.

The use of plant to cure diphtheria was not reported previously in the reviewed literature. The other uses of plants reported by different researcher have been presented in Table 2.

The root of *Morus macroura* was used to treat worm infestation and gastritis in present study. Bhattarai (1992a) reported similar use of plant as anthelmintic. The use of plant to treat gastritis was not reported previously in the reviewed literature. The other uses of plants reported by different researcher have been presented in Table 2.

The seed of *Neohymenopogon parasiticus* was used to treat gonorrhoea, uterus swelling and also used to make tooth strong in the present study. The previous finding for this plant had not been reported in previous literature. So these use report are new.

Whole part, root and trailer stem of *Periploca calophylla* was used to treat sprain, backbone pain, fracture and gastritis in present study. Manandhar (1994) reported similar use of plants to treat sprain. The other uses of plant to treat fracture, backbone pain and gastritis were not reported previously in the reviewed literature. The other uses of plants reported by different researcher have been presented in Table 2.

The whole part and shoot apex of *Persicaria barbata* was used as fish poisoning and to treat anorexia in the present study but Manandhar (1991) reported the use of plant to treat scabies which was not similar with the present study.

The root, stem and fruit of *Piper longum* was found to cure asthma, cough and gastritis in present study. Tiwari and Joshi (1990b) reported similar use of plants to treat asthma. Bhattarai (1993a) reported the plant to treat hooping cough which was also similar to present uses. The use of plant to treat gastritis was not mentioned previously in reviewed literature. The other uses of plants reported by different researcher have been presented in Table 2.

The bark and stem of *Plumeria rubra* L. was found to cure anorexia, diarrhoea, stomach pain, wound and also for making sexually active. All these finding are disimilar with previous reviewed literature. So these uses are new finding. The other uses of plants reported by different researcher have been presented in Table 2.

The root, shoot apex, leaf and whole part of *Pogostemon benghalensis* was found to cure cough, fever, pneumonia, cold, headache, body pain, gastritis and running nose in present study.

Manandhar (1989, 1992) reported similar use of plant for cough and cold while in 1993 reported similar use of plant to treat fever. The use of plant to cure pneumonia, headache, body pain, gastritis and running nose was not mentioned previously in the reviewed literature, these are new finding. The other uses of plants reported by different researcher have been presented in Table 2.

The bark, leaf and sticky fluid of *Premna barbata* was used to cure breast engorged, diarrhoea, gastritis and also as cooling agent in present study. All these finding are dissimilar with previous reviewed literature. These uses are new finding in this study. The other uses of plants reported by different researcher have been presented in Table 2.

The leaf and seed of *Solanum anguivi* was found to cure constipation, headache, fever, high B.P., bile juice problem and also as cooling agent in present study. These use report were not found in the previous reviewed literature. These uses are new finding in this study. The other uses of plants reported by different researcher have been presented in Table 2.

The bark and seed of *Terminalia bellirica* was found to cure allergy, cough and gastritis in present study. Kunwar *et al.*, (2006) reported the use of plant to cure gastritis which was similar to present study. But the use of plant to cure allergy and cough were not found in the previous reviewed literature. These uses are new finding in this study. Other uses of plants reported by different researcher have been presented in Table 2.

The stem and tuber of *Tinospora sinensis* was found to treat gastritis and also used as cooling agent and in production of more milk in present study. All these finding are dissimilar with previous reviewed literature. These uses are new finding in this study. Other uses of plants reported by different researcher have been presented in Table 2.

The tuber, bark, leaf and root of *Viscum album* was found to cure diarrhoea, gastritis, fracture, backbone pain, waist pain and sprain in present study. Manandhar (1992) reported similar use of plant to treat sprain. Other uses of plant to treat diarrhoea, gastritis, fracture, backbone pain, waist pain were not recorded in previous reviewed literature. These uses are new finding. Other uses of plants reported by different researcher have been presented in Table 2.

The shoot apex, leaf, bark, flowers and fruit of *Woodfordia fruticosa* was found to cure diarrhoea, dysentery and vomiting in present study. Bhattarai (1990-1992, 1993b) reported

similar use of plant to treat diarrhoea and dysentery. Tiwari and Joshi (1990b), Manandhar (1991), Siwakoti and Verma (1996) and Kunwar *et al.*, (2006) reported use of plant to cure dysentery which is also similar to present finding. Joshi and Joshi (2000) reported the similar use of plant to treat vomiting. The other uses of plants reported by different researcher have been presented in Table 2.

The immature fruit of *Xerompis spinosa* was reported to treat malaria and also used as cooling agent and fish poisoning in present study which has not been reported in earlier works. These uses are new finding.

The root, seed, shoot apex and pulp of seed of *Zizyphus mauritiana* was found to cure measles, headache, dysentery, gastritis and as cooling agent in present study. Bhattarai (1990, 1992c), Manandhar (1994) reported similar use of plants to treat measles. Bhattarai (1990-1992) and Manandhar (1985) reported the use of plants to treat dysentery which was similar to present finding. But the use of plants as cooling agent, in gastritis and headache were not reported in previous reviewed literature. These uses are new finding for this study. Other uses of plants reported by different researcher have been presented in Table 2.

The whole part of 'Chini laharo' whose botanical name was unknown, used to treat sprain, gastritis and also as cooling agent. Similarly 'Pyale rukh' whose botanical name was also unknown, used to cure jaundice and abdominal disorder.

Among 22 medicinal plants taken for comparative study of medicinal use with previous findings, it was found that most of them had new use report. This may because the study was conducted in new area where so far no ethnobotanical work had been carried out before and study had been conducted among eight ethnic/caste groups. Different ethnic/caste groups had different pattern of use of medicinal plant to treat different diseases/disorders. The same plants used by different people belonging to different ethnic/caste groups to treat different diseases/disorders also lead to new finding.

It has been assumed that the more information validates the popular use of a single plant the more likely it is to be effective in treating a certain illness (Heinrich *et al.*, 1992). Analysis of use of plant species as medicine among eight ethnic/caste groups showed that 64 plant species had high ethnographic validity in terms of their use for a particular disease/disorder among 170 medicinal plant species. It indicates that these plant species had comparatively higher



ethnomedicinal use for a particular disease/disorder and these medicinal plants were most popular in all ethnic/caste groups of study area which proves their validity for treatment of that particular disease/disorder.

Oli (2001) divided plants into three validity rank in his study i.e. very high, high and low validity rank. In his study analysis of ethnographic validity revealed that a total of 9 plants showed very high ethnographic validity i.e. plants having validity score greater than 200. Similarly 12 plants had high ethnographic validity i.e. validity score ranges from 100-200 and 29 plant species had low ethnographic validity i.e. validity score below 100. But in this study the ethnographic validity score of medicinal plants were found greater than Oli (2001). So the plants were divided into four validity rank i.e. very high validity, high validity, medium validity and low validity rank. In present study 10 plant species had very high ethnographic validity score that ranges from 300-420 among them the plants *Aloe vera* has high ethnographic validity for burns i.e. 416.94. Similarly 25 plant species had high ethnographic validity score that ranges from 200-300, 29 plant species had medium validity score in which 3 plant species were repeated and ranges from 100-200 validity score and 702 plant species (most plant species repeated) had low validity score that is below 100 ethnographic validity rank.

Oli (2001) analyzed the ethnobotanical knowledge among five ethnic/caste groups from Churiya hill of east Nepal by using the ethnographic validity method while in present study ethnobotanical knowledge among eight ethnic/caste groups is analyzed from western Terai of Nepal. The medicinal plants having very high ethnographic validity in treating particular disease/disorder were *Aloe vera* (Burns), *Ananas comosus* (Cooling agent), *Caesalpinia decapetala* (Ring worm), *Calotropis gigantea* (Sprain), *Carica papaya* (Cooling agent), *Mentha spicata* (Cooling agent), *Persicaria barbata* (Fish poisoning), *Scoparia dulcis* (Cooling agent), *Tinospora sinensis* (Gastritis) and *Woodfordia fruticosa* (Dysentery). The other plants that have high and medium ethnographic validity are given in appendix (V).

## **6.6 Indigenous Knowledge and Consensus**

Cook (1995) illustrated 17 usage categories in his study but in this study 2 additional categories have been added viz. “Animal problem” (ANP) and “Poisons” (POI). Table 3 shows information on number of taxa used to treat disease/disorders along with total use report for a particular

disease and also shows the number of overlapping of medicinal plants used to treat 122 ailments which are categorized into 19 usage category among 170 medicinal plants studied.

Figure 14 and 15 shows the number of taxa used and number of use report in each usage category. Highest number of taxa has been found in “Infection” (INF) i.e. 204, with highest number of use report i.e. 946. Table 4 showed that Informant Consensus Factor ( $F_{ic}$ ) was high in “Animal Problem” (ANP) and “Poisons” (POI) having 0.87 each while “Infection” (INF) had 0.79. In “Animal Problem” (ANP) and “Poisons” (POI) usage category less number of plants had more number of use reports that is 3 number of taxa with 16 number of use report and 13 number of taxa with 91 use report respectively. Similarly, in “Infection” (INF) 204 plant species have been reported 946 times which is lesser number of use report for greater number of taxa than “Animal Problem” (ANP) and “Poisons” (POI). Usage category “Mental Disorder” (MEN) and “Metabolic System Disorder” (MET) both had 0  $F_{ic}$  value because in this case one taxa had only one use report. The maximum possible  $F_{ic}$  value is 1, while the total consensus among the informant about the medicinal plant for the given category.

To analysis the level of disease category, the informant consensus factor  $F_{ic}$  was calculated for each category (Table 4). In this study 9 among 19 usage category showed a factor greater and equal to 0.70, which represent high level of consensus in this study. This level of consensus is higher than that reported by Treyvaud Amiguet *et al.* (2005) for Q’eqchi Maya of southern Belize, where only 7 among 17 usage category show a factor greater and equal to 0.70 and Heinrich (2000) for Yucate Maya in Mexico where only 1 among 9 use category had  $F_{ic}$  value greater than 0.60. But the level of consensus is less than that reported by Yadav (2008) for three VDCs of Langtang district, where 7 among 11 usage category had  $F_{ic}$  value greater and equal to 0.75. Yadav (2008) studied traditional ethbotanical knowledge by using Informant Consensus method from high altitude region i.e from 2000-4000m. But present study is conducted in Terai region of Nepal by using this method which is new for Terai belt of Nepal. Good consensus means that the uses of plants are well known among the people of study area. These plants also might be predicted to be very effective in treating disease. From a scientific point of view the high concensus species are good candidates for investigation of phytochemistry and pharmacology which in turn could be useful in the development of evidence based phytomedicine for the region (Treyvaud Amiguet *et al.*, 2005). So the plant species that have high consensus value were so much important for human being for future culture and pharmacological research.

### **6.7 Ailments with Highest Number of use report along with Number of Taxa**

Figure 16 shows a summary of major ailments in study area with high number of use report that were mentioned more often by the healers and that were treated with high number of medicinal plant species. It was also observed that among 122 ailments, 17 were most common on the basis of high use report (>50) in study area (Appendix VI) viz. hot (cooling agent) (INF), gastritis (DIG), cough (RES), fever (INF), anorexia (NUT), sprain (MUS), diarrhoea (DIG), worm infestation (INF), fish poisoning (POI), dysentery (DIG), headache (NER), wound (INJ), cold (INF), jaundice (INF), boils (SKI), mud wound (INF) and coryza (RES). These were major ailments because they were mentioned by local healers to be common in community. Among them anorexia, diarrhoea, dysentery was found to be most frequent in children or infants. Number of taxa used to treat gastritis was highest in study area i.e. 83 plant species were used with use report 313 (Appendix VI). The use report was found highest for hot (cooling agent) i.e. 387 in which 60 taxa were used. This may be because the study area lies in climatically hot area in tropical zone of Nepal. So people of the study area are mainly suffered from health disorders caused by hot. Similarly other diseases like cough had 124 use report with 25 plants used, fever had 106 use report with 32 plants used, anorexia had 96 use report with 29 plants used, sprain had 88 use report with 13 plants used, diarrhoea had 87 use report with 29 plants used, worm infestation had 85 use report with 18 plants used, fish poisoning had 83 use report with 11 plants used, dysentery had 79 use report with 25 plants used, headache had 76 use report with 19 plants used, wound had 69 use report with 24 plants used, cold has 64 use report with 15 plants used, jaundice had 63 use report with 8 plants used, boils had 59 use report with 17 plants used, mud wound had 55 use report with 12 plants used and coryza had 52 use report with 10 plants used.

### **6.8 Prioritized Medicinal Plant Species for Conservation in Benimanipur VDC**

There is growing threat on the use of medicinal plants, their product and traditional medicinal practices as the deforestation and encroachment by people are rapidly leading to agricultural land and urbanization in the former jungle (Chaudhary, 1998). So, due to high demand of plant resources at local level for various purposes and illegal collection and illegal trade in the study area, there is threat on the existence of various important plant species. The people of the study area used the plant resources randomly that is without any sustainable harvesting knowledge and also due to fires, over grazing of cattles in forest the plants are in high destruction level.

A total of 170 medicinal plants have been studied from study area. These plants were not only used as medicine but also used for various other purposes. The plant diversity are decreasing day by day due to multiple uses of plants, deforestation for settlement, no idea about conservation of plant resources, use of forest products in daily life, poor economic condition of local people, illegal collection and trade of selected timber yielding and medicinal plant species. The study area is far from urban area and there is poor transportation facility and also there is no facility of electricity due to which the local people can not use petroleum resources and electricity as fuel. Therefore local people had to depend on fuel wood which is collected from forest.

A total of 15 plant species have been selected as prioritized medicinal plant species for conservation in study area. These plants are selected on the basis of parts use, trade on national level, use frequency among eight ethnic/caste groups, excluding cultivated and alien species and abundance of plant species. The prioritized medicinal plant species for conservation in study area are *Abrus precatorius*, *Alstonia scholaris*, *Asparagus racemosus*, *Bauhinia scandens*, *Bombax ceiba*, *Curculigo orchioides*, *Dioscorea bulbifera*, *Diploknema butyracea*, *Herpetospermum pedunculatum*, *Persea odoratissima*, *Rauvolfia serpentina*, *Terminalia bellirica*, *Terminalia chebula*, *Tinospora sinensis* and *Woodfordia fruticosa*. These plant species are highly used by most of the ethnic/caste groups for various purposes and also have high trade value in national level. Among them *Alstonia scholaris*, *Asparagus racemosus*, *Curculigo orchioides* and *Rauvolfia serpentina* are kept on threat category by IUCN and CAMP while CITES (II) and MFSC kept the plant *Rauvolfia serpentina* as conserved plant species.

Among total 170 medicinal species studied, 34 species of plants have high validity score (including high and very high validity score). In case of Informant Consensus Factor analysis usage category ANP and POI had high  $F_{ic}$  value and each usage category comprises 3 and 13 taxa respectively. On comparing 34 species of plants having high ethnographic validity score to 15 prioritized medicinal plant species for conservation, only three plants were found similar. And on comparing 16 species belonging to two usage category having high consensus factor to 15 prioritized medicinal plant species for conservation, only one plant was found similar. This may because due to above mentioned criterias of selection for prioritized medicinal plant species for conservation.

## CHAPTER VII

### 7. CONCLUSION

The study indicates that people of Benimanipur VDC have rich traditional knowledge with their long experience and practices about the use of plants for various purposes and are found mostly dependent on the forest and forest products. Especially the local traditional healer, as 'Guruwas' and elderly people of the study area are found to have rich knowledge on the use of plant species as medicine while women are found to have rich knowledge about other uses of plant species rather than medicinal use. The dependency of local community on traditional medicine may be due to their strong faith upon traditional health care system, unavailability of easy access to modern health care system and economically poor condition.

Though the local elderly people of study area have good knowledge about use of plant species for different purposes, but it was observed that there is lack of continuation and flow of indigenous knowledge from elder to young generation. Young generation were found to give less attention on the traditional medicinal practices and prefer modern health care system. Therefore there is great chance of loss of traditional medicinal practices and other uses of plants.

Among eight major ethnic/caste groups in the study area, Dalit were found to have comparatively high knowledge about medicinal use of plant species which was followed Brahman, Tharu, Magar, Chhetri, Kumal, Newar, Gurung. Economically poor conditions of Dalit have led to depend upon natural products so having rich knowledge and they were found still following traditional medicinal practice and transfer their knowledge to their young generation.

Tharu had comparatively high knowledge in comparison with other ethnic/caste groups about multiple uses of plant species. The rich knowledge of Tharu community in multiple uses of plant species may be because they are ancient inhabitants of study area. Mostly they depend upon the forest and forest products to fulfil their daily needs.

Altogether, 170 plant species belonging to 138 genera and 64 families were used as medicine by local people of the study area. Most of these species are of wild occurrence, while some of these are being cultivated. These medicinal plants are used to cure 122 ailments. Out of 170 medicinal plants 49 species of medicinal plants are used by all ethnic/caste groups to treat different

diseases/disorders which show that these plants are highly used in study area. Eight ethnic/caste groups use 12 common medicinal plants for 9 common diseases/disorders. It means that each ethnic/caste group use same plant to treat same disease /disorder.

The ethnobotanical information obtained from the study area were analysed by taking Ethnographic validity rank developed by Oli (2002) and by informant consensus method given by Trotter and Logan (1986).

The ethnographic validity rank method also showed the popularity of plant at local level. In this method use report was observed among 8 ethnic/caste groups. The ethnographic validity of medicinal plants used by eight ethnic/caste groups showed that 64 plant species have high ethnographic validity among total plant studied. Among 64 plant species 10 plant species had very high validity among which *Aloe vera* has high ethnographic validity for burns i.e. 416.94. Similarly 25 plant species had high validity and 29 plant species (3 plant species being repeated) had medium validity. It shows that these plant species are highly popular among the eight ethnic/caste groups of study area. Among 64 plant species, 22 plant species having high validity score were compared with previous use report given in different literature to analyse their medicinal use. These plants were chosen by excluding cultivated and alien plant species and plants having use frequency less than 30%. It was found that most plant species has new use report which was not reported in previous literatures. It may be because as the present study was conducted in new area where so far no ethnobotanical work has been carried out before and also may be due to the information collected among eight different ethnic/caste groups.

In informant consensus method, medicinal uses of the plant species were grouped into 19 usage categories while Cook (1995) grouped the use of the plants into 17 usage categories. It was found that among 19 usage categories, ANP and POI have high consensus value i.e. 0.87 each. But INF has highest number of use report with highest number of taxa used. The frequency of use for each plant and the informant consensus factor for each usage category reveals a consensus among the healers on the use of plant species as well as the disease treated. The data shows the use of a majority of species in the study area.

By quantitative analysis it was found that the high consensus obtained among the healers underlines their well defined tradition and could guide the selection of plant candidates for further phytochemistry and bioactivity analysis with respect to anthropological aspect of the study of indigenous medicinal plants. The use of plants species which are well known among

the local people of the study area means there is good consensus for medicinal plants. Therefore, these plant species also might be predicted to be very effective in treating different disease/disorders.

Due to multiple use of the medicinal plants, deforestation, habitat encroachment for settlement and cultivation, over grazing, unsustainable harvesting of forest products; the plant species are becoming highly threatened. All these activities lead to the loss of rich biodiversity in the study area. Among 170 medicinal plant species studied, 15 plant species are suggested and need for conservation in study area. Among 15 plant species, 4 plant species namely *Alstonia scholaris*, *Asparagus racemosus*, *Curculigo orchioides* *Rauvolfia serpentina*, are already kept in threat category by IUCN, CAMP while *Rauvolfia serpentina* is kept in CITES and MFSC which must be conserved. Thus, conservation of natural resources and their proper use in sustainable way have to be developed in the study area although the community forest is already established.

## CHAPTER VIII

### 8. RECOMMENDATION

The indigenous knowledge of local healers, old people, Guruwas, etc. about the various use of plants mainly in caring human health should be recorded or taped and documented for offspring. As the pattern of use of medicinal plants is found to be different e.g. sometimes same plants are used by different ethnic/caste groups to treat different disease/disorders.

Participation of young generation either men or women should be increased in traditional medicinal practice sharing program.

The medicinal plant species having multiple uses are comparatively (more threatened) more exploitation. Therefore these plant species should be focused as potential species and given priority for conservation.

It is needed to encourage and mobilized the local people to grow and cultivate the useful and valuable medicinal plant and also the other species which are ethnobotanically important on a large scale. The growing of these plant species will support the livelihood of the local people. For this, seed and seedlings of the valuable plant species should be provided at enough amounts by the District Office and the local people should be trained properly by concerned authorities about the method of cultivation, harvesting storage and marketing.

Mostly the local people of the study area have a great faith and belief on the local healers, Guruwas, lama and the traditional health care system and practices they apply. So these local healers/doctors should be trained for modern (Allopathic/Ayurvedic) health care system which will enable them to provide more efficient medical service.

The local people should be encouraged towards agro-forestry, which also helps to conserve and promote the natural resources.



## REFERENCES

- Banerji, M.L. 1959. Contribution to the Flora of East Nepal. *Rec. Bot. Surv. India*.
- Baral, S.R. and P.R. Kurmi. 2005. *A Compendium of Medicinal Plants in Nepal*. Mass Printing Press, Chhauni, Kathmandu.
- Bashyal, B.P., N.K. Bhattarai and J. Pradhan. 1994. Role of research and development in commercialization of non-timber forest products; medicinal and aromatic plants. In: *Proceedings of national seminar on non timber forest products: medicinal and aromatic plants*. Ministry of Forest and Soil Conservation, Herb Production and Processing Co. Ltd., Kathmandu, Nepal.
- Berkes, F., J. Colding and C. Folke. 2000. Rediscovery of traditional ecological knowledge as adaptive management. *Ecological Applications*. **10**: 1251–1262.
- Bhattarai, G.P. 2002. *Diversity and Indigenous users of Flowering Plant Resources in Churia Forests of Parsa Wildlife Reserve and Adjoining Areas*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Bhattarai, N.K. 1990. Herbal folk medicine of Kabhrepalanchowk district, Central Nepal. *Int. J. Crude drugs Res.* **28**(3): 225-231.
- Bhattarai, N.K. 1990-1992. Knowledge and remedial practices of diarrhoeal disease among the rural population of Central Nepal. *J. Nepal pharm. Assoc.* **17**(1990-1992): 13-26.
- Bhattarai, N.K. 1991. Folk herbal medicine of Makawanpur district, Nepal. *Int. J. Pharmacognosy.* **29**(4): 284-295.
- Bhattarai, N.K. 1992a. Folk anthelmintic drugs of central Nepal. *Int. J. Pharmacognosy.* **30** (2): 145-150.
- Bhattarai, N.K. 1992b. Folk herbal remedies of Sindhupalanchok district, central Nepal. *Fitoterapia*, **63**(2): 145-155.
- Bhattarai, N.K. 1992c. Folk use of plants in veterinary medicine in Central Nepal. *Fitoterapia*, **63** (6): 497-504.
- Bhattarai, N.K. 1993a. Folk medicinal use of plants for respiratory complaints in central Nepal. *Fitoterapia*, **64**(2): 163-170.
- Bhattarai, N.K. 1993b. Folk herbal remedies for diarrhea and dysentery in Central Nepal. *Fitoterapia*. **64**(3): 243-250.
- Bhattarai, N.K. 1993c. Folk herbal medicines of Dolakha district, Nepal. *Fitoterapia*. **64**(5): 387-395.

- Bhattarai, N.K. 1994. Folk herbal remedies for gynaecological complaints in Central Nepal. *Int. J. pharmacognosy.* **32**(1): 13-26.
- Bhattarai, N.K. 1997. Traditinal herbal medicine used to treat wounds and injuries in Nepal. *Tropical Doctor.* **27**: 43-47.
- Bhattarai, N.K. 1998. Traditional medicine, medicinal plants and biodiversity conservation in the global and the Nepalese context. *Plant Research.* **1**(1): 22-31.
- Bhattarai, N.K. 1999. Medicinal plants and the plant research division of Nepal. *Medicinal Plant Conservation.* **5**: 7-8.
- CAMP, 2001. *Conservation Assessment and Management Plan Workshop Report.* Selected plants species of Nepal. (eds. Vinay Tondon, Nirmal K. Bhattarai and Madhav Karki). MAPPA, IDRC, and HMG/N, MFSC.
- CBS. 2005. *Statistical year book of Nepal.* HMG/N. National Planning Commission Secretariat, Central Bureau of Statistics, Kathmandu, Nepal.
- Chapagain, D.J. 2004. *Medicinal Plants Used by the Tharu Community in the Buffer Zone of Royal Bardiya National Park, Nepal.* M. Sc. Dissertation, Cental Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Chaudhary, R.P. 1989. *The Prospect of Study of Medicinal Plants and Traditional Medicinal Practice in Nepalese Context.* Science Souvenir, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Chaudhary, R.P. 1994. *Conservation and Management Strategies of Non-timber Forest Products in Nepal.* WWF, People for Nature for People, May 1993.
- Chaudhary, R.P. 1998. *Biodiversity in Nepal: Status and conservation.* S. Devi, Saharanpur (U.P.), India and Tecpress books Bangkok, Thailand.
- Chaudhary, R.P., M. Nepal, V.N.P. Gupta and O.R. Vetaas. 2002. Traditional Use of Plants by the Indigenous Peoples of Makalu-Barun Region, Eastern Nepal. In: *Vegetation and Society- their Interaction in the Himalaya.* Tribhuvan University, Nepal and University of Bergen, Norway.
- CITES, 2006. *Plants in the CITES Appendices Annex 1.8.* www.cites.org.
- Collins, S., X. Martines, A. Mitchell, A. Jeshome and J.T. Arnason. 2006. Quantitative ethnobotany of two east Timorese cultures. *Economic Botany.* **60**(4): 347-361.
- Cook, F.E.M. 1995. *Economic botany data collection standard.* Royal Botanical Garden Kew, Kent, United Kingdom.

- Cunningham, A.B. 2001. *Applied Ethnobotany: People, Wild Plant Use and Conservation*. Earthscan Publication Ltd., London.
- Dangol, N. 2002. *Documentation of the Ethnobotanical Knowledge of the Kumal Community of Chitawan District, Central Nepal*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Dangol, D.R. and S.B. Gurung. 2000. Ethnobotanical Study of Darai Tribe in Chitwan District, Nepal. In: *Proceeding of third National Conference on Science and Technology*, 1999 March 8-11, Volume II Royal Nepal Academy of Science and Technology, pp 1194-1213.
- DFRS. 2001-2006. *Hamro Ban* (In Nepali) 2058-2063. GoN, Ministry of Forest and Soil Conservation, Department of Forest, Babarmahal, Kathmandu.
- DPR. 2007. *Medicinal Plants of Nepal* (Bulletin number 28). Department of Medicinal Plants, Thapathali, Kathmandu.
- Ford, E.I. 1978. Ethnobotany: Historic Diversity and Synthesis. In : *The Nature and Status of Ethno botany*. Anthropological papers, Museum of Anthropology, University of Michigan, no. 67: 33-49.
- Gautam, S. 2002. *Medicinal Plants used to Treat Respiratory Complaints in Nawalparasi District (Southern Nepal) and their Antibacterial Activities*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Ghimire, S.K., A.K. Shrestha, K.K. Shrestha and P.K. Jha. 2000. Plant resource use and human impact around RBNP, Nepal. *Journal of Natural History Museum*. **19**: 3-26.
- Grierson, A.J.C. and D.J. Long. 1983. *Flora of Bhutan*. Royal Botanical Garden, Edinburgh, **1**(1).
- Grierson A.J.C. and D.G. Long. 2001. *Flora of Bhutan*. Royal Botanic Garden, Edinburgh and Royal Government of Bhutan. **1**(3), **2**(1-3).
- Gurung, K. 2003. Indigenous Knowledge on the Plant Resources Used by the People of Tinjure Area, Terhathum Diistrict. *Botanica Orientalis*. **3**: 118-125.
- Gurung, L.J., S. Rajbhandary and S. Ranjitkar. 2007. Indigenous knowledge on medicinal plant utilization by Gurung community in Sikles Area, Kaski, Nepal. In: *National Seminar on Sustainable Use of Biological Resources with the Special Theme: Medicinal and Aromatic Plants*. pp 30.
- Hara, H., A.O. Charter and L.H.J. Williams. 1982. *An Enumeration of Flowering Plants of Nepal*. Volume III. Trustees of British Museum (Natural History), London.

- Hara, H., W.T. Stearn and L.H.J. Williams. 1978. *An Enumeration of the Flowering Plants of Nepal*. Volume I. Trustees of British Museum (Natural History), London.
- Hara, H. and L.H.J. Williams. 1979. *An Enumeration of the Flowering Plants of Nepal*. Volume II. Trustees of British Museum (Natural History), London.
- Harshberger, J.W. 1896. Purpose of ethnobotany. *Bot. Gaz.* **21**(3): 146-156.
- Heinrich, M. 2000. Ethnobotany and its role in drug development. *Phytotherapy Research.* **14**: 479- 488.
- Heinrich, M., A. Ankil., B. Frei., C.Weimann, and O. Sticher., 1998. Medicinal plants in Mexico: *Healers' Concensus and Cultural Importance Social Science and Medicine.* **47**: 1859-1871.
- Heinrich, M., H. Rimpler and N. Antonio Barrea, 1992. Indigenous phytotherapy of gastrointestinal disorder in a low land and mixe community (Oaxaca, Mexico): ethnopharmacologic evaluation. *Journal of ethnopharmacology* **36**: 63-80.
- HMG/N. 2002a. *Population of Nepal: Population Census*. His Majesty's Government of Nepal, National Planning Commission Secretariat, Central Bureau of Statistics, and United Nations Population Fund.
- HMG/N. 2002b. *Population of Nepal. Village Development Committee/Municipalities. Population Census 2001. Selected Table on Caste/Ethnicity, Mother tongue and Religious (Western Development Region)*. National Planning Commission Secretariat, Central Bureau of Statistics, and United Nations Population Fund.
- Hooker, J.D. 1872-1897. *The Flora of British India*. Volumes **I-VII**. L. Reeve and Co., London.
- Huntington, H.P. 2000. Using traditional ecological knowledge in science: methods and applications. *Ecological Applications.* **10**: 1270–1274.
- IUCN. 1994. *IUCN Red list categories*. Prepared by the IUCN Species Survival commission. IUCN, Gland, Switzerland.
- IUCN Nepal. 2000. *National register of medicinal plants*. Ministry of Forests and Soil Conservation Nepal and IUCN Nepal. Kathmandu, Nepal.
- IUCN, 2006. *Red list of Threatened Species*. [www.iucnrdlist.org](http://www.iucnrdlist.org).
- Iqbal, I. and M. Hamayun. 2004. Studies on the traditional uses of plants of Malam Jabba valley, District Swat, Pakistan. *Ethnobotanical Leaflets*. <http://www.siu.edu/eb/>.
- Jain, S.K. 1981. *Glimpses of Indian Ethnobotany*. Oxford and IBH Publishing Co. India.
- Jain, S.K. 2006. Ethnobotany in the new millennium-some thoughts on future direction in Indian ethnobotany. *Ethnobotany.* **18**: 1-3.

- Joshi, K.R. 2007. Medicinal and aromatic plants of Sarmoli VDC, Darchula District, Far-Western Nepal. In: *National Seminar on Sustainable Use of Biological Resources with the Special Theme: Medicinal and Aromatic Plants*. pp. 29-30.
- Joshi, A.R. and K. Joshi. 2000. Indigenous Knowledge and Uses of Medicinal Plants by Local Communities of Kaligandaki Watershed Area, Nepal. *J. Ethnopharmacology*. **73**: 175-183.
- Joshi, K. and S.D. Joshi. 2001. *Genetic heritage of medicinal aromatic plants of Nepal Himalayas*. Buddha Academic Publisher and Distributors Pvt. Ltd. Kathmandu, Nepal.
- Joshi, R.K. and A.R. Joshi. 2007. The indigenous knowledge and uses of medicinal plants in Machhegaun Nepal: Present status and future actions for sustainable management. In: *National Seminar on Sustainable Use of Biological Resources with the Special Theme: Medicinal and Aromatic Plants*. pp. 42.
- Joshi, S.S. and I. Shrestha. 1998. *Contribution to the Medicinal Flora of Pashupati Area of Kathmandu Valley*. Report Submitted to the Research Division, Tribhuvan University, Kirtipur, Kathmandu, Nepal.
- Koche, D.K., R.P. Shirat, S. Imran, M. Nafees, A.K. Zingare and K.A. Donode. 2008. Ethnobotanical and Ethnomedicinal Survey of Nagira Wild Life Sanctuary, District Gondia (M.S.) India – Part I. *Ethnobotanical Leaflets*. <http://www.siu.edu/~ebl/>.
- Kunwar, R.M., B.K. Nepal, K.P. Sigdel and N. Balami. 2006. Contribution to the ethnobotany of Dhading district, Central Nepal. *Nepal journal of science and technology*. **7**: 65-69.
- Lama, Y.C., S.K. Ghimire, Y.A. Thomas. 2001. *Medicinal plants of Dolpo: Amchis knowledge and conservation*. WWF Nepal Program, Kathmandu, Nepal.
- Lawrence, G.H.M. 1967. *Taxonomy of Vascular Plants*. Oxford and IBH Publishing Co. Pvt. Ltd., New Delhi.
- Maheshwari, J.K., K.K. Singh and S. Shah. 1981. *Ethnobotany of the Tharus of Kheri District, Uttar Pradesh*. National Botanical Research Institute (NBRI), Lucknow.
- Maheshwari, J.K., K.K. Singh and S. Shah. 1986. *Ethnobotany of Tribes of Mirzapur District, Uttar Pradesh*. Economic Botany Informatic Service (EBIS), National Botanical Research Institute, Lucknow.
- Malla, S.B. and P.R. Shakya 1999. Medicinal plants of Nepal. In: *Nepal Nature's Paradise*. M. Devi Gwalior (India). pp 261-297.
- Manandhar, N.P. 1985. Ethnobotanical notes on certain medicinal plants used by Tharus of Dang- Deokhuri district, Nepal. *Int. J. crude drugs Res.* **23**(4): 153-159.

- Manandhar, N.P. 1986. A contribution to the Ethno-botany of Moosher Tribes of Dhanusha District Nepal. *J. Nat. Hist. Mus.* **10**(2): 53-64.
- Manandhar, N.P. 1987. Traditional medicinal plants used by tribals of Lamjung district, Nepal. *Int. J. Crude Drug, Res.* **25**(4): 236-240.
- Manandhar, N.P. 1988. Ethno veterinary medicinal drugs of central development region of Nepal. *B.M.E.B.R.* **10**(3-4): 93-99.
- Manandhar, N.P. 1989. Medicinal Plants Used by Chepang Tribes of Makawanpur District, Nepal. *Fitoterapia*, **60**(1): 61-68.
- Manandhar, N.P. 1990. Folklore Medicine of Chitawan District, Nepal. *Ethnobotany*. **2**: 31-38.
- Manandhar, N.P. 1991. Medicinal plant-lore of Tamang tribe of Kabhrepalanchok district, Nepal. *Economic Botany*. **45**(1): 58-71.
- Manandhar, N.P. 1992. Folklore medicine of Dhading district, Nepal. *Fitoterapia*. **63**(2): 163-177.
- Manandhar, N.P. 1993. Herbal remedies of Surkhet district, Nepal. *Fitoterapia*. **64**(3): 266-271.
- Manandhar, N.P. 1994. Herbal remedies of Kaski district, Nepal. *Fitoterapia*. **65**(1): 7-12.
- Manandhar, N.P. 1995. An inventory of some herbal drugs of Myagdi district, Nepal. *Economic Botany*. **49**(4): 371-379.
- Manandhar, N.P. 1996. Ethnobotanical Study in Nepal-Conservation of Economically Important Plants by Rural People. In: *Ethnobiology in Human Welfare* (Ed. Jain, S.K.). Deep Publication, India. pp. 30-34.
- Manandhar, N.P. 1998. Native phytotherapy among the Raute tribes of Dadeldhura district, Nepal. *Journal of ethnopharmacology*. **60**: 199-206.
- Manandhar, N. P., 1999. Conservation of medicinal plant in Nepalese forests: problems and perspectives. *Medicinal Plant Conservation*. **5**: 3-4.
- Manandhar, N. P. 2002. *Plants and People of Nepal*. Timber Press, Portland, Oregon.
- Manandhar, L.N. and R.P. Chaudhary. 1992. Medicinal Plants and Traditional Use by Tribal People of Saptari District, Nepal. In: *Proc. First Nat. Bot. Conf.* pp. 33-41.
- Martin, G.J. 1995. *Ethnobotany: A Method Manual*. WWF International, UNESCO, Royal Botanical Garden, Kew, UK.
- MFSC, 2007. *Protected plant species of Nepal: Plant Resource index*. [www.biodivnepal.gov.np/plant-resource.html](http://www.biodivnepal.gov.np/plant-resource.html).
- Moore, P.D. 1994. Trails in Bad Taste. *Nature*. **370**: 410-411.

- Muller-Boker, U. 1993. Ethnobotanical study among the Tharus of Chitwan district. *Journal Nepal Research Centre*. **9**: 17-56.
- Nath, D. 1997. A Survey on Indigenous Medicinal Plants Used for Abortion in Some District of Uttar Pradesh. *Fitoterapia*. **68**(3): 143-159.
- Niraula, K. 2001. *Vegetation Analysis and Ethnobotany of the Medicinal Plants in and Around Tinjure Hill (Terhathum and Sankhuwasabha District, East Nepal)*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Oli, B. 2001. *Local Knowledge of Plant Utilization among the Major Ethnic Communities in the Eastern Churiya, Nepal*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Olson, P. and C. Folke. 2001. Local ecological knowledge and institutional dynamics for ecosystem management: a case study of Lake Racken watershed, Sweden. *Ecosystems*. **4**: 85–104.
- Parajuli, B. 2004. *Ethnobotany and Microbial Activities of Medicinal Plants Used in Diarrhoea and Dysentery in Nawalparasi District, Nepal*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Paudyal, S. 2000. Ethnobotanical study of Royal Chitwan National park: *in approach towards reducing park dependency*. A report submitted to the Department of National park and wildlife conservation. Park people program, Kathmandu.
- Polunin, O. and A. Stainton. 1987. *Flowers of the Himalaya*. Oxford University Press. New Delhi.
- Press, J.R., K.K. Shrestha and D.A. Sutton. 2000. *Annotated Checklist of Flowering Plants of Nepal*. Natural History Museum, London and Central Department of Botany, Tribhuvan University, Kathmandu, Nepal.
- Purohit, S.S. and S.P. Vyas. 2004. *Medicinal plant cultivation: A scientific approach*. Agrobiois, India. pp. 624.
- Rajbhandari, K.R. 1990. A Contribution to the Ethnobotany of Nepal. In: *Abstract Second International Congress of Ethnobiology*, Oct. 21-25, 1990, Kunming, China.
- Rajbhandari, K.R. 1994. Ethnobiological Studies of Northern Nepal. In: *Abstract Fourth International Congress of Ethnobotany*, Lucknow, India, 17-21 Nov. 1994.
- Rajbhandari, K.R. 2001. *Ethnobotany of Nepal*. Ethno-botanical Society of Nepal (ESON).

- Rajbhandary, S. and S. Ranjitkar. 2006. *Herbal drugs and pharmacognosy: Monographs on commercially important medicinal plants of Nepal*. Ethnobotanical Society of Nepal, Kathmandu. pp. 168.
- Rijal, A. 1998. Application of Ethnobotany in Conservation and Community Development. In: *Ethnobotany for Conservation and Community Development* (eds. Shrestha, K.K., P.K. Jha, P. Shenghi, A. Rastogi, S. Rajbhandari, M. Joshi). Proceeding of the National Training Workshop in Nepal, Kathmandu, Nepal. pp. 28-34.
- Shah, N.C. 1986. Main World Centres and Workers of Ethnobotany. In: *A Manual of Ethnobotany* (ed. S.K. Jain). pp. 69-78.
- Shengji, P. 1998. Application of ethnobotany for sustainable management of plant resources. In: *Ethnobotany for Conservation and Community Development* (eds. K.K Shrestha, P.K Jha, P.Shengji, A. Rastogi, S.Rajbhandari, M. Joshi) proceeding of National Training Workshop in Nepal. 6-13 January 1997: 67-72.
- Shrestha, K.K. 1989. Flora and Ethnobotany of Dhading District in Central Nepal. In: *Proceeding of National Conference on Science and Technology*, 24-29 April 1998. Royal Nepal Academy of Science and Technology (RONAST), Kathmandu, Nepal. pp. 400.
- Shrestha, P. 1998. Selected Bibliography of Ethnobotanical Literatures of Nepal. In: *Ethnobotany for Conservation and Community Development* (eds. Shrestha, K.K., P.K. Jha, P.Shengji, A. Rastogi, S.Rajbhandari, M. Joshi), Ethnobotanical Society of Nepal, Kathmandu, Nepal. pp. 101- 144.
- Shrestha, I. and K. Shrestha. 2007. Medicinal and aromatic plants of Langtang National Park, Nepal. In: *National Seminar on Sustainable Use of Biological Resources with the Special Theme: Medicinal and Aromatic Plants*. pp. 40.
- Shrestha, I. and N. Joshi. 1993. Medicinal Plants of Lele Village of Lalitpur District of Nepal. *International Journal of Pharmacognosy*. **31**(2): 130-134.
- Shrestha, K.K., N.N. Tiwari and S.K. Ghimire. 2000. Medicinal and aromatic plants database of Nepal (MAPDON). In: *Proceeding of Nepal-Japan Joint Symposium on Conservation and Utilization of Himalayan Medicinal Plant Resources*. pp. 53-74.
- Shrestha, K.K., P.K. Jha, P.Shengji, A. Rastogi, S.Rajbhandari and M. Joshi (eds.). 1998. *Ethnobotany for Conservation and Community Development*. Ethnobotanical Society of Nepal, Kathmandu, Nepal. pp. 176.



- Shrestha, P. M. and S. S. Dhillion. 2003. Medicinal plant diversity and use in the Highlands of Dolakha District, Nepal. *Ethnopharm.* **86**: 81-96.
- Shrestha, T.B. and R.M. Joshi. 1996. *Rare, Endemic and Endangered Plants of Nepal*. WWF Nepal Program.
- Singh, K.K. and J.K. Maheshwari. 1992. Folk Medicinal Uses of Some Plants among the Tharus of Gorakhpur District, Uttar Pradesh, India. *Ethnobotany*, **4**: 39-43.
- Sivarajan, V.V., and I. Balachandran. 1994. *Ayurvedic drugs and their plant sources*. Oxford and IBH Publishing Co., New Delhi, India.
- Siwakoti, M and S. Siwakoti. 1998. Ethnomedicinal Use of Plants among the Limbu of Morang District, Nepal. *Ecoprint*. **5**(1): 70-84.
- Siwakoti, M and S. Siwakoti. 2000. Ethnobotanical Uses of Plants among the Satar Tribe of Nepal. In: *Ethnobotany and Medicinal Plants of Indian Subcontinent* (ed. Maheshwari, J.K.), Scientific Publisher, India. pp. 99-108.
- Siwakoti, M. and S.K. Varma, 1996. Medicinal plants of the Terai of eastern Nepal. *J. Econ. Taxon. Bot.* Additional Series, 12. Scientific publisher, Jodhpur (India). pp. 423-438.
- Stainton, A. 1988. *Flowers of the Himalayas, a Supplement*. Oxford, Press, New Delhi.
- Thapa, N. 2006. *Ethnobotany and Biodiversity Conservation: A Sustainable Livelihood Among the Tamangs*. Sudeepa Publications, Kathmandu, Nepal.
- Thapa, R.H. 2000. *Ethnobotanical Study of Danuwar Tribe in Lalitpur District, Nepal*. M. Sc. Dissertation, Central Department of Botany, Tribhuvan University, Kirtipur, Kathmandu.
- Thapa, S. 2001. *Documentation of Traditional Uses of Plants by Tharu Community around Royal Shukla-Phanta Wildlife Reserve, Far-western Nepal*. M. Sc. Dissertation, Central Department of Botany, Kirtipur, Kathmandu.
- Tiwari, N.N. and M.P. Joshi. 1990a. Medicinal plants of Nepal. *JNMA*. **28**: 221-232.
- Tiwari, N.N. and M.P. Joshi. 1990b. Medicinal plants of Nepal. *JNMA*. **28**: 226-279.
- Tiwari, S., B. Adhikari, M. Siwakoti and K. Subedi. 2005. *An inventory and Assessment of Invasive Alien plant species of Nepal*. IUCN- The world conservation union Nepal. **8**: 116.
- Trotter, R. T. and M. H. Logan. 1986. Informant consensus: A new approach for identifying potentially effective medicinal plants. In: *N.L. Etkin, ed. Plants in Indigenous Medicine and Diet*. Redgrave Publishing Company. Bedford Hill, New York. pp. 91-112.

- Treyvaud Amiguet, V., J.T. Arnason, P. Maquin, V. Cal, P.S. Vindas and L. Poveda. 2005. A consensus ethnobotany of the Q'eqchi' Maya of Southern Belize. *Economic Botany*. **59**(1): 29-42.
- Yadav, S. 2008. *Popularly Used Medicinal Plants by Tamang Ethnic Group at Three VDCs (Chilime, Thuman and Gatlang) of Rasuwa District*. M. Sc. Dissertation, Central Department of Botany, Kirtipur, Kathmandu.

## APPENDICES

### Appendix I: Climatic Data of Simari

#### 1. Precipitation

Month	2003	2004	2005
Jan	51.0	58.0	27.5
Feb	42.0	0.0	23.5
Mar	65.5	0.0	22.0
Apr	15.5	98.5	0.0
May	452.5	208.5	0.0
Jun	60.0	235.0	153.0
Jul	733.0	495.0	420.0
Aug	696.5	386.5	662.5
Sep	172.5	204.5	163.0
Oct	38.5	158.0	414.0
Nov	0.0	16.5	0.0
Dec	0.0	0.0	0.0

#### 2. Temperature

Month	T max			T min		
	2003	2004	2005	2003	2004	2005
Jan	15.8	18.7	23.7	8.0	6.7	8.5
Feb	24.5	25.7	24.9	10.6	9.8	10.4
Mar	28.7	32.6	31.8	13.9	18.8	14.4
Apr	35.7	35.5	37.4	23.5	22.5	26.2
May	34.6	36.3	40.1	23.0	23.2	29.3
Jun	37.4	34.7	39.3	23.7	25.1	24.7
Jul	34.1	33.6	35.0	25.0	25.4	24.5
Aug	33.2	34.4	34.9	26.0	25.8	23.9
Sep	33.5	33.9	34.3	24.5	24.1	26.0
Oct	32.5	30.7	33.0	20.3	18.6	20.4
Nov	28.3	28.4	27.2	14.5	12.7	13.6
Dec	22.2	24.5	22.3	8.3	10.4	10.1

#### 3. Relative humidity

Month	08:45			17:45		
	2003	2004	2005	2003	2004	2005
Jan	95.9	87.7	90.6	93.3	87.6	84.9
Feb	87.5	84.3	86.1	84.4	81.4	75.4
Mar	76.3	79.2	73.7	78.0	77.0	70.4
Apr	72.4	78.6	56.2	78.8	83.9	66.9
May	71.7	72.2	45.4	73.8	74.9	63.0
Jun	68.5	80.0	68.0	62.4	72.0	67.9
Jul	79.5	79.5	68.9	83.6	84.7	65.1
Aug	84.3	78.0	77.9	85.1	77.0	75.7
Sep	86.6	83.0	79.4	88.4	83.2	83.1
Oct	82.1	79.7	85.8	85.7	77.6	86.3
Nov	82.8	81.3	88.3	75.0	81.1	88.4
Dec	85.6	89.5	92.6	88.3	86.4	91.1

## Appendix II: Ethnic/Caste group composition.

Ethnic/Caste Group	Number	Percentage	Ethnic/Caste Group	Number	Percentage
Magar	2716	31.89	Kumal	641	7.53
Brahman	1702	19.98	Damai	262	3.08
Chhetri	844	9.91	Newar	231	2.71
Kami	725	8.51	Gurung	129	1.51
Tharu	689	8.09			

## Appendix III: Total plants used by eight ethnic/ caste group for different purposes

Ethnic/caste group		Medicinal	Edible	Fodder	Fuel wood	Cultural	Handicraft	Furniture	Fish Poisoning	Marc ha	Miscellaneous	Oil Extract	Alcohol
Brahman	Number	141	63	84	51	19	10	11	4	3	5	3	4
	Percentage	82.94	37.06	49.41	30	11.18	5.88	6.47	2.35	1.76	2.94	1.76	2.35
Chhetri	Number	114	72	94	59	21	11	9	4	4	9	5	3
	Percentage	67.06	42.35	55.29	34.71	12.35	6.47	5.29	2.35	2.35	5.29	2.94	1.76
Tharu	Number	126	75	109	64	21	15	10	13	13	4	6	8
	Percentage	74.12	44.12	64.12	37.65	12.35	8.82	5.88	7.65	7.65	2.35	3.53	4.71
Magar	Number	118	45	79	51	11	12	8	6	4	1	2	0
	Percentage	69.41	26.47	46.47	30	6.47	7.06	4.71	3.53	2.35	0.59	1.18	0
Newar	Number	90	55	76	44	14	13	3	5	6	4	2	0
	Percentage	52.94	32.35	44.71	25.88	8.24	7.65	1.76	2.94	3.53	2.35	1.18	0
Kumal	Number	98	61	85	53	7	11	6	4	7	3	3	0
	Percentage	57.65	35.88	50	31.18	4.12	6.47	3.53	2.35	4.12	1.76	1.76	0
Dalit	Number	145	56	71	53	8	11	7	7	4	3	2	2
	Percentage	85.29	32.94	41.76	31.18	4.71	6.47	4.12	4.12	2.35	1.76	1.18	1.18
Gurung	Number	86	45	79	51	11	12	8	6	4	1	2	0
	Percentage	50.59	26.47	46.47	30	6.47	7.06	4.71	3.53	2.35	0.59	1.18	0

## Appendix IV: Medicinal plant species used for common disease/disorder among the eight ethnic/caste groups

No.	Plant Names	Diseases	Br.	Ch.	Th.	Mg.	Nw.	Ku.	Da.	Gr.	EG (No.)
1	<i>Abrus precatorius</i> L.	Burning sensation of chilli	0	0	0	0	0	0	0	1	1
		Eye defect	0	0	0	0	0	1	1	0	2
		Gonorrhoea	0	1	0	0	0	0	0	0	1
		Cooling agent	0	1	0	0	0	0	1	0	2
		Retention of urine	1	0	1	1	0	0	0	0	3
2	<i>Acacia catechu</i> (L. f.) Willd.	Cough	0	0	0	0	0	0	1	0	1
		Cuts	0	1	0	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Cooling agent	0	0	1	1	0	0	0	0	2
		Increase energy	1	0	0	0	0	0	0	0	1
		Inner hurts	0	0	1	0	0	0	0	0	1
		Sprain	0	0	1	0	0	1	0	0	2
3	<i>Achyranthes bidentata</i> Blume	Anorexia	0	1	1	1	1	0	0	1	5
		Boils	0	1	0	0	0	0	1	0	2
		Fever	0	0	1	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1

		Menstruation disorder	1	0	0	0	0	0	0	0	1
		Psycho disorder	0	0	1	0	0	0	0	0	1
		Retention of placenta	0	0	1	0	0	0	0	0	1
		Vomiting	0	0	0	1	0	0	0	0	1
		Wound	0	1	0	0	0	0	1	0	2
4	<i>Acorus calamus</i> L.	Body pain	0	0	0	0	0	0	0	1	1
		Child sickness	0	0	0	0	0	0	1	0	1
		Cold	1	1	1	1	0	1	0	0	5
		Cough	1	1	1	1	1	1	0	0	6
		Pneumonia	0	0	0	1	0	0	0	0	1
		Throat pain	0	0	0	0	0	0	1	0	1
5	<i>Aegle marmelos</i> (L.) Correa	Cold	0	0	0	1	0	0	0	1	2
		Cough	0	0	0	1	0	0	0	0	1
		Diarrhoea	0	0	1	0	0	0	0	0	1
		Gastritis	1	1	0	1	0	0	1	0	4
		Headache	0	0	1	0	0	0	0	0	1
		Cooling agent	0	1	0	1	1	1	1	0	5
6	<i>Aloe vera</i> (L.) Burm. f.	Burns	1	1	1	1	1	1	1	1	8
		Headache	0	1	0	0	0	0	0	1	2
		Cooling agent	1	1	1	1	1	0	1	1	7
7	<i>Alstonia scholaris</i> (L.) R. Br.	Abortion	0	1	1	1	1	0	1	0	5
		Anorexia	0	0	0	1	0	0	0	1	2
		Boils	1	0	0	0	0	0	0	0	1
		Chestpain	0	0	1	1	0	0	0	0	2
		Gastritis	1	0	0	1	0	0	0	0	2
		Infertility	0	0	1	1	0	0	0	0	2
		Marasmus	0	0	0	0	0	1	0	0	1
8	<i>Amaranthus spinosus</i> L.	Gonorrhoea	0	0	1	1	0	1	1	0	4
		Cooling agent	1	1	0	0	1	0	1	0	4
		Retention of urine	0	0	0	0	0	0	0	1	1
		Sprain	1	0	0	0	0	0	0	0	1
		Swelling	1	0	0	0	0	0	0	0	1
		Vomiting	0	0	1	0	0	0	0	0	1
9	<i>Amarathus</i> sp.	Gonorrhoea	1	1	1	1	1	1	1	1	8
		Retention of urine	0	0	1	0	0	0	0	0	1
10	<i>Ananas comosus</i> (L.) Merr.	Fever	0	1	1	0	0	0	1	0	3
		Cooling agent	1	1	1	1	1	1	1	1	8
		Weakness	0	0	1	0	0	0	0	0	1
11	<i>Annona squamata</i> L.	Cooling agent	0	1	0	0	0	0	0	0	1
12	<i>Anthocephalus chinensis</i> (Lam.) A. Rich. ex Walp.	Abortion	0	0	0	1	0	0	0	0	1
13	<i>Antidesma bunius</i> (L.) Spreng.	Fever	0	0	0	0	0	1	0	0	1
		Gastritis	0	0	1	0	0	0	1	0	2
		Typhoid	0	0	0	1	0	0	0	0	1
14	<i>Areca catechu</i> L.	Dental carries	0	0	0	0	0	0	1	0	1
		Ring worm	0	0	0	1	0	0	0	0	1
		Typhoid	1	0	0	0	0	0	0	0	1
		Wound	1	1	0	1	1	0	0	1	5
15	<i>Artemisia indica</i> Willd.	Anorexia	1	0	0	0	0	0	0	0	1
		Asthma	0	0	0	1	0	0	0	0	1
		Boils	0	1	1	1	0	0	1	0	4
		Cuts	0	1	0	0	0	0	0	0	1
		Fever	1	0	0	0	0	0	0	0	1
		Gastritis	1	0	0	0	1	0	1	1	4
		Heart pain	0	0	0	0	0	0	1	0	1
		Cooling agent	0	0	0	0	0	1	0	0	1
		Insecticide	0	0	1	1	0	0	0	0	2
		Scabies	1	1	0	0	0	0	1	0	3
		Waist pain	0	1	0	0	0	0	0	0	1
		Wound	0	0	1	1	0	0	1	0	3
16	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Boils	1	0	0	0	1	1	1	0	4
		Gastritis	0	0	0	0	0	0	1	0	1
		Mumps	0	1	1	1	0	0	0	0	3
		Swelling	1	0	0	0	0	0	0	0	1
		Toothache	1	0	0	0	0	0	0	1	2
		Wound	0	0	0	1	0	0	1	0	2
17	<i>Asparagus racemosus</i> Willd.	Breast engorged	1	0	0	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1

		Cooling agent	0	0	0	0	0	0	0	1	1
		Production of more milk	1	1	1	0	1	1	1	0	6
		Stomach pain	1	0	0	0	0	0	0	0	1
18	<i>Azadirachta indica</i> A. Juss.	Anorexia	0	0	0	1	0	0	0	0	1
		B.P. High	0	0	0	0	0	0	1	0	1
		Black dandruff on face	0	0	0	1	0	0	0	0	1
		Boils	0	0	1	1	0	0	1	0	3
		Burns	0	0	0	1	0	0	0	0	1
		Cold	0	1	0	0	0	1	0	0	2
		Cough	0	1	0	0	0	0	0	0	1
		Fever	1	1	1	1	1	0	1	1	7
		Headache	0	0	0	0	0	0	0	1	1
		Cooling agent	1	0	0	1	1	1	0	0	4
		Leprosy	0	0	1	0	0	0	0	0	1
		Malaria	0	0	0	0	1	0	0	0	1
		Worm infestation	1	0	0	0	0	0	0	0	1
		Wound	0	0	1	1	0	0	1	0	3
19	<i>Baccharoides anthelmintica</i> (L.) Moench.	Child sickness	0	0	0	0	0	1	1	0	2
		Fever	0	1	1	0	0	0	1	0	3
		Pneumonia	0	0	0	1	0	0	0	0	1
		Stomach pain	1	0	0	0	0	0	0	0	1
		Typhoid	0	0	0	0	0	0	1	0	1
		Worm infestation	0	0	0	0	1	0	0	0	1
		Wound	0	0	0	0	0	0	1	0	1
20	<i>Bauhinia purpurea</i> L.	Gastritis	1	0	0	0	0	0	1	0	2
		Stomach pain	0	0	0	1	0	0	0	0	1
21	<i>Bauhinia scandens</i> var. <i>horsfieldii</i> (Miq.) H. Ohashi	Weakness	1	0	0	0	0	0	0	0	1
22	<i>Bauhinia vahlii</i> Wight & Arn.	Boils	0	0	1	0	0	0	0	0	1
		Dysentery	0	0	0	0	0	0	1	0	1
		Gastritis	1	1	0	0	0	0	1	0	3
		Typhoid	0	0	0	0	0	0	1	0	1
		Wound	0	0	1	0	0	1	0	0	2
23	<i>Bauhinia variegata</i> L.	Diarrhoea	0	0	0	0	0	0	0	1	1
		Gastritis	1	0	0	0	0	0	1	0	2
24	<i>Begonia Picta</i> Sm.	Mud wound	1	0	1	1	0	0	1	1	5
25	<i>Blumea hieraciifolia</i> (D. Don) DC.	Abdominal pain	0	0	0	0	1	0	0	0	1
		Anorexia	1	1	0	1	0	0	1	0	4
		Gastritis	1	1	0	0	0	0	1	0	3
		Throat pain	0	0	1	0	0	0	0	0	1
26	<i>Blumea lacera</i> (Burm. f.) DC.	Cooling agent	0	0	0	0	0	0	1	0	1
27	<i>Boerhavia diffusa</i> L.	Asthma	0	0	0	0	0	1	0	0	1
		Cough	0	0	0	0	0	1	0	0	1
		Eye defect	0	0	0	1	0	0	0	0	1
28	<i>Bombax ceiba</i> L.	Gastritis	0	0	0	0	0	0	1	0	1
		Gonorrhoea	1	1	1	1	0	0	0	1	5
		Cooling agent	1	1	1	0	1	1	1	0	6
		White urine	0	0	0	1	0	0	0	0	1
29	<i>Caesalpinia decapetala</i> (Roth) Alston	Ring worm	1	1	1	1	1	1	1	1	8
30	<i>Calamus</i> sp.	Gastritis	0	0	0	0	0	0	1	0	1
		Cooling agent	0	0	0	0	0	0	1	0	1
		Hot and cold	0	0	0	0	0	0	0	1	1
31	<i>Callicarpa macrophylla</i> Vahl	Fever	1	0	1	0	0	0	0	0	2
		Cooling agent	0	1	0	0	0	0	0	0	1
		Stomatitis	1	1	0	0	1	1	1	0	5
		Throat boils	0	1	0	0	0	0	1	0	2
		Throat pain	0	0	0	0	0	0	1	1	2
		Typhoid	0	1	1	1	0	0	1	0	4
32	<i>Calotropis gigantea</i> (L.) Dryand.	Boils	0	0	1	0	0	1	0	0	2
		Coryza	0	1	0	0	1	0	1	0	3
		Cuts	1	0	0	0	0	0	0	0	1
		Sprain	1	1	1	1	1	1	1	1	8
		Wound	0	0	0	0	0	1	0	0	1
33	<i>Cannabis sativa</i> L.	Cold	1	1	1	0	0	1	1	1	6
		Diarrhoea	0	0	0	0	1	0	0	0	1
		Swelling	0	0	1	1	0	0	0	0	2
34	<i>Carica papaya</i> L.	Gastritis	1	0	0	0	0	0	0	0	1

		Cooling agent	1	1	1	1	1	1	1	1	8
		Jaundice	1	1	1	0	1	0	0	1	5
		Ring worm	0	0	0	0	0	0	1	0	1
		Toothache	0	1	0	0	0	0	0	0	1
		Ulcer	1	0	0	0	0	0	0	0	1
35	<i>Cascabela thevetia</i> (L.) Lippold	Boils	0	0	0	0	0	0	1	0	1
		Mumps	0	0	1	0	0	0	0	0	1
36	<i>Cassia fistula</i> L.	Dysentery	0	0	1	0	0	0	0	0	1
		Cooling agent	1	1	1	0	1	0	0	1	5
		Intestinal obstruction	1	0	0	0	0	1	1	0	3
		Mud wound	0	0	0	1	0	0	0	0	1
		Retention of urine	1	1	0	1	1	0	1	0	5
		Ring worm	0	0	0	1	0	0	0	1	2
37	<i>Catunaregam uliginosa</i> (Retzius) V.V Sivarajan.	Allergy	0	0	1	0	0	0	0	0	1
		Diarrhoea	0	0	1	0	0	0	0	0	1
		Mud wound	0	1	0	1	0	0	0	0	2
38	<i>Centella asiatica</i> (L.) Urb.	Child sickness	0	0	0	0	0	0	1	0	1
		Headache	0	0	0	0	0	0	0	1	1
		Cooling agent	1	1	1	1	1	1	1	0	7
39	<i>Cheilanthes anceps</i> Blanford	Coryza	0	0	0	0	0	0	1	0	1
		Fever	0	0	1	0	0	0	0	0	1
		Gastritis	1	0	0	0	0	0	1	1	3
		Lower abdominal pain	1	0	0	0	0	0	0	0	1
		Retention of urine	0	1	0	0	0	0	0	0	1
		Wound	0	0	0	0	0	1	0	0	1
40	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Cholera	0	0	0	1	0	0	0	0	1
		Diarrhoea	0	1	0	0	0	0	0	0	1
		Gastritis	1	0	1	0	1	0	0	0	3
		Headache	0	0	0	0	0	0	1	0	1
		Cooling agent	0	0	0	0	0	0	0	1	1
		Hyperplasia of spleen	0	0	0	0	0	0	1	0	1
		Increase weight	0	0	1	1	0	0	0	0	2
		Worm infestation	0	1	0	0	0	0	0	0	1
41	<i>Cissampelos pareira</i> L.	Bleeding (woman)	0	1	0	0	0	0	0	0	1
		Cold	0	0	1	0	0	0	0	0	1
		Cough	0	0	1	0	0	0	0	0	1
		Fever	0	0	1	0	0	0	0	0	1
		Gastritis	1	1	1	1	1	1	1	0	7
42	<i>Cissus repens</i> Lam.	Wound	0	0	1	0	0	0	0	0	1
43	<i>Citrus aurantifolia</i> (Christ.) Swingle	Anorexia	0	1	0	0	0	0	0	0	1
		Cough	0	0	0	0	0	1	0	1	2
		Headache	0	1	1	1	1	0	1	0	5
		Cooling agent	1	1	0	0	0	0	1	1	4
		Mud wound	0	0	0	0	0	1	0	0	1
		Running nose	0	0	0	0	0	0	0	1	1
44	<i>Citrus limon</i> (L.) Burn. f.	Anorexia	0	0	0	1	0	0	0	0	1
		Cough	0	0	0	0	0	0	0	1	1
		Cooling agent	1	1	0	0	0	0	0	0	2
		Mud wound	0	0	1	0	0	1	0	0	2
		Running nose	0	0	0	0	0	0	0	1	1
		Sprain	0	0	0	0	0	0	1	0	1
45	<i>Citrus maxima</i> (Burm.) Merrill	Cuts	1	0	0	0	0	0	0	0	1
		Cooling agent	1	0	0	0	0	0	0	0	1
46	<i>Citrus medica</i> L.	Body pain	1	0	0	0	0	0	0	0	1
		Coryza	0	0	0	0	0	0	1	0	1
		Gastritis	1	0	0	0	0	0	0	0	1
47	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Cold	0	1	0	0	0	0	0	0	1
		Coryza	1	0	1	1	1	1	1	0	6
		Dysentery	0	0	1	1	0	0	0	0	2
		Gastritis	0	0	0	0	0	0	1	0	1
		Headache	1	0	0	0	0	0	0	0	1
		Running nose	0	0	0	0	0	0	0	1	1
48	<i>Cocos nucifera</i> L.	Back bone pain	0	0	0	0	0	0	1	0	1
		Gonorrhoea	1	0	0	0	0	0	0	0	1

		Cooling agent	1	1	0	1	0	0	0	0	3
49	<i>Coffea arabica</i> L.	Cold	1	0	0	0	0	0	0	0	1
		Cough	0	0	0	0	0	0	0	1	1
50	<i>Colebrookea oppositifolia</i> Sm.	Boils	0	0	0	1	0	0	0	0	1
		Cataract	0	1	0	0	1	0	0	1	3
		Coryza	0	0	0	0	0	0	1	0	1
		Fish poisoning	0	0	1	0	0	0	0	1	2
		Gastritis	1	0	0	0	0	0	0	0	1
51	<i>Colocasia esculenta</i> (L.) Schott	Boils	0	0	0	1	0	0	0	0	1
		Dysentery	0	0	0	0	0	0	1	0	1
52	<i>Costus speciosus</i> (J. Konig.) Sm.	Gastritis	1	0	0	1	0	0	1	0	3
		Cooling agent	0	0	0	1	0	1	0	0	2
		Swelling	0	0	1	0	0	0	0	0	1
53	<i>Curculigo orchoides</i> Gaertn.	Increase energy	0	1	1	0	0	0	0	0	2
		Pneumonia	1	0	0	0	0	0	0	0	1
54	<i>Curcuma caesia</i> Roxb.	Anorexia	0	0	0	0	1	0	0	1	2
		B.P. High	0	1	0	0	0	0	0	0	1
		Gastritis	1	1	1	1	1	1	1	0	7
		Sprain	0	0	1	1	1	0	1	0	4
		Wound	0	0	0	1	0	0	0	0	1
55	<i>Cuscuta reflexa</i> Roxb.	Anorexia	0	0	0	0	0	0	0	1	1
		Conjunctivitis	0	0	0	0	0	1	0	0	1
		Fever	0	0	0	0	0	0	1	0	1
		Cooling agent	0	0	0	0	0	0	0	1	1
		Jaundice	0	1	1	1	1	1	1	0	6
		Skin Disease	1	0	0	0	0	0	0	0	1
		Wound	0	0	0	0	0	0	1	0	1
56	<i>Cymbopogon citratus</i> (DC.) Stapf.	Gastritis	1	0	0	0	0	0	1	0	2
57	<i>Cyperus rotundus</i> L.	Diarrhoea	0	0	1	0	0	1	0	0	2
		Cooling agent	0	0	0	0	0	0	1	0	1
		Weakness	0	0	1	0	0	1	0	0	2
58	<i>Datura metel</i> L.	Anorexia	0	0	0	0	0	0	1	0	1
		Cold	0	0	0	0	0	0	0	1	1
		Red urine	0	0	0	0	0	0	1	0	1
		Swelling	0	0	1	0	0	0	0	0	1
		Worm infestation	0	0	1	0	0	0	0	0	1
59	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	Fever	0	0	0	0	1	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Pneumonia	0	0	0	0	1	0	0	0	1
		Wound	1	0	0	0	0	0	0	0	1
60	<i>Desmodium concinnum</i> DC.	Fish poisoning	0	0	1	1	1	1	1	0	5
		Throat pain	1	0	0	0	0	0	0	0	1
61	<i>Desmostachya bipinnata</i> (L.) Stapf	Conjunctivitis	0	0	1	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Cooling agent	0	1	0	0	0	0	1	0	2
		Swelling	0	0	1	0	0	0	0	0	1
		Worm infestation	1	0	0	1	1	1	0	0	4
62	<i>Dillenia pentagyna</i> Roxb.	Gastritis	0	0	0	0	0	0	1	0	1
63	<i>Dioscorea bulbifera</i> L.	Diphtheria	0	0	0	0	1	0	0	0	1
		Worm infestation	1	0	1	1	0	1	1	1	6
64	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam	Burns	0	0	0	0	1	0	0	0	1
		Fish poisoning	0	0	1	0	1	0	0	1	3
		Worm infestation	0	0	0	0	0	0	0	1	1
		Wound	0	0	0	0	0	1	0	0	1
65	<i>Dipsacus inermis</i> Wall.	Anorexia	1	0	0	0	0	0	0	0	1
		Being fat	0	1	1	0	0	1	1	0	4
		Gastritis	1	0	0	1	0	0	0	0	2
		Marasmus	1	0	0	0	0	0	0	0	1
66	<i>Eclipta prostrata</i> (L.) L.	Cuts	1	0	0	0	0	0	1	0	2
		Cooling agent	1	0	0	0	0	0	0	0	1
		Mud wound	0	1	0	0	1	0	1	0	3
		Pneumonia	1	0	1	1	0	0	1	0	4
		Syphilis	0	0	0	0	0	1	0	0	1
		Typhoid	0	0	0	1	0	0	0	0	1
		Wound	0	0	0	0	0	0	0	1	1
67	<i>Elephantopus scaber</i> L.	Anorexia	0	0	0	0	1	0	0	0	1
		Fever	1	0	0	0	0	0	0	0	1
		Gastritis	1	0	1	1	0	1	0	0	4
		Indigestion	0	1	0	0	0	0	0	0	1



		Sickness of domestic animal	0	0	0	0	0	0	1	0	1
		Worm infestation	0	1	0	0	0	0	0	0	1
68	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	Asthma	0	0	0	0	0	0	1	0	1
		Coryza	0	0	0	0	0	0	1	0	1
		Gastritis	0	0	1	0	0	0	1	0	2
		Uterus prolapse	1	0	0	0	0	0	0	0	1
69	<i>Euphorbia hirta</i> L.	Burning sensation of chilli	0	0	0	0	0	0	0	1	1
		Cataract	1	1	1	1	1	1	0	0	6
		Cuts	1	0	0	0	1	0	1	0	3
		Dysentery	0	0	0	0	0	0	1	0	1
		Snake bite	0	1	0	0	0	1	0	0	2
		Wound	0	0	0	0	0	0	0	1	1
70	<i>Euphorbia royleana</i> Boiss.	Anorexia	1	0	0	1	1	0	1	1	5
		Boils	0	1	0	0	0	0	0	0	1
		Cataract	0	0	1	0	0	1	0	0	2
		Cooling agent	0	0	0	1	0	0	0	0	1
		Otitismedia	0	0	0	1	0	0	0	0	1
		Sprain	0	0	0	0	0	0	1	0	1
		Tetanus	0	0	0	1	0	0	0	0	1
		Toothache	0	1	0	0	0	0	0	0	1
		Worm infestation	0	0	1	0	1	0	0	0	2
71	<i>Ficus benghalensis</i> L.	Back bone pain	0	0	0	0	1	0	0	0	1
		Diarrhoea	0	1	0	0	0	0	0	0	1
		Dysentery	0	0	0	0	1	0	0	0	1
		Gingivitis	0	1	0	0	0	0	0	0	1
		Infertility	1	0	0	0	0	0	0	0	1
		Pterygium	0	0	1	0	0	0	1	0	2
		Tooth srtrong	0	1	0	0	0	0	0	0	1
		Toothache	0	1	0	0	0	0	1	0	2
		Wound	0	0	1	0	0	0	0	0	1
72	<i>Ficus benjamina</i> L.	Gastritis	0	0	0	0	0	0	1	0	1
73	<i>Ficus hispida</i> L.f.	Otitismedia	0	0	0	0	0	0	0	1	1
		Retention of placenta	0	0	1	1	0	0	0	0	2
		Swelling	0	0	0	1	0	0	0	0	1
		Worm infestation	0	0	1	1	0	0	0	0	2
74	<i>Ficus racemosa</i> L.	Asthma	0	0	0	0	0	1	0	0	1
		Child sickness	0	0	0	0	1	0	0	0	1
		Dysentery	0	0	1	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Cooling agent	1	0	0	0	0	0	0	0	1
		Jaundice	0	0	0	1	0	0	0	0	1
75	<i>Ficus religiosa</i> L.	Gastritis	0	0	0	0	0	0	1	0	1
		Preliminary deafness	0	0	1	0	0	0	0	0	1
		Tumour formation	0	0	1	1	0	1	1	0	4
76	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.	Dysentery	0	0	0	0	0	0	1	0	1
		Cooling agent	0	0	0	0	0	0	0	1	1
		Jaundice	0	0	0	1	0	0	0	0	1
		Retention of placenta	0	0	0	0	0	0	1	0	1
77	<i>Flemingia macrophylla</i> (Willd.) Merr.	Anorexia	1	0	0	0	0	0	0	0	1
		Bleeding (woman)	0	0	1	0	0	0	0	0	1
		Gastritis	0	0	1	0	0	0	0	0	1
78	<i>Grewia subinaequalis</i> DC.	Diarrhoea	0	0	1	0	0	0	0	0	1
79	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.	Child sickness	0	0	0	0	0	0	1	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
80	<i>Hibiscus rosa-sinensis</i> L.	Dysentery	0	1	0	0	0	1	1	0	3
		Cooling agent	0	0	0	0	0	0	1	0	1
		Menstruation disorder	0	0	1	1	1	0	0	0	3
		Typhoid	1	0	0	0	0	0	0	0	1
81	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Anorexia	0	0	0	0	0	0	0	1	1
		Arthritis	0	0	0	0	1	0	0	0	1
		Fever	0	1	0	0	0	0	0	0	1

		Fish poisoning	0	0	0	0	0	0	1	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Typhoid	0	0	0	0	1	0	0	0	1
		Worm infestation	0	0	1	0	0	0	0	0	1
82	<i>Imperata cylindrica</i> (L.) P. Beauv.	Cold	0	0	0	0	0	0	1	0	1
		Joint pain	0	0	0	0	0	0	1	0	1
		Mud wound	0	0	1	1	0	0	0	0	2
		Worm infestation	1	1	0	1	1	1	1	1	7
83	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Asthma	0	1	0	0	0	0	0	0	1
		Fever	0	1	0	0	0	0	0	0	1
		Flowing out of black blood	0	0	0	1	0	0	0	0	1
		Gastritis	0	0	1	0	0	0	1	0	2
		Menstruation disorder	0	0	1	1	0	0	0	0	2
		Pneumonia	1	0	0	0	0	0	0	0	1
		Vomiting with blood	0	0	0	0	0	1	0	0	1
		Waist pain	0	0	0	0	0	0	1	0	1
84	<i>Inula cappa</i> (Buch.-Ham. ex D. Don) DC.	Gastritis	0	0	0	0	0	0	1	0	1
		Pneumonia	1	0	0	0	0	0	0	0	1
85	<i>Jatropha curcus</i> L.	Anorexia	0	0	0	1	0	0	0	0	1
		Back bone pain	0	0	1	1	0	0	0	0	2
		Burns	0	0	0	1	0	0	0	1	2
		Cuts	0	0	0	0	0	0	0	1	1
		Gingivitis	0	1	1	1	0	0	1	0	4
		Mud wound	0	1	0	1	0	0	1	1	4
		Pneumonia	1	0	0	0	0	0	0	0	1
		Sprain	1	0	0	0	0	0	0	0	1
		Stomatitis	0	0	1	0	0	0	0	0	1
		Toothache	1	0	1	1	0	0	0	0	3
		Whitening of tongue	0	0	0	0	0	1	0	0	1
86	<i>Justicia adhatoda</i> L.	Anorexia	0	0	0	0	0	0	0	1	1
		Asthma	0	0	0	0	0	0	1	0	1
		Child sickness	0	0	0	0	0	0	0	1	1
		Cough	0	0	1	0	1	0	0	0	2
		Fever	1	1	0	0	1	0	1	0	4
		Cooling agent	1	0	0	0	0	0	0	0	1
		Pneumonia	0	1	1	0	0	0	0	0	2
		Sugar	1	0	0	0	0	0	0	0	1
		Swelling	0	0	0	1	0	0	1	0	2
87	<i>Kaempferia rotunda</i> L.	Anorexia	0	0	0	0	0	0	0	1	1
		Dizziness	0	1	0	0	0	0	0	0	1
		Fracture	0	0	0	0	0	0	1	0	1
		Gastritis	0	0	1	0	0	0	0	0	1
		Headache	0	1	0	0	0	0	0	0	1
		Sprain	1	0	0	1	0	0	0	0	2
		Swelling	1	0	0	0	0	0	0	0	1
88	<i>Lagerstroemia parviflora</i> Roxb.	Diarrhoea	0	0	0	1	0	0	0	0	1
		Dysentery	0	0	1	0	0	0	1	0	2
		Gastritis	0	0	0	0	0	0	0	1	1
89	<i>Lannea coromandelica</i> (Houtt.) Merr.	Cuts	0	0	1	1	0	1	0	0	3
		Dysentery	0	0	0	0	0	0	1	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
90	<i>Lawsonia inermis</i> L.	Dandruff	1	1	0	0	0	0	0	0	2
		Headache	0	1	0	1	1	1	0	0	4
		Cooling agent	0	0	0	0	1	0	0	0	1
		Jaundice	0	1	0	0	0	0	0	0	1
		Mud wound	0	1	0	0	0	0	0	1	2
91	<i>Lygodium flexuosum</i> (L.) SW.	Harphzoster	1	1	0	1	0	0	1	0	4
92	<i>Lyonia ovalifolia</i> (Wallich) Drude	Animal poison	1	0	0	0	1	1	0	0	3
		Scabies	1	1	0	1	1	0	1	0	5
93	<i>Mallotus philippensis</i> (Lam.) Mull.	Diarrhoea	0	0	0	1	0	0	0	0	1
		Dysentery	0	0	1	0	0	0	0	0	1
		Fever	1	0	0	0	0	0	0	0	1
		Gastritis	1	0	0	0	0	0	1	1	3

94	<i>Mangifera indica</i> L.	Tapeworm	0	1	0	0	0	0	0	0	1		
		Jaundice	0	0	1	0	0	0	0	0	0	1	
		Bad smelling of child	0	0	0	0	0	1	0	0	0	1	
		Diarrhoea	0	1	1	0	0	0	0	0	0	2	
		Gastritis	1	1	0	0	0	0	1	1	1	4	
		Cooling agent	0	0	1	1	1	0	0	0	0	3	
95	<i>Maoutia puya</i> (Hook.) Wedd.	Gonorrhoea	1	0	0	0	0	0	0	0	1		
		Cooling agent	0	0	0	0	0	1	0	0	1		
96	<i>Melia azedarach</i> L.	Gastritis	1	0	0	0	0	0	0	0	1		
		Gonorrhoea	0	1	0	0	0	0	0	0	1		
		Worm infestation	1	0	0	0	0	0	0	1	2		
97	<i>Mentha</i> sp.	Cold	0	1	0	1	0	0	0	0	2		
		Cough	0	1	0	0	0	0	0	0	1		
		Diarrhoea	0	0	0	0	0	0	1	0	1		
		Fever	1	0	0	0	0	0	0	0	1		
		Headache	0	1	1	0	1	0	0	0	3		
		Cooling agent	1	0	0	0	0	0	0	0	1		
		Pneumonia	1	0	0	0	0	0	0	0	1		
		Stomach pain	1	0	0	0	0	0	0	0	1		
		98	<i>Mentha spicata</i> L.	Gastritis	0	0	0	0	0	0	1	0	1
				Cooling agent	1	1	1	1	1	1	1	1	8
Insomnia	0			0	1	1	0	0	0	0	2		
99	<i>Mimosa pudica</i> L.	Anorexia	1	0	0	0	0	0	0	1	2		
		Child sickness	0	0	0	1	0	1	1	0	3		
		Dysentery	0	0	1	0	0	0	0	0	1		
		Fever	1	0	0	0	0	0	0	0	1		
		Gastritis	0	1	0	0	0	0	1	0	2		
		Cooling agent	0	0	0	0	0	0	1	0	1		
		Insomnia	0	0	0	0	0	0	1	0	1		
		Night blindness	0	0	1	0	0	0	0	0	1		
		Stomach pain	1	0	0	0	0	0	0	0	1		
100	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Boils	0	1	1	0	0	0	0	0	2		
		Burns	0	0	0	1	0	1	0	0	2		
		Fish poisoning	0	0	0	0	0	0	0	1	1		
		Fracture	1	0	0	0	1	0	0	0	2		
		Gastritis	0	0	0	0	0	0	1	0	1		
		Sprain	1	0	0	1	0	0	0	0	2		
		Typhoid	0	0	0	1	0	0	0	0	1		
		Wound	0	1	1	0	0	0	0	0	2		
101	<i>Moringa oleifera</i> Lam.	Cooling agent	1	1	1	0	1	1	1	0	6		
102	<i>Morus macroura</i> Miq.	Gastritis	0	0	0	0	0	0	1	0	1		
		Worm infestation	1	1	0	1	1	0	1	1	6		
103	<i>Mucuna pruriens</i> L. DC.	Fish poisoning	0	0	0	1	0	0	0	0	1		
		Infertility	0	0	0	1	0	0	1	0	2		
		Menstruation disorder	1	0	0	0	0	0	0	0	1		
		Sexually active	0	0	1	0	0	0	1	0	2		
104	<i>Musa paradisiaca</i> L.	Anorexia	0	0	0	0	0	0	1	0	1		
		Constipation	1	0	0	0	0	0	0	0	1		
		Diarrhoea	0	1	1	0	1	1	0	0	4		
		Dysentery	0	0	0	0	0	0	1	0	1		
		Headache	0	0	0	1	0	0	0	0	1		
		Cooling agent	1	1	0	0	1	0	1	1	5		
		Ring worm	0	0	0	0	0	0	1	0	1		
105	<i>Mussaenda frondosa</i> L.	Breast engorged	1	0	0	0	1	0	0	0	2		
		Eye defect	1	0	0	0	0	0	0	0	1		
		Gastritis	0	0	0	0	0	0	1	0	1		
		Mud wound	0	0	1	1	0	1	1	0	4		
106	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Gonorrhoea	1	0	0	0	0	0	0	0	1		
		Tooth strong	1	1	1	1	1	1	1	1	8		
		Uterus swelling	0	0	1	0	0	0	0	0	1		
107	<i>Nephrolepis auriculata</i> (L.) Trimen	Gonorrhoea	1	0	0	0	0	0	0	0	1		
108	<i>Nicotiana tobacum</i> L.	Gastritis	0	0	0	0	0	0	1	0	1		
		Insecticide	1	1	0	0	1	0	1	0	4		
		Snake bite	1	0	0	0	0	0	0	0	1		
		Toothache	0	0	0	1	0	0	0	0	1		
		Worm infestation	0	1	0	0	0	0	0	1	2		
109	<i>Nyctanthes arbor-tristis</i> L.	Sugar	1	0	0	0	0	0	0	0	1		
110	<i>Ocimum basilium</i> L.	Allergy	0	0	0	1	0	0	0	0	1		

		Arthritis	0	0	1	0	0	0	0	0	1
		Child sickness	0	0	0	0	0	0	1	0	1
		Cold	0	0	0	1	0	0	0	0	1
		Cough	0	0	0	1	1	0	0	0	2
		Cooling agent	1	1	0	1	0	1	1	0	5
		Typhoid	0	0	0	1	0	0	0	0	1
111	<i>Ocimum tenuiflorum</i> L.	Child sickness	0	0	0	0	0	0	1	0	1
		Cold	0	1	0	1	1	1	1	0	5
		Cough	0	1	1	1	1	1	1	1	7
		Fever	0	1	1	1	0	0	1	1	5
		Cooling agent	1	0	0	0	0	0	0	0	1
		Otitismedia	0	0	1	1	0	0	0	0	2
		Pneumonia	1	0	0	1	0	0	0	0	2
		Stomatitis	0	0	1	1	0	0	0	0	2
		Typhoid	0	0	1	0	0	0	0	0	1
112	<i>Oroxylum indicum</i> (L.) Kurz	Asthma	0	1	0	1	0	0	0	0	2
		Cough	0	0	0	0	0	0	1	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Headache	0	0	0	0	1	0	0	0	1
		Lame	0	0	0	0	0	1	0	0	1
		Menstruation disorder	1	0	0	0	0	0	0	0	1
		Tumour formation	0	0	0	0	0	0	0	1	1
		Typhoid	0	0	1	1	1	0	0	0	3
113	<i>Oxalis corniculata</i> L.	Chestpain	0	0	1	0	0	0	0	0	1
		Conjunctivitis	1	1	1	0	0	0	0	0	3
		Dizziness	1	0	0	0	0	0	0	0	1
		Fever	0	0	1	1	1	0	0	0	3
		Headache	0	0	0	0	0	1	0	0	1
		Cooling agent	0	1	1	1	1	0	1	0	5
		Hot and cold	0	0	0	0	0	0	0	1	1
		Joint pain	0	0	0	0	0	0	1	0	1
114	<i>Periploca calophyllia</i> (Wight) Falc.	Back bone pain	1	0	0	0	0	0	0	0	1
		Fracture	0	1	0	0	1	0	1	1	4
		Gastritis	0	0	0	0	0	0	1	0	1
		Sprain	1	0	1	1	0	1	1	1	6
115	<i>Persea odoratissima</i> (Nees) Kosterm.	Fever	1	0	0	0	0	0	0	0	1
		Cooling agent	1	0	0	0	0	0	0	0	1
116	<i>Persicaria barbata</i> (L.) Hara	Anorexia	0	0	1	0	0	0	0	0	1
		Fish poisoning	1	1	1	1	1	1	1	1	8
117	<i>Phoenix loureiri</i> Kunth	Cold	1	0	0	0	0	0	0	0	1
		Diarrhoea	0	0	1	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Gonorrhoea	1	0	0	0	0	0	0	0	1
		Cooling agent	0	1	0	0	0	0	0	0	1
		Retention of urine	0	0	0	1	0	0	0	0	1
118	<i>Phyllanthus emblica</i> L.	Burning sensation of chilli	0	0	0	0	0	0	0	1	1
		Cough	0	0	0	0	1	0	0	0	1
		Gastritis	1	1	1	0	0	1	1	0	5
		Skin Disease	1	0	0	0	0	0	0	0	1
		Stomach pain	0	1	0	0	0	0	0	0	1
119	<i>Piper longum</i> L.	Asthma	1	0	0	0	0	0	0	0	1
		Cough	1	1	1	1	1	1	1	0	7
		Gastritis	0	0	0	1	0	0	1	1	3
120	<i>Piper mullesua</i> D.Don.	Cough	1	0	0	0	0	1	0	0	2
121	<i>Plumeria rubra</i> L.	Anorexia	1	1	1	1	1	0	1	1	7
		Diarrhoea	0	0	1	0	0	0	0	0	1
		Sexually active	0	1	0	0	0	0	0	0	1
		Stomach pain	0	0	1	0	0	0	0	0	1
		Wound	0	0	0	1	0	0	0	0	1
122	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Body pain	0	0	0	1	0	0	0	0	1
		Cold	0	1	1	1	1	0	1	0	5
		Cough	1	1	1	0	1	1	0	0	5
		Fever	0	1	1	0	0	0	1	0	3
		Gastritis	0	0	0	0	0	0	1	0	1
		Headache	0	0	0	1	1	0	0	1	3

		Pneumonia	0	1	1	0	0	0	0	0	2
		Running nose	0	0	0	0	0	0	0	1	1
123	<i>Premna barbata</i> Wall. ex Schauer	Diarrhoea	0	1	0	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	1	0	1
		Cooling agent	1	1	1	1	0	1	1	1	7
		Breast engorged	0	0	0	0	1	0	0	0	1
124	<i>Prunus persica</i> (L.) Batsch	Growth of gangrene	1	1	1	1	1	1	1	0	7
125	<i>Psidium guajava</i> L.	Coryza	0	0	0	0	0	0	1	0	1
		Diarrhoea	1	1	0	1	0	1	0	1	5
		Dysentery	0	0	0	1	0	0	1	0	2
		Fever	1	0	0	0	0	0	0	0	1
		Gastritis	0	0	0	0	0	0	0	1	1
		Headache	0	0	0	0	0	0	1	0	1
		Indigestion	1	0	0	0	0	0	0	0	1
		Pneumonia	0	0	0	1	1	0	0	0	2
		Worm infestation	0	0	1	0	0	0	0	0	1
126	<i>Punica granatum</i> L.	Diarrhoea	1	0	0	0	0	0	0	0	1
		Dysentery	1	0	0	0	0	0	0	0	1
		Increase energy	0	0	0	0	0	0	0	1	1
		Mud wound	0	1	0	0	0	0	0	0	1
127	<i>Pyrus communis</i> L.	Cooling agent	1	1	0	0	0	0	1	0	3
128	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Diarrhoea	0	0	0	0	0	1	0	0	1
		Fever	0	0	1	1	0	0	0	0	2
		Gastritis	0	0	0	0	0	0	1	0	1
		Heart pain	0	0	0	0	0	0	1	0	1
		Poisonous to dog	1	0	0	0	1	0	1	0	3
		Wound	1	0	0	0	0	0	0	0	1
129	<i>Ricinus communis</i> L.	Anorexia	0	0	0	0	0	0	1	0	1
		Back bone pain	1	0	0	0	0	0	0	0	1
		Body pain	0	0	0	0	0	0	1	0	1
		Boils	0	0	0	0	0	1	0	0	1
		Foot crack	0	0	1	1	0	0	0	0	2
		Fracture	1	0	0	0	0	0	0	0	1
		Gingivitis	0	0	0	1	0	0	0	0	1
		Marasmus	0	0	0	0	0	0	1	0	1
		Sprain	1	0	0	0	0	0	0	0	1
		Wound	0	0	1	0	0	1	0	0	2
130	<i>Rubus ellipticus</i> Sm.	Fever	1	0	0	0	0	0	0	0	1
		Gastritis	0	1	0	0	0	0	1	0	2
		Infertility	0	0	0	0	1	0	0	0	1
		Pneumonia	1	0	0	0	0	0	0	0	1
		Ulcer	0	0	0	0	0	0	1	0	1
131	<i>Saccharum officinarum</i> L.	Cooling agent	1	1	1	0	1	0	1	0	5
		Jaundice	1	1	1	0	1	0	1	1	6
		Retention of placenta	0	0	0	1	0	0	0	0	1
132	<i>Scoparia dulcis</i> L.	Cooling agent	1	1	1	1	1	1	1	1	8
		Sugar	1	0	0	0	0	0	0	0	1
133	<i>Semecarpus anacardium</i> L.f.	Allergy	1	0	0	0	0	0	0	0	1
		Bald pattern	1	0	0	0	0	0	0	0	1
		Blood impurity in woman	0	0	0	0	0	0	1	0	1
		Foot crack	0	0	0	1	1	1	1	0	4
		Throat pain	0	0	1	0	0	0	0	0	1
		Wound	0	0	1	0	0	0	0	0	1
134	<i>Senna occidentalis</i> (L.) Link	Anorexia	0	0	0	1	0	0	0	0	1
		Cough	0	1	0	0	0	1	1	1	4
		Diarrhoea	0	0	0	0	0	0	1	0	1
		Cooling agent	1	0	0	1	1	0	1	0	4
		Insomnia	1	0	0	1	0	0	0	0	2
		Vomiting	0	0	0	0	0	0	1	0	1
135	<i>Senna tora</i> (L.) Roxb.	Abdominal pain	0	0	0	0	1	0	0	0	1
		Child sickness	0	0	0	0	0	0	1	0	1
		Cough	0	0	0	0	0	1	0	0	1
		Fever	0	0	0	0	1	0	0	0	1
		Cooling agent	0	1	0	0	0	0	1	1	3
		Typhoid	0	0	0	1	0	0	0	0	1
		Vomiting (on	1	0	0	0	0	0	0	0	1

136	<i>Shorea robusta</i> Gaertn.	snake bite)											
		Cough	0	0	0	0	1	0	0	0	1		
		Diarrhoea	0	1	1	1	0	0	1	0	4		
		Dysentery	0	0	1	1	0	1	0	0	3		
137	<i>Sida cordifolia</i> L.	Gastritis	1	0	0	0	0	0	1	1	3		
		Boils	1	1	1	1	0	1	1	1	0	6	
		Breast engorged	0	0	0	1	0	0	0	0	0	1	
		Tetanus	0	0	0	1	0	0	0	0	0	1	
138	<i>Smilax ovalifolia</i> Roxb. ex D. Don	Typhoid	1	0	0	0	0	0	0	0	1		
		Gastritis	0	0	0	0	0	0	0	1	0	1	
		Marasmus	0	0	1	0	0	0	0	0	0	1	
		Weakness	0	0	1	0	0	0	0	0	0	1	
139	<i>Solanum anguivi</i> Lam.	B.P. High	0	0	0	0	0	0	1	0	1		
		Bile juice problem	0	0	0	0	0	0	0	1	0	1	
		Constipation	1	0	0	0	0	0	0	0	0	1	
		Fever	0	0	1	0	0	0	0	0	0	1	
		Headache	1	1	1	1	0	1	1	1	1	7	
		Cooling agent	0	1	0	1	0	0	0	0	0	2	
		140	<i>Solanum nigrum</i> L.	Child sickness	0	0	0	0	0	0	1	0	1
				Epilepsy	1	0	0	0	0	0	0	0	0
Gastritis	0			0	0	1	0	0	0	0	0	1	
Cooling agent	0			0	0	0	1	0	0	0	0	1	
141	<i>Solanum virginianum</i> L.	Mental disorder	0	0	0	1	0	0	0	0	0	1	
		Vomiting	0	0	1	0	0	0	0	0	0	1	
		Diarrhoea	0	0	0	0	0	0	0	1	0	1	
		Child sickness	0	0	0	0	0	0	0	1	0	1	
142	<i>Solena amplexicaulis</i> (Lam.) Gandhi.	Toothache	1	1	0	1	1	1	1	1	7		
		Typhoid	0	0	1	0	0	0	0	0	0	1	
		Vomiting	0	0	0	0	0	0	0	1	0	1	
		Anorexia	0	0	0	0	0	0	0	1	0	1	
		Breast engorged	1	0	0	0	0	0	0	0	0	1	
		Child sickness	0	0	0	0	0	0	0	1	0	1	
		Gastritis	0	0	0	1	0	0	0	0	0	1	
		Cooling agent	0	0	1	0	0	0	1	1	1	3	
		Marasmus	0	0	0	0	0	0	1	0	0	1	
		Menstruation disorder	0	0	0	0	1	0	0	0	0	1	
143	<i>Spilanthes calva</i> DC.	Pneumonia	0	1	0	0	0	0	0	0	1		
		Psycho disorder	0	0	1	1	0	1	0	0	0	3	
		Cold	1	1	0	0	0	0	1	1	1	4	
		Cough	0	0	0	0	0	1	0	0	0	1	
144	<i>Spondias pinnata</i> (L. f.) Kurz	Gastritis	1	0	0	0	0	0	1	0	2		
		Toothache	1	0	0	1	0	0	1	1	4		
		Coryza	0	0	0	0	0	0	1	0	1		
		Gastritis	0	0	0	0	0	0	1	0	1		
145	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Mud wound	0	1	0	1	0	0	1	0	3		
		Boils	0	1	0	0	0	0	0	0	0	1	
		Fever	0	0	1	0	0	0	0	0	0	1	
		Gastritis	0	0	0	0	0	0	1	0	0	1	
		Menstruation disorder	1	0	0	0	0	0	0	0	0	1	
146	<i>Syzygium cumini</i> (L.) Skeels	Worm infestation	1	0	0	0	0	0	0	0	0	1	
		Diarrhoea	0	1	1	0	0	0	0	0	0	2	
		Dysentery	0	0	0	0	0	0	1	0	0	1	
		Fish poisoning	0	0	1	1	0	0	0	0	0	2	
		Gastritis	1	0	0	0	0	0	1	0	0	2	
147	<i>Syzygium</i> sp.	Sugar	0	0	0	0	1	0	0	0	0	1	
		Coryza	0	1	0	0	0	1	1	0	0	3	
		Fish poisoning	0	0	1	0	0	0	0	0	0	1	
		Gastritis	1	0	0	0	0	0	1	0	0	2	
148	<i>Tamarindus indica</i> L.	Migraine	0	0	0	0	0	1	0	0	0	1	
		Fever	0	0	1	0	0	0	0	0	0	1	
		Gastritis	0	0	0	0	0	0	0	1	0	1	
149	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C.Chr.	Cooling agent	1	0	0	0	0	0	0	0	0	1	
		Bleeding (woman)	1	0	0	0	0	0	0	0	0	1	
		Burns	0	0	0	0	0	1	0	0	0	1	
		Diarrhoea	0	0	0	0	0	0	1	1	0	2	
		Dysentery	0	0	0	0	0	0	1	0	0	1	
Gastritis	0	0	0	0	0	0	1	0	0	1			

		Lower abdominal pain	1	1	1	1	0	0	0	0	4
		Stomach pain	0	0	0	0	0	0	0	1	1
150	<i>Terminalia alata</i> Heyne ex Roth	Constipation	1	0	0	0	0	0	0	0	1
		Cuts	0	0	0	0	0	1	1	0	2
		Diarrhoea	0	0	1	0	0	0	0	0	1
		Dysentery	0	0	1	0	0	0	0	0	1
		Gastritis	1	0	0	0	0	0	0	0	1
		Indigestion	1	0	0	0	0	0	0	0	1
		Wound	0	0	0	1	0	0	0	0	1
151	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Allergy	0	0	1	1	0	0	0	0	2
		Cough	0	0	1	0	0	0	0	0	1
		Gastritis	1	1	1	0	0	1	1	1	6
152	<i>Terminalia chebula</i> Retz.	Cough	1	0	1	1	0	0	1	1	5
		Gastritis	0	1	1	0	0	1	1	1	5
153	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Breast engorged	1	0	1	0	0	0	0	0	2
		Fever	0	0	0	0	0	1	0	0	1
		Gastritis	0	0	1	0	0	0	1	0	2
		Gonorrhoea	0	1	0	0	0	0	0	0	1
		Weakness	0	0	1	0	0	0	0	0	1
		Wound	1	0	0	0	0	0	0	0	1
154	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Boils	1	0	0	0	0	0	0	0	1
		Gastritis	0	1	0	0	0	0	1	0	2
		Gonorrhoea	0	0	1	0	0	0	0	0	1
		Pneumonia	1	0	0	0	0	0	0	0	1
		Swelling	0	0	0	1	0	0	0	0	1
		Typhoid	0	0	0	0	1	0	0	0	1
155	<i>Tinospora sinensis</i> (Lour.) Merr.	Gastritis	1	1	1	1	1	1	1	0	7
		Cooling agent	0	0	0	0	0	0	0	1	1
		Production of more milk	0	1	0	0	0	0	0	0	1
156	<i>Trichosanthes tricuspidata</i> Lour.	Breast engorged	0	0	0	0	1	0	1	0	2
		Fever	0	0	1	1	0	0	0	0	2
		Hen's sickness	0	0	0	1	0	0	0	0	1
		Psycho disorder	0	0	1	1	0	0	0	0	2
		Retention of placenta	0	0	1	0	1	0	0	1	3
157	<i>Tridax procumbens</i> L.	Anorexia	0	0	0	0	0	0	1	0	1
		Cuts	0	0	0	1	0	0	0	0	1
		Stomatitis	0	0	1	0	0	0	0	0	1
158	<i>Viscum album</i> L.	Back bone pain	0	1	0	0	0	0	0	0	1
		Diarrhoea	1	0	0	0	0	0	0	0	1
		Fracture	1	1	1	1	1	0	1	0	6
		Gastritis	1	0	0	0	0	0	0	0	1
		Sprain	0	1	1	1	1	1	1	1	7
		Waist pain	0	1	0	0	0	0	0	0	1
159	<i>Vitex negundo</i> L.	Anorexia	1	0	0	0	0	0	0	0	1
		Asthma	0	0	0	0	0	0	1	0	1
		Cataract	1	0	0	0	0	0	0	0	1
		Child sickness	0	0	0	0	0	0	1	0	1
		Coryza	0	0	1	1	0	0	1	0	3
		Gastritis	0	0	0	0	0	0	0	1	1
		Gonorrhoea	0	1	0	0	0	0	0	0	1
		Headache	0	0	0	0	1	0	0	0	1
		Psycho disorder	0	1	0	0	0	0	0	0	1
		Uterus prolapse	1	0	0	0	0	0	0	0	1
160	<i>Woodfordia fruticosa</i> (L.) Kurz	Diarrhoea	0	1	1	1	0	0	0	0	3
		Dysentery	1	1	1	1	1	1	1	1	8
		Vomiting	0	0	1	0	0	0	0	0	1
161	<i>Xerompis spinosa</i> (Thunb.) Keay	Fish poisoning	1	1	1	1	1	1	0	1	7
		Cooling agent	0	0	1	0	0	0	0	0	1
		Malaria	0	0	0	0	0	0	1	0	1
162	<i>Zizyphus mauritiana</i> Lam.	Dysentery	0	0	0	0	1	0	0	0	1
		Gastritis	0	0	0	0	1	0	1	0	2
		Headache	1	0	0	0	0	0	0	0	1
		Cooling agent	0	0	1	1	0	1	0	0	3
		Measles	1	1	1	1	1	1	1	1	8
163	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Anorexia	0	0	0	0	1	0	0	0	1
		Cough	0	0	0	0	0	1	0	0	1
		Diarrhoea	1	0	1	0	0	0	0	0	2

		Dysentery	0	0	1	0	0	0	0	0	1
		Gastritis	0	0	0	0	1	0	0	0	1
		Cooling agent	0	0	1	0	0	0	0	0	1
		Measles	0	1	0	0	1	0	1	0	3
		Snake bite	1	0	0	1	0	0	0	0	2
		Typhoid	1	0	0	0	0	0	0	0	1
		Worm infestation	1	0	0	0	0	0	0	0	1
164	Unknown 1	Diarrhoea	0	0	0	0	0	0	1	0	1
		Dysentery	0	0	1	0	0	0	0	0	1
		Typhoid	0	0	0	0	0	0	1	0	1
		Waist pain	0	0	0	0	0	0	1	0	1
165	Unknown 2	Boils	0	0	1	0	0	0	0	0	1
		Dysentery	0	0	0	0	0	0	1	0	1
166	Unknown 3	Anorexia	0	0	0	1	1	0	0	0	2
		Burns	1	0	0	0	0	0	0	0	1
		Dog bite	0	1	1	0	0	0	1	0	3
		Gastritis	0	1	0	0	0	0	0	0	1
		Headache	0	0	0	0	0	0	1	0	1
		Scorpio bite	0	0	0	1	0	0	1	0	2
		Snake bite	0	0	1	1	0	1	0	0	3
167	Unknown 4	Cooling agent	1	1	1	1	1	1	1	0	7
		Gastritis	0	0	0	0	0	0	1	0	1
		Sprain	0	0	0	0	0	0	1	0	1
168	Unknown 5	Arthritis	0	0	1	0	0	0	0	0	1
		Fish poisoning	0	0	1	0	0	0	0	0	1
169	Unknown 6	Fever	1	0	0	0	0	0	0	0	1
170	Unknown 7	Abdominal disorder	1	0	0	0	0	0	0	0	1
		Jaundice	1	1	1	1	1	1	1	0	7



**Appendix V: Percentage of the respondents in each ethnic/caste group using the Medicinal Plant for a common disease/ disorder and score of Ethnographic Validity (only very high, high, and medium) for common medicinal use**

S. No	Plant Names	Alien /cultivated species/Weed	Diseases	Br.	Ch.	Th.	Mg.	Nw.	Ku.	Da.	Gr.	Mean frequency	EG (No.)	Ethnographic validity	Ethnographic validity rank
1	<i>Achyranthes bidentata</i> Blume		Anorexia	0.00	33.33	12.50	33.33	50.00	0.00	0.00	50.00	22.40	5	111.98	Medium
2	<i>Acorus calamus</i> L.	C	Cough	42.86	50.00	50.00	33.33	75.00	60.00	0.00	0.00	38.90	6	233.39	High
3	<i>Aegle marmelos</i> (L.) Correa		Cooling agent	0.00	33.33	0.00	33.33	50.00	40.00	14.29	0.00	21.37	5	106.85	Medium
4	<i>Aloe vera</i> (L.) Burm. f.	C	Burns	42.86	50.00	37.50	44.44	75.00	60.00	57.14	50.00	52.12	8	416.94	Very high
5	<i>Aloe vera</i> (L.) Burm. f.	C	Cooling agent	14.29	33.33	37.50	22.22	50.00	0.00	28.57	50.00	29.49	7	206.42	High
6	<i>Alstonia scholaris</i> (L.) R. Br.		Abortion	0.00	33.33	12.50	11.11	50.00	0.00	57.14	0.00	20.51	5	102.55	Medium
7	<i>Amarathus</i> sp.	C	Gonorrhoea	14.29	33.33	37.50	11.11	50.00	40.00	42.86	50.00	34.89	8	279.09	High
8	<i>Ananas comosus</i> (L.) Merr.	C	Cooling agent	42.86	33.33	25.00	33.33	25.00	40.00	57.14	50.00	38.33	8	306.67	Very high
9	<i>Asparagus racemosus</i> Willd.		Production of more milk	57.14	33.33	50.00	0.00	25.00	40.00	28.57	0.00	29.26	6	175.54	Medium
10	<i>Azadirachta indica</i> A. Juss.	C	Fever	42.86	50.00	25.00	33.33	50.00	0.00	42.86	25.00	33.63	7	235.42	High
11	<i>Begonia picta</i> Sm.		Mud wound	28.57	0.00	37.50	33.33	0.00	0.00	28.57	50.00	22.25	5	111.24	Medium
12	<i>Bombax ceiba</i> L.		Cooling agent	28.57	16.67	25.00	0.00	50.00	40.00	28.57	0.00	23.60	6	141.61	Medium
13	<i>Caesalpinia decapetala</i> (Roth) Alston		Ring worm	42.86	33.33	37.50	55.56	50.00	60.00	42.86	50.00	46.51	8	372.10	Very high
14	<i>Callicarpa macrophylla</i> Vahl		Stomatitis	28.57	33.33	0.00	0.00	50.00	40.00	28.57	0.00	22.56	5	112.80	Medium
15	<i>Calotropis gigantea</i> (L.) Dryand.		Sprain	42.86	16.67	37.50	44.44	50.00	40.00	42.86	50.00	40.54	8	324.33	Very high
16	<i>Cannabis sativa</i> L.		Cold	28.57	50.00	25.00	0.00	0.00	40.00	28.57	50.00	27.77	6	166.61	Medium
17	<i>Carica papaya</i> L.	C	Cooling agent	28.57	50.00	37.50	44.44	50.00	40.00	57.14	25.00	41.58	8	332.66	Very high
18	<i>Carica papaya</i> L.	C	Jaundice	42.86	33.33	25.00	0.00	25.00	0.00	0.00	50.00	22.02	5	110.12	Medium
19	<i>Centella asiatica</i> (L.) Urb.	C	Cooling agent	28.57	50.00	50.00	44.44	50.00	60.00	14.29	0.00	37.16	7	260.14	High
20	<i>Cissampelos pareira</i> L.	A	Gastritis	57.14	50.00	12.50	22.22	50.00	40.00	42.86	0.00	34.34	7	240.38	High
21	<i>Citrus aurantifolia</i> (Christ.) Swingle	C	Headache	0.00	33.33	37.50	33.33	25.00	0.00	42.86	0.00	21.50	5	107.51	Medium

22	<i>Citrus aurantifolia</i> (Christ.) Swingle	C	Cooling agent	57.1 4	50.0 0	0.00	0.00	0.00	0.00	42.8 6	50.0 0	25.00	4	100.00	Medium
23	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry		Coryza	57.1 4	0.00	62.5 0	44.4 4	50.0 0	40.0 0	57.1 4	0.00	38.90	6	233.42	High
24	<i>Curcuma caesia</i> Roxb.		Gastritis	57.1 4	16.6 7	37.5 0	33.3 3	50.0 0	60.0 0	42.8 6	0.00	37.19	7	260.31	High
25	<i>Cuscuta reflexa</i> Roxb.	A	Jaundice	0.00	66.6 7	62.5 0	44.4 4	50.0 0	40.0 0	28.5 7	0.00	36.52	6	219.14	High
26	<i>Desmodium concinnum</i> DC.		Fish poisoning	0.00	0.00	50.0 0	33.3 3	25.0 0	60.0 0	42.8 6	0.00	26.40	5	131.99	Medium
27	<i>Dioscorea bulbifera</i> L.		Worm infestation	28.5 7	0.00	50.0 0	44.4 4	0.00	40.0 0	42.8 6	50.0 0	31.98	6	191.90	Medium
28	<i>Euphorbia hirta</i> L.	A	Cataract	14.2 9	33.3 3	25.0 0	33.3 3	25.0 0	20.0 0	0.00	0.00	18.87	6	113.21	Medium
29	<i>Euphorbia royleana</i> Boiss.		Anorexia	42.8 6	0.00	0.00	11.1 1	50.0 0	0.00	57.1 4	25.0 0	23.26	5	116.32	Medium
30	<i>Imperata cylindrica</i> (L.) P. Beauv.	W	Worm infestation	28.5 7	50.0 0	0.00	33.3 3	50.0 0	40.0 0	28.5 7	50.0 0	35.06	7	245.42	High
31	<i>Mentha spicata</i> L.	C	Cooling agent	28.5 7	50.0 0	37.5 0	55.5 6	50.0 0	40.0 0	57.1 4	50.0 0	46.10	8	368.77	Very high
32	<i>Moringa oleifera</i> Lam.	C	Cooling agent	28.5 7	33.3 3	50.0 0	0.00	50.0 0	20.0 0	57.1 4	0.00	29.88	6	179.29	Medium
33	<i>Morus macroura</i> Miq.		Worm infestation	57.1 4	33.3 3	0.00	33.3 3	50.0 0	0.00	28.5 7	50.0 0	31.55	6	189.29	Medium
34	<i>Musa paradisiaca</i> L.	C	Cooling agent	42.8 6	16.6 7	0.00	0.00	50.0 0	0.00	42.8 6	50.0 0	25.30	5	126.49	Medium
35	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet		Tooth strong	28.5 7	33.3 3	25.0 0	44.4 4	25.0 0	40.0 0	42.8 6	50.0 0	36.15	8	289.21	High
36	<i>Ocimum basilium</i> L.	C	Cooling agent	42.8 6	50.0 0	0.00	22.2 2	0.00	40.0 0	42.8 6	0.00	24.74	5	123.71	Medium
37	<i>Ocimum tenuiflorum</i> L.	C	Cough	0.00	50.0 0	25.0 0	44.4 4	50.0 0	40.0 0	14.2 9	25.0 0	31.09	7	217.64	High
38	<i>Oxalis corniculata</i> L.	A	Cooling agent	0.00	50.0 0	25.0 0	22.2 2	50.0 0	0.00	57.1 4	0.00	25.55	5	127.73	Medium
39	<i>Periploca calophyllia</i> (Wight) Falc.		Sprain	42.8 6	0.00	62.5 0	44.4 4	0.00	60.0 0	42.8 6	25.0 0	34.71	6	208.24	High
40	<i>Persicaria barbata</i> (L.) Hara		Fish poisoning	42.8 6	50.0 0	62.5 0	44.4 4	50.0 0	60.0 0	42.8 6	50.0 0	50.33	8	402.66	Very high
41	<i>Phyllanthus emblica</i> L.		Gastritis	28.5 7	50.0 0	25.0 0	0.00	0.00	40.0 0	57.1 4	0.00	25.09	5	125.45	Medium
42	<i>Piper longum</i> L.		Cough	57.1 4	50.0 0	50.0 0	22.2 2	50.0 0	60.0 0	42.8 6	0.00	41.53	7	290.69	High
43	<i>Plumeria rubra</i> L.		Anorexia	57.1 4	33.3 3	37.5 0	44.4 4	50.0 0	0.00	28.5 7	50.0 0	37.62	7	263.37	High
44	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze		Cough	57.1 4	33.3 3	50.0 0	0.00	50.0 0	60.0 0	0.00	0.00	31.31	5	156.55	Medium
45	<i>Premna barbata</i> Wall. ex Schauer		Cooling agent	42.8 6	33.3 3	50.0 0	22.2 2	0.00	40.0 0	28.5 7	50.0 0	33.37	7	233.61	High
46	<i>Prunus persica</i> (L.) Batsch	C	Growth of gangrene	42.8 6	33.3 3	25.0 0	33.3 3	50.0 0	40.0 0	57.1 4	0.00	35.21	7	246.46	High
47	<i>Psidium guajava</i> L.	C	Diarrhoea	28.5 7	50.0 0	0.00	44.4 4	0.00	40.0 0	0.00	50.0 0	26.63	5	133.13	Medium

48	<i>Saccharum officinarum</i> L.	C	Jaundice	14.2 9	16.6 7	25.0 0	0.00	25.0 0	0.00	42.8 6	50.0 0	21.73	6	130.36	Medium
49	<i>Saccharum officinarum</i> L.	C	Cooling agent	28.5 7	33.3 3	25.0 0	0.00	50.0 0	0.00	42.8 6	0.00	22.47	5	112.35	Medium
50	<i>Scoparia dulcis</i> L.	A	Cooling agent	42.8 6	50.0 0	37.5 0	33.3 3	50.0 0	60.0 0	57.1 4	50.0 0	47.60	8	380.83	Very high
51	<i>Sida cordifolia</i> L.	A	Boils	28.5 7	33.3 3	62.5 0	44.4 4	0.00	40.0 0	57.1 4	0.00	33.25	6	199.49	Medium
52	<i>Solanum anguivi</i> Lam.		Headache	42.8 6	66.6 7	37.5 0	44.4 4	0.00	40.0 0	57.1 4	50.0 0	42.33	7	296.28	High
53	<i>Solanum virginianum</i> Dunal	A	Toothache	57.1 4	50.0 0	0.00	33.3 3	50.0 0	40.0 0	28.5 7	50.0 0	38.63	7	270.42	High
54	<i>Terminalia bellirica</i> (Gaertn.) Roxb.		Gastritis	57.1 4	50.0 0	25.0 0	0.00	0.00	60.0 0	57.1 4	50.0 0	37.41	6	224.46	High
55	<i>Terminalia chebula</i> Retz.		Gastritis	0.00	50.0 0	25.0 0	0.00	0.00	60.0 0	42.8 6	25.0 0	25.36	5	126.79	Medium
56	<i>Terminalia chebula</i> Retz.		Cough	28.5 7	0.00	37.5 0	44.4 4	0.00	0.00	28.5 7	50.0 0	23.64	5	118.18	Medium
57	<i>Tinospora sinensis</i> (Lour.) Merr.		Gastritis	42.8 6	33.3 3	62.5 0	55.5 6	75.0 0	60.0 0	71.4 3	0.00	50.08	7	350.59	Very high
58	<i>Viscum album</i> L.		Sprain	0.00	33.3 3	37.5 0	33.3 3	25.0 0	40.0 0	28.5 7	50.0 0	30.97	7	216.77	High
59	<i>Viscum album</i> L.		Fracture	28.5 7	50.0 0	37.5 0	22.2 2	50.0 0	0.00	28.5 7	0.00	27.11	6	162.65	Medium
60	<i>Woodfordia fruticosa</i> (L.) Kurz		Dysentery	28.5 7	33.3 3	50.0 0	44.4 4	50.0 0	40.0 0	57.1 4	50.0 0	44.19	8	353.49	Very high
61	<i>Xerompis spinosa</i> (Thunb.) Keay		Fish poisoning	28.5 7	33.3 3	62.5 0	33.3 3	50.0 0	40.0 0	0.00	50.0 0	37.22	7	260.52	High
62	<i>Zizyphus mauritiana</i> Lam.		Measles	28.5 7	50.0 0	37.5 0	22.2 2	25.0 0	20.0 0	28.5 7	50.0 0	32.73	8	261.87	High
63	Unknown 4		Cooling agent	28.5 7	66.6 7	37.5 0	33.3 3	50.0 0	60.0 0	42.8 6	0.00	39.87	7	279.06	High
64	Unknown 7		Jaundice	28.5 7	50.0 0	37.5 0	33.3 3	50.0 0	40.0 0	42.8 6	0.00	35.28	7	246.98	High

### Appendix VI: Ailments with the high number of use-report along with number of taxa

SN	Ailments (Usage Category)	Abbreviated Ailments	No. of use reports	No. of taxa
1	Diarrhoea (DIG)	Dia	87	29
2	Dysentery (DIG)	Dys	79	25
3	Gastritis (DIG)	Gas	313	83
4	Cold (INF)	Cold	64	15
5	Cooling agent (INF)	Cool	387	60
6	Fever (INF)	Fev	106	32
7	Jaundice (INF)	Jau	63	8
8	Mud wound (INF)	Mud	55	12
9	Worm infestation (INF)	Worm	85	18
10	Wound (INJ)	Wou	69	24
11	Sprain (MUS)	Spr	88	13
12	Headache (NER)	Head	76	19
13	Anorexia (NUT)	Ano	96	29
14	Fish poisoning (POI)	Fish	83	11
15	Coryza (RES)	Cor	52	10
16	Cough (RES)	Cou	124	25
17	Boils (SKI)	Boi	59	17

## Appendix VII: Priotized medicinal plant species

S.no	Scientific name	Cultivated	Allien sp	Parts Used						Eth. Group	Trade	Rank	Criteria of selection
				Whole part	Root	Seed	Bark	Rhizome	Tuber				
1	<i>Abrus precatorius</i> L.				3	2				2	3	10	1
2	<i>Acacia catechu</i> (L. f.) Willd.						1			3		4	*
3	<i>Achyranthes bidentata</i> Blume				3					4		7	*
4	<i>Acorus calamus</i> L.	C			3					4	3	10	***
5	<i>Aegle marmelos</i> (L.) Correa									4	3	7	*
6	<i>Aloe vera</i> (L.) Burm. f.	C								4		4	*
7	<i>Alstonia scholaris</i> (L.) R. Br.						1			4	3	8	1
8	<i>Amaranthus spinosus</i> L.				3					4		7	*
9	<i>Amarathus</i> sp.				3					1		4	*
10	<i>Ananas comosus</i> (L.) Merr.	C								4		4	*
11	<i>Annona squamata</i> L.	C								2	3	5	*
12	<i>Anthocephalus chinensis</i> (Lam.) A. Rich. ex Walp.						1			3		4	*
13	<i>Antidesma bunius</i> (L.) Spreng.				3					4		7	*
14	<i>Areca catechu</i> L.	C				2				1		3	*
15	<i>Artemisia indica</i> Willd.			3						1		4	*
16	<i>Artocarpus lakoocha</i> Wall. ex Roxb.						1			4		5	*
17	<i>Asparagus racemosus</i> Willd.				3					3	3	9	1
18	<i>Azadirachta indica</i> A. Juss.	C				2				2	3	7	*
19	<i>Baccharoides anthelmintica</i> (L.) Moench.					2				3		5	*
20	<i>Bauhinia purpurea</i> L.					2	1			1		4	*
21	<i>Bauhinia scandens</i> var. <i>horsfieldii</i> (Miq.) H. Ohashi			3						2	3	8	1
22	<i>Bauhinia vahlii</i> Wight & Arn.						1			4		5	*
23	<i>Bauhinia variegata</i> L.						1			3	3	7	*
24	<i>Begonia picta</i> Sm.									3		3	*
25	<i>Blumea hieraciifolia</i> (D. Don) DC.				3					2		5	*
26	<i>Blumea lacera</i> (Burm. f.) DC.				3					3		6	*
27	<i>Boerhavia diffusa</i> L.				3					2	3	5	*
28	<i>Bombax ceiba</i> L.				3		1			1	3	8	1
29	<i>Caesalpinia decapetala</i> (Roth) Alston						1			4		5	*
30	<i>Calamus</i> sp.				3					4		7	*
31	<i>Callicarpa macrophylla</i> Vahl				3					4		7	*
32	<i>Calotropis gigantea</i> (L.) Dryand.									4	3	7	*
33	<i>Cannabis sativa</i> L.					2				4		6	*
34	<i>Carica papaya</i> L.	C								3		3	*
35	<i>Cascabela thevetia</i> (L.) Lippold					2				3		5	*
36	<i>Cassia fistula</i> L.					2	1			2	3	8	*****
37	<i>Catunaregam uliginosa</i> (Retzius) V.V Sivarajan.						1			3		4	*
38	<i>Centella asiatica</i> (L.) Urb.	C		3						4	3	10	***
39	<i>Cheilanthes anceps</i> Blanford			3						2		5	*
40	<i>Chlorophytum nepalense</i> (Lindl.) Baker				3					4		7	*
41	<i>Cissampelos pareira</i> L.		A	3						4		7	*
42	<i>Cissus repens</i> Lam.									2		2	*
43	<i>Citrus aurantifolia</i> (Christ.) Swingle	C								3		3	*
44	<i>Citrus limon</i> (L.) Burn. f.	C								2		2	*
45	<i>Citrus maxima</i> (Burm.) Merrill	C					1			4		5	*
46	<i>Citrus medica</i> L.	C					1			4		5	*
47	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry						1			3		4	*

48	<i>Cocos nucifera</i> L.	C							2		2	*		
49	<i>Coffea arabica</i> L.	C					2				3	5	*	
50	<i>Colebrookea oppositifolia</i> Sm.										4	4	*	
51	<i>Colocasia esculenta</i> (L.) Schott										3	3	*	
52	<i>Costus speciosus</i> (J. Konig.) Sm.							3			4	7	*	
53	<i>Curculigo orchoides</i> Gaertn.					3					3	3	9	1
54	<i>Curcuma caesia</i> Roxb.								3		3		6	*
55	<i>Cuscuta reflexa</i> Roxb.		A	3							4		7	*
56	<i>Cymbopogon citratus</i> (DC.) Stapf.	C				3					3	3	9	***
57	<i>Cyperus rotundus</i> L.								3		3		6	*
58	<i>Datura metel</i> L.		A				2				4		6	*
59	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro					3					4		7	*
60	<i>Desmodium concinnum</i> DC.					3					2		5	*
61	<i>Desmostachya bipinnata</i> (L.) Stapf					3					3		6	*
62	<i>Dillenia pentagyna</i> Roxb.							1			1		2	*
63	<i>Dioscorea bulbifera</i> L.								3		4	3	10	1
64	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam						2	1			4	3	10	1
65	<i>Dipsacus inermis</i> Wall.					3					4		7	*
66	<i>Eclipta prostrata</i> (L.) L.		A	3							4	3	10	**
67	<i>Elephantopus scaber</i> L.					3					1		4	*
68	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.					3					4		7	*
69	<i>Euphorbia hirta</i> L.		A	3							4	3	10	**
70	<i>Euphorbia royleana</i> Boiss.										1		1	*
71	<i>Ficus benghalensis</i> L.					3					4		7	*
72	<i>Ficus benamina</i> L.							1			1		2	*
73	<i>Ficus hispida</i> L.f.										1		1	*
74	<i>Ficus racemosa</i> L.					3		1			4		8	****
75	<i>Ficus religiosa</i> L.							1			2		3	*
76	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.					3					3		6	*
77	<i>Flemingia macrophylla</i> (Willd.) Merr.							1			1		2	*
78	<i>Grewia subinaequalis</i> DC.					3					2		5	*
79	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.					3					4	3	10	1
80	<i>Hibiscus rosa-sinensis</i> L.							1			4		5	*
81	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don					3		1			3		7	*
82	<i>Imperata cylindrica</i> (L.) P. Beauv.					3					1		4	*
83	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.					3					2		5	*
84	<i>Inula cappa</i> (Buch.-Ham. ex D. Don) DC.							1			4		5	*
85	<i>Jatropha curcus</i> L.		A			3	2				2	3	10	**
86	<i>Justicia adhatoda</i> L.					3					4	3	10	*****
87	<i>Kaempferia rotunda</i> L.					3					4		7	*
88	<i>Lagerstroemia parviflora</i> Roxb.					3					4		7	*
89	<i>Lansea coromandelica</i> (Houtt.) Merr.							1			3		4	*
90	<i>Lawsonia inermis</i> L.	C									3		3	*
91	<i>Lygodium flexuosum</i> (L.) SW.					3					3		6	*
92	<i>Lyonia ovalifolia</i> (Wallich.) Drude							1			4		5	*
93	<i>Mallotus philippensis</i> (Lam.) Mull.							1			1	3	5	*
94	<i>Mangifera indica</i> L.	C						1			4		5	*
95	<i>Maoutia puya</i> (Hook.) Wedd.					3					3		6	*
96	<i>Melia azedarach</i> L.	C				3		1			4	3	11	***
97	<i>Mentha</i> sp.	C				3					3		6	*
98	<i>Mentha spicata</i> L.	C				3					2		5	*
99	<i>Mimosa pudica</i> L.		A	3							3		6	*

100	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi			3					4		7	*
101	<i>Moringa oleifera</i> Lam.					2	1		1		4	*
102	<i>Morus macroura</i> Miq.			3					3		6	*
103	<i>Mucuna pruriens</i> L. DC.			3			1		3		7	*
104	<i>Musa paradisiaca</i> L.	C		3					3		6	*
105	<i>Mussaenda frondosa</i> L.			3					4		7	*
106	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet					2			4		6	*
107	<i>Nephrolepis auriculata</i> (L.) Trimen								2	3	5	*
108	<i>Nicotiana tobacum</i> L.			3		2			1		6	*
109	<i>Nyctanthes arbor-tristis</i> L.						1		2		3	*
110	<i>Ocimum basilium</i> L.	C		3		2			4		9	***
111	<i>Ocimum tenuiflorum</i> L.	C		3					1		4	*
112	<i>Oroxylum indicum</i> (L.) Kurz					2	1		1		4	*
113	<i>Oxalis corniculata</i> L.		A	3					4		7	*
114	<i>Periploca calophylla</i> (Wight) Falc.			3					1		4	*
115	<i>Persea odoratissima</i> (Nees) Kosterm.					3	1		3	3	10	1
116	<i>Persicaria barbata</i> (L.) Hara			3					2		5	*
117	<i>Phoenix loureiri</i> Kunth					3			1		4	*
118	<i>Phyllanthus emblica</i> L.								4	3	7	*
119	<i>Piper longum</i> L.								2	3	5	*
120	<i>Piper mullesua</i> D. Don	C							2		2	*
121	<i>Plumeria rubra</i> L.						1		4		5	*
122	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze			3					2		5	*
123	<i>Premna barbata</i> Wall. ex Schauer						1		4		5	*
124	<i>Prunus persica</i> (L.) Batsch	C							4		4	*
125	<i>Psidium guajava</i> L.	C					1		4		5	*
126	<i>Punica granatum</i> L.						1		4		5	*
127	<i>Pyrus communis</i> L.	C							2		2	*
128	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz					3			2	3	8	1
129	<i>Ricinus communis</i> L.		A			3	2	1	4	3	13	**
130	<i>Rubus ellipticus</i> Sm.					3			4		7	*
131	<i>Saccharum officinarum</i> L.	C							1		1	*
132	<i>Scoparia dulcis</i> L.		A			3			4		7	*
133	<i>Semecarpus anacardium</i> L.f.								4		4	*
134	<i>Senna occidentalis</i> (L.) Link		A				2		1		3	*
135	<i>Senna tora</i> (L.) Roxb.		A				2		1		3	*
136	<i>Shorea robusta</i> Gaertn.							1	2	3	6	*
137	<i>Sida cordifolia</i> L.		A						4		4	*
138	<i>Smilax ovalifolia</i> Roxb. ex D. Don					3			3		6	*
139	<i>Solanum anguivi</i> Lam.						2		4		6	*
140	<i>Solanum nigrum</i> L.					3	2		3		8	****
141	<i>Solanum virginianum</i> L.		A			3			3	3	9	**
142	<i>Solena amplexicaulis</i> (Lam.) Gandhi					3	2		4		9	****
143	<i>Spilanthes calva</i> DC.								3		3	*
144	<i>Spondias pinnata</i> (L. f.) Kurz							1	4		5	*
145	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	C				3			4		7	*
146	<i>Syzygium cumini</i> (L.) Skeels							1	3	3	7	*
147	<i>Syzygium</i> sp.							1	4		5	*
148	<i>Tamarindus indica</i> L.								4		4	*
149	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C. Chr.					3			3		6	*
150	<i>Terminalia alata</i> Heyne ex Roth							1	2		3	*
151	<i>Terminalia bellirica</i> (Gaertn.) Roxb.						2	1	4	3	10	1
152	<i>Terminalia chebula</i> Retz.						2		4	3	9	1
153	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson					3			4		7	*
154	<i>Thysanolaena maxima</i> (Roxb.) Kuntze					3			4		7	*

155	<i>Tinospora sinensis</i> (Lour.) Merr.								3	4	3	10	1
156	<i>Trichosanthes tricuspidata</i> Lour.				3					3		6	*
157	<i>Tridax procumbens</i> L.		A	3						2		5	*
158	<i>Viscum album</i> L.				3		1			4		8	****
159	<i>Vitex negundo</i> L.				3					1	3	7	*
160	<i>Woodfordia fruticosa</i> (L.) Kurz						1			4	3	8	1
161	<i>Xerompis spinosa</i> (Thunb.) Keay						1			3		4	*
162	<i>Zizyphus mauritiana</i> Lam.				3	2				2		7	*
163	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.				3	2				4		9	****
164	Unkonwn 1				3	2	1			4		10	****
165	Unkonwn 2									4		4	*
166	Unkonwn 3				3					4		7	*
167	Unkonwn 4			3						4		7	*
168	Unkonwn 5			3						3		6	*
169	Unkonwn 6				3					2		5	*
170	Unkonwn 7						1			2		3	*

\* = Excluded upto 7 ranked, \*\* = Excluded alien species, ranked above 7, \*\*\* = Excluded cultivated and alien species, ranked above 7, \*\*\*\* = Excluded plant having no trade values, cultivated and alien species, ranked above 7, \*\*\*\*\* = Excluded highly abundant species, plant having no trade values, cultivated and alien species, ranked above 7, 1 = Species on local conservation list



### Appendix VIII: Detail information on Medicinal plant species found in Benimanipur VDC

S. No.	Family	Scientific name	Local Name	Community Name	English Name	Form	Col no.	Category	Flowering	Fruiting	Distribution N.	Distribution W.
1	Acanthaceae	<i>Justicia adhatoda</i> L.	Asuro		Vasaka	S		D	Dec-May	Jan-May	WCE, Tropical-Subtropical	Subtropical Himalaya, India, Indo-China
2	Amaranthaceae	<i>Achyranthes bidentata</i> Blume	Datiwan		Prickly chaff flower	H	189	D	Jul-Nov	Sep-Dec	CE, Tropical-Temperate	Tropical Africa, India, China, Malaysia
3	Amaranthaceae	<i>Amaranthus spinosus</i> L.	Banlunde		Spiny amaranth	H	159	D	Evergreen	Evergreen	WCE, Tropical-Subtropical	Pantropical
4	Amaranthaceae	<i>Amaranthus</i> sp.	Seto lunde			H		D				
5	Anacardiaceae	<i>Lannea coromandelica</i> (Houtt.) Merr.	Jingad	Jingad (Th)		T		D	Aug-Sep	Aug-Sep	WCE, Tropical-Subtropical	Himalaya, Assam, Burma, Indochina, Ceylon, China, Malaysia
6	Anacardiaceae	<i>Mangifera indica</i> L.	Aap		Mango	T		D	Feb-March	June	WCE, Tropical	Tropical Himalaya, India, Srilanka, Myanmar, Indochina, Malaysia, cultivated in tropic
7	Anacardiaceae	<i>Semecarpus anacardium</i> L.f.	Bhalayo		Marking nut tree	T		D	Apr-Jun	Jun-Sep	WCE, Tropical-Subtropical	Himalaya (Sirmore to Sikkim), India, Myanmar, Malaysia, North Australia
8	Anacardiaceae	<i>Spondias pinnata</i> (L. f.) Kurz	Amaro			T		D			WCE, Tropical-Subtropical	Tropical Himalaya, India, Srilanka, Thailand, Widely cultivated
9	Annonaceae	<i>Annona squamata</i> L.	Sarifa		Sugar apple	T		D			WCE, Tropical-Subtropical	West Indies
10	Apocynaceae	<i>Alstonia scholaris</i> (L.) R. Br.	Chhatiban		Dita bark	T		D	Aug-Oct		WCE, Tropical	Tropical Asia, Myanmar, Malaya Peninsula, Australia, Philippines, Africa
11	Apocynaceae	<i>Cascabela thevetia</i> (L.) Lippold	Karbir	Kannaile (Th)	Indian oleander	T	188	D	Sep	Sep	WCE, Tropical-Subtropical	Afghanistan, India
12	Apocynaceae	<i>Holarrhena pubescens</i> (Buch.-Ham.) Wall. ex G. Don	Indrajau	Dudhe(Mg), Khirro	Kurchi, Covessi bark	T	160	D	Apr-Jul	Sep-Jan	WCE, Tropical-Subtropical	Tropical Himalaya, Myanmar, India, Indo-China, Malaya
13	Apocynaceae	<i>Plumeria rubra</i> L.	Golaichi	Casva (Nw)	Pagoda tree, Frangi pani	T		D	May-Jun	Jun-Jul	WCE, Tropical-Subtropical	Native of tropical America
14	Apocynaceae	<i>Rauvolfia serpentina</i> (L.) Benth. ex Kurz	Sarggandha	Kukumara (Mg), Dharmaruwa (Th)	Serpentine, Rauvolfia	S	131	D	Apr-Nov	Apr-Nov	WCE, Tropical-Subtropical	Tropical Himalaya, India, Srilanka, Malaya
15	Araceae	<i>Acorus calamus</i> L.	Bojho	Barchu (Th)	Calamus, Sweet flag rhizome	H		M	Mar-Jun	Jun-Sep	WCE, Tropical-Temperate	Temperate, North Hemisphere
16	Araceae	<i>Colocasia esculenta</i> (L.) Schott	Karkalo		Co-coyam, Toro	H		M			WCE, Tropical-sub-tropical	India, Srilanka; cultivated in hot countries
17	Asclepiadaceae	<i>Calotropis gigantea</i> (L.) Dryand.	Aank		Giant milk weed, Swallow-wart	S		D	Feb-Jun	Apr-Jul	WCE, Tropical	Bhutan, India, China, Malaysia
18	Asclepiadaceae	<i>Periploca calophylla</i> (Wight) Falc.	Sikari laharo			C		D			WCE, Subtropical-	Himalaya (Kashmir to Bhutan), W & C China

											Temperate	
19	Begonia ceae	<i>Begonia picta</i> Sm.	Magarkanchi			H	180	D	Sep	Sep		
20	Bignonia ceae	<i>Oroxylum indicum</i> (L.) Kurz	Tatelo		English trumpet flower, broken bones	T		D	Jul-Oct	Jul-Nov	WCE, Tropical- Subtropical	Tropical Himalaya, India to Indo-china, Malaysia, W & S China
21	Bombac aceae	<i>Bombax ceiba</i> L.	Simal		Silk cotton tree	T		D	Dec-Mar	Mar-Jun	WCE, Tropical	Tropical Himalaya, India to W.China, Malaysia
22	Bromeli aceae	<i>Ananas comosus</i> (L.) Merr.	Bhuikatahar		Pineapple	H		M			WCE, Tropical- Subtropical	A native of Tropical America
23	Cannab aceae	<i>Cannabis sativa</i> L.	Bhang		Indian hemp, Hemp	H		D	Jun-Oct	Jun-Nov	WCE, Tropical- Temperate	Probably native of C. Asia, Cultivated in Tropical and Temperate area of World
24	Caricac eae	<i>Carica papaya</i> L.	Mewa		Papaya	T		D			WCE, Tropical- Subtropical	Cultivated through the Tropic
25	Combret aceae	<i>Terminalia alata</i> Heyne ex Roth	Saj		Myrobalan, Laurel tree	T		D			WCE, Tropical- Subtropical	Himalaya, India, Srilanka, Myanmar, Thailand, Indo- china
26	Combret aceae	<i>Terminalia bellirica</i> (Gaertn.) Roxb.	Barro		Bastard myronalan	T	217	D	Mar-Jul	Jul-Dec	WCE, Tropical- Subtropical	Nepal, India, Srilanka, Myanmar, Thailand, Indo- China, Malaysia
27	Combret aceae	<i>Terminalia chebula</i> Retz.	Harro		Chebula myrobalan, Chebulic	T		D	Mar-Jul	Jul-Oct	WCE, Tropical- Subtropical	Himalaya (Uttar Pradesh to Nepal), India, Srilanka, Myanmar
28	Compos itae	<i>Artemisia indica</i> Willd.	Titepati		Mug-wort	H		D	Dec-Feb	Dec-Feb	CE, Tropical- Temperate	Himalaya, India, Myanmar, Thailand, S. China, Japan
29	Compos itae	<i>Baccharoides anthelmintica</i> (L.) Moench.	Kalajira		Purple fleebane	H		D			WCE, Tropical - Temperate	Afghanistan, India, Nepal, Laos
30	Compos itae	<i>Blumea hieraciifolia</i> (D. Don) DC.	Saharsajari	Burus jhar (Mg), Saharsabuti (Th)		H		D			CE, Tropical- Subtropical	India, Bangladesh, Myanmar, China, Thailand, Indo- china, Japan
31	Compos itae	<i>Blumea lacera</i> (Burm. f.) DC.	Kaure jhar, Kurkur ghans, Kurkure	Kaudenawa phula (Th)	Blumea	H	163	D	Jun		C, Tropical	Africa, Asia, Pakistan, Nepal and China, Japan, Australia
32	Compos itae	<i>Eclipta prostrata</i> (L.) L.	Bhirangijhar		Yerba de tajo, False daisy, Trailing eclipta	H	202	D	Sept		WCE, Tropical- Subtropical	Tropical America
33	Compos itae	<i>Elephantopus scaber</i> L.	Thulo mulapate		Prickly-leaved elephant's food	H	122	D	Jun-Nov	Jun-Nov	WCE, Tropical- Subtropical	India, Himalaya
34	Compos itae	<i>Inula cappa</i> (Buch.-Ham. ex D. Don) DC.	Gaitihare		Golden samphire	S	211	D	Sep-Oct	Sep-Oct	WCE, Tropical- Temperate	Himalaya (Uttar Pradesh to Bhutan), NE India to China, Thailand, Java
35	Compos itae	<i>Spilanthes calva</i> DC.	Marati			H	162	D	Jun		CE, Tropical- Subtropical	Himalaya, India, Myanmar, Malesia
36	Compos itae	<i>Tridax procumbens</i> L.	Phuli jhar			H	130	D			WCE, Tropical- Subtropical	Pantropical
37	Convolv ulaceae	<i>Cuscuta reflexa</i> Roxb.	Aakasbeli		Dodder	C	200	D	Oct		WCE, Tropical- Subtropical	Afghanistan, North India, Srilanka, Thailand, Malaysia

38	Cucurbitaceae	<i>Herpetospermum pedunculatum</i> (Seringe.) Bail.	Bankarela	Chathali (Th)		C		D			WCE, Subtropical-Subalpine	Himalaya (Kullu to Bhutan), N.E. India, W. S. China
39	Cucurbitaceae	<i>Solena amplexicaulis</i> (Lam.) Gandhi	Golkakri			C	146	D			WCE, Tropical-Subtropical	
40	Cucurbitaceae	<i>Trichosanthes tricuspidata</i> Lour.	Indrayani	Gadalauki (Th), Gowaye (Mg)		C		D	Apr-Jul	Jul-Sep	WCE, Tropical-Temperate	Himalaya, India, East to China, Japan, Malaysia, Tropical Australia
41	Cyperaceae	<i>Cyperus rotundus</i> L.	Mothe		Nut grass	H		M			WCE, Tropical-Temperate	Cosmopolitan weed
42	Dilleniaceae	<i>Dillenia pentagyna</i> Roxb.	Tatari		Nepalese elephant apple	T		D			WCE, Tropical-Subtropical	Subtropical Himalaya, India, Srilanka, Myanmar, Malaysia
43	Dioscoreaceae	<i>Dioscorea bulbifera</i> L.	Bhyakur\ Ban tarul		Bulb bearing yam, Potato yam	C	175	M	Apr-Aug	Jul-Nov	WCE, Tropical-Temperate	Tropics of the old world
44	Dipsacaceae	<i>Dipsacus inermis</i> Wall.	Banmula			H		D				
45	Dipterocarpaceae	<i>Shorea robusta</i> Gaertn.	Sal		Common sal	T		D	Feb-Apr	Apr-Jun	WCE, Tropical-Subtropical	Subtropical Himalaya (Uttar Pradesh to Assam), India
46	Dryopteridaceae	<i>Tectaria coadunata</i> (Wall. ex J. Sm.) C. Chr.	Kaloneuro			H		P			WCE, Tropical-temperate	India, Bhutan
47	Ericaceae	<i>Lyonia ovalifolia</i> (Wallich.) Drude	Ahero\Angero			S		D			WCE, Subtropical to sub-alpine	Himalaya (Punjab to Bhutan), NE India, Myanmar, China, Malaya Peninsula
48	Euphorbiaceae	<i>Antidesma bunius</i> (L.) Spreng.	Archalo		Nigger's curd	T		D			E, Tropical to sub-tropical	Himalaya (Nepal to Bhutan), S and NE India, Srilanka, Myanmar, S China, Indo China, Malaysia, N Australia
49	Euphorbiaceae	<i>Euphorbia hirta</i> L.	Dudejhar		Australian asthma herb	H	136	D	Most part of the year	Most part of the year	WCE, Tropical-Subtropical	Pantropical
50	Euphorbiaceae	<i>Euphorbia royleana</i> Boiss.	Siudi	Sija (Mg)	Cactus spurze	S		D	Feb-Jan		WCE, Tropical-Temperate	Himalaya (Uttar Pradesh to Nepal)
51	Euphorbiaceae	<i>Jatropha curcus</i> L.	Sajiwan		Physics nut	T	148	D	Jun	Jun	WCE, Tropical-Subtropical	Native of new world, Tropic, cultivated in other tropical areas
52	Euphorbiaceae	<i>Mallotus philippensis</i> (Lam.) Mull.	Sindure	Rohini (Mg)	Kamala tree	T	215	D	Aug-Dec	Dec-Mar	WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Bhutan), India, Malaysia, China
53	Euphorbiaceae	<i>Phyllanthus emblica</i> L.	Amala		Embelic myrobalan, Gooseberry	T		D	Mar-Jun	Sep-Feb	WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Bhutan), NE China, N Myanmar, Malaysia
54	Euphorbiaceae	<i>Ricinus communis</i> L.	Ader (Andel)	Redi (Th)	Castor	S		D	Evergreen	Evergreen	WCE, Tropical-Temperate	Native of NE Tropical Africa
55	Gentianeaceae	<i>Swertia nervosa</i> (G. Don.) C.B. Clarke	Chiraito		Chiretta	H		D				

56	Gramineae	<i>Cymbopogon citratus</i> (DC.) Stapf.	Kagati ghans		Lemon grass	H		M	Dec-Feb	Feb-Apr	WCE, Tropical-Subtropical	
57	Gramineae	<i>Dendrocalamus hamiltonii</i> Nees & Arn. ex Munro	Bans		Bamboo	T		M	Nov-Mar			
58	Gramineae	<i>Desmostachya bipinnata</i> (L.) Stapf	Kush		Kush grass	H		M			WCE, Tropical-Subtropical	North and Tropical Africa, Iran, Arabia, India
59	Gramineae	<i>Eulaliopsis binata</i> (Retz.) C.E. Hubb.	Babiyo		Sawai grass	H		M	Oct-Feb	Oct-Feb		
60	Gramineae	<i>Imperata cylindrica</i> (L.) P. Beauv.	Siru		Cogon grass, Alang-alang	H		M	Apr-Nov	Apr-Nov	WCE, Tropical-Temperate	Mediterranean region, N. & C. Asia, Himalaya, China
61	Gramineae	<i>Saccharum officinarum</i> L.	Ukhu		Sugarcane	H		M			WCE, Tropical-Subtropical	Widely cultivated through the tropical countries
62	Gramineae	<i>Thysanolaena maxima</i> (Roxb.) Kuntze	Amriso		Broom grass	H		M	Dec-Mar	Feb-Apr	WCE, Tropical-Subtropical	India, South and SE Asia, China, Malaysia
63	Hypoxidaceae	<i>Curculigo orchoides</i> Gaertn.	Kalo musli	Musal ledi (Th)	Black muscale	H	147	M	Jun-Aug	Aug-Oct	WCE, Tropical-Subtropical	Himalaya (Kashmir to Assam), India and Srilanka, East to Japan, Malaysia, Australia
64	Labiatae	<i>Colebrookea oppositifolia</i> Sm.	Bhokate phul	Dhurseli (Mg)	.	S		D			WCE, Tropical-Subtropical	Punjab, Himalaya (Kashmir to Bhutan) Myanmar, China
65	Labiatae	<i>Mentha</i> sp.	Mentha (Satyajiwan)		Peppermint	H		D				
66	Labiatae	<i>Mentha spicata</i> L.	Pudina		Mint, Spearmint	H		D	May-Sep	Oct-Feb	WC, Subtropical-Temperate	Europe, Afghanistan, Pakistan, Himalaya (Kashmir to Nepal), China, Widely cultivated
67	Labiatae	<i>Ocimum basilium</i> L.	Bamari	Deuna phula (Th)	Basil, sweet basil	H	143	D	June		WCE, Tropical-Subtropical	Throughout the warmer parts of Asia, Africa, America, widely cultivated herb
68	Labiatae	<i>Ocimum tenuiflorum</i> L.	Tulsi		Basil, sacred bush	H		D	Sep-Oct	Nov-Dec	WCE, Tropical	S.W. Asia, Himalaya (Nepal), Bangladesh, India, Srilanka, China, Often cultivated
69	Labiatae	<i>Pogostemon benghalensis</i> (Burm. f.) Kuntze	Rudilo			H		D			WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Nepal), India
70	Lauraceae	<i>Persea odoratissima</i> (Nees) Kosterm.	Kaulo	Yaltak (Mg)		T		D				
71	Leguminosae	<i>Abrus precatorius</i> L.	Ratigedi	Lanigoija (Th), Goji (Mg)	Crab's eye	C		D	Feb-Aug	Jun-Oct	WCE, Tropical-Subtropical	Tropical and Subtropical Africa, Asia, South to Australia, Pacific island
72	Leguminosae	<i>Acacia catechu</i> (L. f.) Willd.	Khayar		Cutch tree	T		D	Apr-Jun	Sep-Dec	WCE, Tropical-Subtropical	Tropical Himalaya, India, Myanmar, Thailand, S. China
73	Leguminosae	<i>Bauhinia purpurea</i> L.	Tanki		Bauhinia, Ebony	T	199	D	Aug-Dec	Dec-Apr	WCE, Tropical-Subtropical	Tropical Himalaya (Kashmir to Bhutan), India, SE Asia, W & S China
74	Leguminosae	<i>Bauhinia scandens</i> var. <i>horsfieldii</i> (Miq.) H. Ohashi	Nagbeli			C		D			WCE, Sub-tropical - Sub-alpine	India, Bhutan

75	Leguminosae	<i>Bauhinia vahlii</i> Wight & Arn.	Bhorla	Maulani (Th)	Camel's foot climber	C	128	D	Mar-Jul	Jul-Mar	WCE, Tropical-Subtropical	Tropical Himalaya (Kashmir to Sikkim), India
76	Leguminosae	<i>Bauhinia variegata</i> L.	Koiralo		Mountain ebony	T		D	Feb-Apr	May-Jun	WCE, Tropical-Subtropical	Himalaya (Kashmir to Bhutan), India, Myanmar, China
77	Leguminosae	<i>Caesalpinia decapetala</i> (Roth) Alston	Dajpatra		Bahama sappan, Black bondue	S	198	D	Sept		WCE, Subtropical-Temperate	Himalaya, India, Srilanka, SE Asia, Malaysia, China, Japan, Cultivated in Africa and America.
78	Leguminosae	<i>Cassia fistula</i> L.	Rajbrikshya	Badar latthi (Th)	Cassia pod	T		D	Mar-Jun		WCE, Tropical-Subtropical	Widely cultivated in Africa, W. Asia, Himalaya, India, S.E. Asia
79	Leguminosae	<i>Desmodium concinnum</i> DC.	Sano gabuja			S	170	D	Sep		WCE, Subtropical-Temperate	Himalaya (Uttar Pradesh to Bhutan) NE India, Myanmar, China
80	Leguminosae	<i>Flemingia macrophylla</i> (Willd.) Merr.	Tinpate			S	171	D	Sep		WCE, Tropical-Temperate	Himalaya, India, Srilanka, SE Asia, Malaysia, Australia, China, Cultivated in Africa
81	Leguminosae	<i>Indigofera atropurpurea</i> Buch.-Ham. ex Hornem.	Sakino			S	139	D	Jun		WCE, Tropical-Sub-alpine	Himalaya (Kashmir to Bhutan), India, China
82	Leguminosae	<i>Mimosa pudica</i> L.	Lazzawati		Sensitive plant	S		D	May-Sep	Jul-Oct	WCE, Tropical-Subtropical	Pantropical, native of Tropical America
83	Leguminosae	<i>Mimosa rubicaulis</i> subsp. <i>himalayana</i> (Gamble) H. Ohashi	Areli	Aarari (Th), Jugad yang (Mg)		T	173	D	Feb-Apr		WCE, Tropical-sub-tropical	Himalaya (Kashmir to Bhutan), India, Afghanistan
84	Leguminosae	<i>Mucuna pruriens</i> L. DC.	Kauchho (Kauso)		Cowhage	C		D	Jun-Aug	Aug-Dec	WCE, Tropical-Subtropical	
85	Leguminosae	<i>Senna occidentalis</i> (L.) Link	Tapre		Negro coffee, Foetid cassia	S	176	D	Jul-Dec	Jul-Dec	WCE, Tropical-Subtropical	Probably a native of Tropical America, Widely introduced in Nepal
86	Leguminosae	<i>Senna tora</i> (L.) Roxb.	Tapre (Chakaudi)		Foetid cassia, ringworm plant	S	142	D	Jun		WCE, Tropical-Subtropical	Tropics, probably of the South American origin
87	Leguminosae	<i>Tamarindus indica</i> L.	Imili		Tamarinds	T		D	Mar-May	Apr-Jul	WCE, Tropical	Pantropical in cultivation, Possibly native of Tropical Africa
88	Leguminosae	Unknown 1	Bawari (RamBhorla)			C		D				
89	Liliaceae	<i>Aloe vera</i> (L.) Burm. f.	Ghiukumari		Curacao aloe	H		M			WCE, Tropical-Subtropical	Mediterranean and Canary Islands, Naturalized in Florida, West Indies, Central America and Asia
90	Liliaceae	<i>Asparagus racemosus</i> Willd.	Kurilo		Asparagus	H	174	M	May-Sep	Nov-Feb	WCE, Tropical-Temperate	Himalaya, India, Malaysia, Australia, Africa
91	Liliaceae	<i>Chlorophytum nepalense</i> (Lindl.) Baker	Banpyaj			H		M			WCE, Tropical-Temperate	Himalaya (Nepal to Arunachal Pradesh), N. E. India
92	Liliaceae	<i>Smilax ovalifolia</i> Roxb. ex D. Don	Kukurdaino			C		M	Aug-Dec		CE, Tropical-Subtropical	Himalaya, India, N. Myanmar, N. Indo-china
93	Loranthaceae	<i>Viscum album</i> L.	Hadchur		Common mistletoe, Devil's fuge	S		D			WC, Tropical-Temperate	Himalaya (Kashmir to Nepal), India

94	Lythraceae	<i>Lagerstroemia parviflora</i> Roxb.	Bot dhayaro		Myrtle tree	T		D			WCE, Tropical	Tropical Himalaya (Uttar Pradesh to Sikkim), India, Myanmar
95	Lythraceae	<i>Lawsonia inermis</i> L.	Mehadi		Henna plant	S	134	D	Apr-Jun	May-Jul	WCE, Tropical	C. Asia, India, often cultivated
96	Lythraceae	<i>Woodfordia fruticosa</i> (L.) Kurz	Dhayaro (Dhaero)	Jharyak (Mg)	Fuel flame bush, Woodfordia	S		D	Feb-May	Apr-Jun	WCE, Tropical-Subtropical	Africa, W. Asia, Subtropical Himalaya, India, Srilanka, Myanmar, East to China
97	Malvaceae	<i>Hibiscus rosa-sinensis</i> L.	Barhamase phul			S		D	Evergreen		WCE, Tropical-Subtropical	Cultivated throughout the Tropics and Subtropic
98	Malvaceae	<i>Sida cordifolia</i> L.	Balu jhar	Balhiya (Th)	Contry mallow	S	191	D	Sept		WCE, Tropical-Subtropical	Pantropical
99	Malvaceae	<i>Thespesia lampas</i> (Cav.) Dalzell & Gibson	Bankapas			S	169	D	Sep	Sep-Oct	WCE, Tropical-Subtropical	Africa, S & SE Asia
100	Meliaceae	<i>Azadirachta indica</i> A. Juss.	Nim		Neem, margosa	T		D	Feb-Jul	Apr-Sep	WCE, Tropical	Himalaya, India, Widely cultivated
101	Meliaceae	<i>Melia azedarach</i> L.	Bakaino		China-berry, Bead tree	T		D	Feb-May	Jun-Dec	WCE, Tropical-Subtropical	From Himalaya, East to China, Cultivated
102	Menispermaceae	<i>Cissampelos pareira</i> L.	Badalpate		Velvet-leaf, false parcirra root	C	190	D	Sept		WCE, Tropical-Temperate	Pantropical
103	Menispermaceae	<i>Tinospora sinensis</i> (Lour.) Merr.	Gurjogano		Gulancha tinospora	C		D	Apr-May	Jul-Oct	WCE, Tropical	NE India, South India, Srilanka, Myanmar, Thailand, Vietnam, Malaya
104	Moraceae	<i>Artocarpus lakoocha</i> Wall. ex Roxb.	Badahar		Monkey jack	T		D			WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Bhutan), India, Srilanka, Myanmar, Malaysia
105	Moraceae	<i>Ficus benghalensis</i> L.	Bar		Banyan tree	T		D			WCE, Tropical-Subtropical	Pakistan, India, widely cultivated
106	Moraceae	<i>Ficus benjamina</i> L.	Swami		Golden fig.	T		D			WCE, Tropical-Subtropical	India, S china, Indochina, Thailand, Philipinies, Newguinea
107	Moraceae	<i>Ficus hispida</i> L.f.	Totne			T		D			WCE, Tropical-Subtropical	
108	Moraceae	<i>Ficus racemosa</i> L.	Dumre		Country fig, cluster fig	T		D			WC, Tropical	Pakistan, India, Srilanka china, indo-china, Malaysia, Australia
109	Moraceae	<i>Ficus religiosa</i> L.	Pipal		Peepal tree	T		D			WCE, Tropical-Subtropical	Widely cultivated in India and S. Asia
110	Moraceae	<i>Ficus semicordata</i> Buch.-Ham. ex Sm.	Khaniya		Fodder fig	T		D			WCE, Tropical-Subtropical	Himalaya (Nepal-Arunanchal Pradesh), India, Indochina, Malaysia
111	Moraceae	<i>Morus macroura</i> Miq.	Kimbu		Malberry	T	161	D	Jun	Jun	E, Subtropical	Himalaya (Uttar Pradesh to Bhutan), India, W & S. China
112	Moringaceae	<i>Moringa oleifera</i> Lam.	Sitalchini		Drum stick, Horse redish tree	T		D			WCE, Tropical	NW India; cultivated throughout the tropic
113	Musaceae	<i>Musa paradisiaca</i> L.	Kera		Banana	H		M			WCE, Tropical-	Cultivated

											Subtropical	
11 4	Myrtaceae	<i>Cleistocalyx operculatus</i> (Roxb.) Merr. & Perry	Kyamuna			T	135	D		Jun	WCE, Tropical-Subtropical	Subtropical Himalaya, N.E. India, Srilanka, Malaysia, Australia
11 5	Myrtaceae	<i>Psidium guajava</i> L.	Belauti	Ri (Mg)	Guava	T	164	D	Mar-May	Oct-Feb	WCE, Tropical-Subtropical	Tropical America, Widely planted and naturalized in tropical Asia
11 6	Myrtaceae	<i>Syzygium cumini</i> (L.) Skeels	Jamun	Jamuno (Mg)	Black plum	T		D	Mar-Jun	May-Sep	WCE, Tropical-Subtropical	Subtropical, Himalaya, Srilanka, Malaysia, Australia, India
11 7	Myrtaceae	<i>Syzygium</i> sp.	Bhadrejamun			T		D				
11 8	Nepholo-epidaceae	<i>Nephrolepis auriculata</i> (L.) Trimen	Paniamla		Sword fern	H		P			WCE, Tropical-Subtropical	Tropic and Subtropic of the world, India
11 9	Nyctaginaceae	<i>Boerhavia diffusa</i> L.	Punamarwa	Unate (Th), Bolke jhar (Mg)	Spreading hogweed	H		D			WCE, Tropical-Subtropical	Tropical and subtropical region of the world
12 0	Oleaceae	<i>Nyctanthes arbor-tristis</i> L.	Parijat		Coral jasmine	T	214	D	Aug-Dec	Aug-Dec	WCE, Tropical-Subtropical	Subtropical Himalaya, India, Often cultivated for its fragrant flowers
12 1	Oxalidaceae	<i>Oxalis corniculata</i> L.	Chariamilo	Amta (Th)	Indian Sorrel	H	154	D	Evergreen	Evergreen	WCE, Tropical-Temperate	Almost cosmopolitan
12 2	Palmae	<i>Areca catechu</i> L.	Supari		Areca nut tree, betel nut tree	T		M			WCE, Tropical	Cultivated in warmer parts
12 3	Palmae	<i>Calamus</i> sp.	Bet		Rattan	S		M	Feb-May	Apr-Jan		
12 4	Palmae	<i>Cocos nucifera</i> L.	Nariwal		Coconut	T		M			WCE, Tropical	
12 5	Palmae	<i>Phoenix loureiri</i> Kunth	Thakal		Wild date palm	T		M	Sep-Feb	Jan-Jun	WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Nepal), India, Myanmar, Indo-china, China
12 6	Piperaceae	<i>Piper longum</i> L.	Pipala		Long pepper, Piper	C	126	D	Jun-Oct	Sep-Jan	WCE, Tropical	Himalaya (Nepal to Bhutan), India, Srilanka, Malaysia, Indonesia
12 7	Piperaceae	<i>Piper mullesua</i> D. Don	Paan			C	144	D		Jun	WCE, Tropical-Temperate	Himalaya (Uttar pradesh to Bhutan) India
12 8	Polygonaceae	<i>Persicaria barbata</i> (L.) Hara	Pirre	Miryabis (Th)		H	197	D	Nov	Nov-Dec	WCE, Tropical-Subtropical	Africa, India, China, Australia
12 9	Pteridaceae	<i>Chellanthes anceps</i> Blanford	Ranisinka			H	168	P			WCE, Subtropical	India, Bhutan
13 0	Punicaceae	<i>Punica granatum</i> L.	Darim		Pomegranate	T		D	Mar-Jun	Jun-Sep	WCE, Tropical-Temperate	C. & W. Asia, Himalaya, Widely cultivated in E. Himalaya, South Europe, Asia
13 1	Rhamnaceae	<i>Zizyphus mauritiana</i> Lam.	Rukh bayar		Indian Cherry Plum, Indian jujube	T	201	D	Jun-Sep	Aug-Jan	WCE, Tropical-Subtropical	Tropical Asia, Australia, Widely cultivated
13 2	Rhamnaceae	<i>Zizyphus nummularia</i> (Burm.f) Wight & Arn.	Bhui bayar		Pluim	S	216	D	Jun-Aug	Sep-Dec	WCE, Tropical-	C. Asia, Himalaya, Srilanka, India, Malaysia

13 3	Rosace ae	<i>Prunus persica</i> (L.) Batsch	Aru		Peach	T		D			W Temperate	China, widely cultivated in Asia and Europe
13 4	Rosace ae	<i>Pyrus communis</i> L.	Naspati		Pear	T		D			WCE, Tropical- Subtropical	Himalaya (Kashmir to Bhutan), NE India, Myanmar, W. China
13 5	Rosace ae	<i>Rubus ellipticus</i> Sm.	Aiselu		Golden evergreen raspberry	S		D	Jan-May	Feb-Jun	WCE, Subtropical- Temperate	Himalaya (Swat to Bhutan), NE India, Srilanka, Philippines
13 6	Rubiace ae	<i>Anthocephalus chinensis</i> (Lam.) A. Rich. ex Walp.	Kadam		Kadam	T		D			WCE, Tropical	Himalaya (Nepal), India, Srilanka, Myanmar, Malaysia
13 7	Rubiace ae	<i>Catunaregam uliginosa</i> (Retzius) V.V Sivarajan.	Medulo (Pidnnar)	Pindar (Th)		T		D			WCE, Tropical	Himalaya (Uttar Pradesh to Sikkim), Myanmar, Indo- china
13 8	Rubiace ae	<i>Coffea arabica</i> L.	Kaphi		Coffee	S	178	D			WCE, Tropical- Subtropical	Indigenous in Abyssinia and Sudan, cultivated in warmer parts of world
13 9	Rubiace ae	<i>Mussaenda frondosa</i> L.	Dhobini		Damran	S	150	D	July		C, Subtropical	Himalaya (Nepal to Assam), NE India, SriLanka, Andaman island
14 0	Rubiace ae	<i>Neohymenopogon parasiticus</i> (Wall.) Bennet	Birelahara			S		D			WCE, Sub- tropical - Temperate	Himalaya (Uttar Pradesh - Bhutan), Myanmar, Indochina, W China
14 1	Rubiace ae	<i>Xerompis spinosa</i> (Thunb.) Keay	Mainphal		Emetic nut, Common emetic nut	S		D			WCE, Tropical- Subtropical	Himalayan India, Indo-China, S China, , Malaysia
14 2	Rutacea e	<i>Aegle marmelos</i> (L.) Correa	Bel		Bael tree	T		D	Feb-Jun	Apr-Jul	WCE, Tropical- Subtropical	Himalaya (Kashmir to Nepal), India, Myanmar, Malaysia
14 3	Rutacea e	<i>Citrus aurantifolia</i> (Christ.) Swingle	Kagati		Lime	T		D			WCE, Tropical- Subtropical	Tropical Himalaya
14 4	Rutacea e	<i>Citrus limon</i> (L.) Burn. f.	Nibuwa		Lemon	T		D			WCE, Tropical- Subtropical	India, China, Cultivated throughout the subtropic
14 5	Rutacea e	<i>Citrus maxima</i> (Burm.) Merrill	Bhogate		Grape fruit	T		D			WCE, Tropical- Subtropical	Native of Malaya and Polynasian Island, India and Nepal
14 6	Rutacea e	<i>Citrus medica</i> L.	Bewara		Adam's apples, Lime fruit	T		D			WCE, Tropical - sub-tropical	Himalaya (Uttar Pradesh to Sikkim), India, Myanmar, Indochina; cultivated
14 7	Sapotac eae	<i>Diploknema butyracea</i> (Roxb.) H. J. Lam	Chiuri		Indian butter tree	T		D	Dec-Mar	Feb-Jul	WCE, Tropical- Subtropical	Subtropical, Himalaya (Uttar Pradesh to Arunanchal Pradesh)
14 8	Schizae aceae	<i>Lygodium flexuosum</i> (L.) SW.	Janailaharo		Fern	C	172	P			WCE, Tropical- Temperate	India, Srilanka, Malayasia peninsula, China, North Australia, Tropical Africa
14 9	Scrophu lariacea e	<i>Scoparia dulcis</i> L.	Chinijhar		Sweet broom sida	H	129	D			WCE, Tropical- Subtropical	America, Tropical Asia
15 0	Solanac eae	<i>Datura metel</i> L.	Dhatura		Thorn apple	H	141	D	May-Jul	Jun-Sep	WCE, Tropical- Subtropical	Tropical America, Widely cultivated and naturalized elsewhere
15 1	Solanac eae	<i>Nicotiana tobacum</i> L.	Surti		Tobacco	H		D			WCE, Tropical- Subtropical	Tropical America, Widely cultivated and naturalized elsewhere



152	Solanaceae	<i>Solanum anguivi</i> Lam.	Bihi	Gherena (Mg)	Black night shade	S	151	D	Apr-Jun	May-Jul	WCE, Tropical-Temperate	Almost cosmopolitan
153	Solanaceae	<i>Solanum nigrum</i> L.	Kamai	Bhatkuiya (Th)	Black nightshade	H	167	D	Jul	Jul		
154	Solanaceae	<i>Solanum virginianum</i> L.	Kantakari		Yellow-berried nightshade	S	140	D	Nov-Jul	Jan-Aug	WCE, Tropical-	Himaya, N India, China, SE Asia, Malayasia, Australia, Polynesia
155	Tiliaceae	<i>Grewia subinaequalis</i> DC.	Pharsa	Jalma (Mg)		T		D			WC, Tropical-Subtropical	Sub-tropical Himalaya, India, Srilanka
156	Umbelliferae	<i>Centella asiatica</i> (L.) Urb.	Ghodtapre		Water panny wort	H		D	Jan-Apr	Mar-Aug	WCE, Tropical-Temperate	Widespread in tropical and subtropical regions throughout the world
157	Urticaceae	<i>Maoutia puya</i> (Hook.) Wedd.	Jankhi	Jankhi (Mg)		S		D			WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Bhutan), NE India, Myanmar, Indo- China, SWChina
158	Verbenaceae	<i>Callicarpa macrophylla</i> Vahl	Dahichamle	Dahigona (Th)	Beauty berry	S	158	D	Jun-Sep	Aug-Nov	WCE, Tropical-Subtropical	Himalaya (Kashmir to Bhutan), India, Myanmar, South China, Indo China
159	Verbenaceae	<i>Premna barbata</i> Wall. ex Schauer	Ginnari			T	149	D		Jun	WCE, Tropical-Subtropical	Himalaya (Uttar Pradesh to Bhutan), India
160	Verbenaceae	<i>Vitex negundo</i> L.	Simali		Five leaved chaste tree	T	153	D	Mar-Oct		WCE, Tropical-Subtropical	Himalaya (Nepal to Bhutan), Afghanistan, India, Srilanka, China
161	Vitaceae	<i>Cissus repens</i> Lam.	Purni (Puren)			C		D			CE, Tropical-Subtropical	Himalaya (Nepal to Bhutan), India, Malaysia
162	Zingiberaceae	<i>Costus speciosus</i> (J. Konig.) Sm.	Betlauri		Spiral ginger	H		M			WCE, Tropical-Subtropical	Himalaya (Nepal to Sikkim), South to Srilanka, Taiwan
163	Zingiberaceae	<i>Curcuma caesia</i> Roxb.	Kalobesar		Black zeodary	H		M			WCE, Tropical-Subtropical	India
164	Zingiberaceae	<i>Kaempferia rotunda</i> L.	Bhuichampa		Indian crocus	H		M			C, Subtropical-Temperate	Himalaya, India, Srilanka, Indo-china, Malaysia
165	Unknwn	Unknwn 2	Bhutuk			T		D				
166	Unknwn	Unknwn 3	Bikhmari			H		D				
167	Unknwn	Unknwn 4	Chinilaharo			C		D				
168	Unknwn	Unknwn 5	Kariyari			S		D				
169	Unknwn	Unknwn 6	Paniyar			T		D				
170	Unknwn	Unknwn 7	Pyale rukh			T		D				

N.B.: Th – Tharu, Mg – Magar, NW – Newar

## Appendix IX

### A. Questionnaire

1. Name of the Informant: .....
2. Age:                      3. Sex: a. Male                      b. Female
3. Do you believe on traditional medicinal practice?      Y      /      N
4. If yes, which plant is used to treat which disease?
  - a. ....is used to treat.....
  - b. ....is used to treat.....
  - c. ....is used to treat.....
  - d. ....is used to treat.....
  - e. ....is used to treat.....
5. Do you use medicinal plants to cure illness?                      Y      /      N
6. Which parts of the plants are mostly used?
  - a.                      b.                      c.                      d.                      e.
7. What are the methods of preparation e.g. paste, juice, powder, etc. ?
  - a.                      b.                      c.                      d.                      e.
8. Do you collect medicinal plants yourself?                      Y      /      N
9. Do you grow these plants?                      Y      /      N
10. What is the extent of collection?                      a. Small scale      b. Large scale
11. What are the major localities of medicinal plants?
  - a.                      b.                      c.                      d.                      e.
12. What medicinal plants have you cultivated?
  - a.                      b.                      c.                      d.                      e.
13. What are the highly traded medicinal plants from your area?
  - a.                      b.                      c.                      d.                      e.
14. Do you use the medicinal plants for other purposes? Y      /      N
15. If yes, for what purpose you use?
  - a.                      b.                      c.                      d.                      e.
16. Do outsiders come to collect the plants?                      Y      /      N
17. Do you conserve the plants?                      Y      /      N
18. How do you earn your livelihood?
  - a. Fishing      b. Agriculture      c. Business      d. Job holder      e. Others

**B. Medicinal Use of plants**

Name:			Age:	Sex:	Ethnic/Caste Group:		Place:			Ward No.:	Date:	
S.No.	Scientific Name	Local Name		Use	Parts Use	Mode of Use	Habit	Place of Collection	Coll. No.	Altitude	Fl./Fr.	Remarks
		Nepali	Vernacular									

**C. Multiple Uses of Medicinal Plants**

Name:			Age:	Sex:	Ethnic/Caste Group:		Place:			Ward No.:	Date:		
S.No.	Scientific Name	Cultural	Medicinal	Edible	Fodder	Marcha	Fish Poisoning	Oil Extracts	Furniture	Handicraft	Firewood	Alcohol	Miscellaneous

## Appendix X: Name list of local informants

S. No.	Name of informant	Sex	Age	Caste	Category	Locality	Ward No.	Occupation
1	Anta Bir Khangaha	M	73	Mg.	Local informant	Pehaltandi	8	Agriculture
2	Archana Regmi	F	27	Ch.	Local informant	Khorandi	7	Job holder
3	Bhim Maya Gurung	F	46	Gr.	Local informant	Dhabyaha	7	Business
4	Bhim Narayan Chaudhary	M	35	Th.	Key informant	Sarkhun	8	Agriculture
5	Bhuna Chaudhary	F	55	Th.	Local informant	Katibansghari	8	Agriculture
6	Chaature Kumal	M	74	Ku.	Local informant	Nayagaun	3	Agriculture
7	Chhaniya Chaudhary	F	56	Th.	Key informant	Pehaltandi	8	Agriculture
8	Chhedri Ram Chaudhary	M	65	Th.	Key informant	Bhartaha	9	Agriculture
9	Chitra Bahadur Kumal	M	30	Ku.	Local informant	Kumalgaun	6	Agriculture
10	Dal Bahadur Thapa	M	45	Mg.	Lama	Bhartaha	9	Agriculture
11	Deevan Singh Rana	M	62	Mg.	Lama	Katibansghari	8	Agriculture
12	Dhan Bahadur Gurung	M	64	Gr.	Local informant	Sidre	5	Agriculture
13	Dhanpati Pandey	M	56	Br.	Key informant	Sunahi	8	Agriculture
14	Dhup Narayan Chaudhari	M	46	Th.	Key informant	Tallo Pidari	9	Agriculture
15	Dil Maya Ale Magar	F	60	Mg.	Key informant	Sarkhun	8	Agriculture
16	Gas Bahadur B.K.	M	53	Da.	Local informant	Kami Tole	8	Agriculture
17	Inu Maya Kumal	F	63	Ku.	Key informant	Kumalgaun	6	Agriculture
18	Ishwar Shrestha	M	38	Nw.	Local informant	Bagaicha	3	Business
19	Janaki Thada	F	35	Mg.	Local informant	Sunahi	8	Agriculture
20	Jeevan Chaudhari	M	36	Th.	Local informant	Katibansghari	8	Agriculture
21	Jeevan Pariyar	M	33	Da.	Local informant	Nayagaun	3	Social worker
22	Jhapindra Hamal	M	57	Ch.	Local informant	Baireni	6	Agriculture
23	Khim Kumari Pandey	F	61	Ch.	Key informant	Khorandi	7	Agriculture
24	Khumananda Pangen	M	56	Br.	Local informant	Khorandi	7	Agriculture
25	Luk Man Shrestha	M	61	Nw.	Key informant	Nayagaun	3	Business, Agriculture
26	Maheshwari Pokhrel	F	56	Br.	Jyotish	Gaudi	4	Agriculture
27	Man Kumari B.K.	F	40	Da.	Key informant	Kami Tole	8	Agriculture
28	Manbir Darij	M	54	Da.	Local informant	Sorha Ghare	8	Business
29	Manisara Lohani	F	60	Da.	Key informant	Katibansghari	8	Agriculture
30	Meena Kumari Darij	F	47	Da.	Local informant	Sorha Ghare	8	Business
31	Narayani Lamsal	F	30	Ch.	Local informant	Chukaha	1	Social worker
32	Padam Kumari Gurung	F	60	Gr.	Key informant	Sidre	5	Agriculture
33	Palta Panjiyar	M	66	Th.	Local informant	Hiraute	8	Agriculture
34	Prem Kumari Regmi	F	76	Br.	Key informant	Katibansghari	8	Agriculture
35	Purna Basi Chaudhary	M	61	Th.	Key informant	Bagaicha	6	Agriculture
36	Ram Bahadur B.K.	M	68	Da.	Local informant	Katibansghari	8	Agriculture
37	Ran Bahadur Thapa	M	53	Mg.	Local informant	Sunahi	8	Agriculture
38	Rewanti Khangaha	F	37	Mg.	Key informant	Pehaltandi	8	Agriculture
39	Sachitananda K.C.	M	58	Ch.	Local informant	Katibansghari	8	Agriculture
40	Santa Bahadur Bayambu	M	53	Mg.	Lama	Gaudi	4	Agriculture
41	Sanukanchha Gurung	M	47	Gr.	Local informant	Khayarghari	6	Agriculture
42	Shyam Shrestha	M	54	Nw.	Local informant	Bagaicha	3	Business
43	Singh Bahadur Kumal	M	70	Ku.	Key informant	Katibansghari	8	Agriculture
44	Som Bahadur Kumal	M	68	Ku.	Local informant	Kumalgaun	6	Agriculture
45	Sun Kumari Shrestha	F	65	Nw.	Local informant	Bagaicha	3	Business
46	Tek Bahadur Bayambu	M	60	Mg.	Local informant	Sunahi	8	Agriculture
47	Tila Ram Chapagain	M	55	Br.	Jyotish	Chukaha	1	Agriculture
48	Toyath Pandey	M	66	Br.	Key informant	Dhabyaha	7	Agriculture
49	Yagya Prasad Basyal	M	63	Br.	Local informant	Chisapani	7	Agriculture
50	Yam Kumari Pandey	F	55	Ch.	Key informant	Khorandi	7	Agriculture

## Appendix XI: Local Equivalent of Medicinal Terms

S. No.	Medicinal Terms	Local equivalent	S. No.	Medicinal Terms	Local equivalent
1	Abdominal disorder	Pet gad bad hunu	62	Inner hurts	Bhtri dukhai
2	Abdominal pain	Pet dukhnu	63	Insecticide	Kira marna
3	Abortion	Bachha	64	Insomnia	Nidra naparnu
4	Allergy	Bachcha tuhaunu, phyaknu	65	Intestinal obstruction	Disa rokinu
5	Animal poison	Bastulai bis hunu	66	Jaundice	Pyale
6	Anorexia	Bhok nalagnu	67	Joint pain	Jorni dukhnu
7	Arthritis	Aathi gathi dukhnu	68	Lame	Langado

8	Asthma	Dhamki , Dam	69	Leprosy	Kustha rog
9	B.P. High	Pressure badnu	70	Lower abdominal pain	Tallo pet dukhnu
10	Back bone pain	Dhad dukhnu	71	Malaria	Aulo
11	Bad smelling of child	Bachcha ganhaunu	72	Marasmus	Sukenas
12	Bald pattern	Khoiro niskanu	73	Measles	Dadura
13	Being fat	Motaunu	74	Menstruation disorder	Mainawari bigranu
14	Bile juice problem	Pitta ras samasya	75	Mental disorder	Paagal hunu
15	Black dandruff on face	Anuharma kalo poto aaunu	76	Migraine	Aadha kapal dukhnu
16	Bleeding (woman)	Mainawari huda dherai ragat bagnu	77	Mud wound	Hilole khutta khanu
17	Blood impurity in woman	Mahilako ragat kharab hunu	78	Mumps	Galphulo, hande galphulo
18	Body pain	Jiu dukhnu	79	Night blindness	Ratandho
19	Boils	Pilo, Khatira	80	Otitismedia	Kan pakeko
20	Breast engorged	Thunilo	81	Pneumonia	Pneumonia
21	Burning sensation of chilli	Khursani piro gadeko	82	Poisonous to dog	Kukur marnu
22	Burns	Polnu	83	Preliminary deafness	Bahiro
23	Cataract	Aakhama phula pamu	84	Production of more milk	Dudh badi aaunu
24	Chest pain	Chhati dukhnu	85	Psycho disorder	Sato janu
25	Child sickness	Ketaketi byatha (Jwaro, pakhala, vomiting, sato janu, etc.)	86	Pterygium	Aakhama aano aaunu
26	Cholera	Haija	87	Red urine	Rato pisab hunu
27	Cold	Sardi	88	Retention of placenta	Sal najharne
28	Conjunctivitis	Aankha paknu	89	Retention of urine	Pisab nahunu
29	Constipation	Pet saaf nahunu, Kabjiyat	90	Ring worm	Dad
30	Coryza	Pinas	91	Running nose	Rugha
31	Cough	Khoki	92	Scabies	Luto
32	Cuts	Katnu	93	Scorpio bite	Bichchhile toknu
33	Dandruff	Chaya	94	Sexually active	Youn bardak
34	Dental carries	Dat kirale khanu	95	Sickness of domestic animal	Bastu birami hunu
35	Diarrhoea	Pakhala lagnu	96	Skin Disease	Chhalako rog
36	Diphtheria	Bhyagute rog	97	Snake bite	Sarpale toknu
37	Dizziness	Chakkar aaunu	98	Sprain	Sarke markeko
38	Dog bite	Kukurle toknu	99	Stomach pain	Pet dukhnu
39	Dysentery	Ragatmasi	100	Stomatitis	Jibroma khatira aaunu
40	Epilepsy	Chhare rog	101	Sugar	Chini rog
41	Eye defect	Aankha kamjor hunu	102	Swelling	Sunninu
42	Fever	Khadjuro, jwaro	103	Syphilis	Bhiringi rog
43	Fish poisoning	Machha marna	104	Tapeworm	Namle juka
44	Flowing out of black blood (woman)	Mahilama kalo ragat aaunu	105	Tetanus	Dhanustankar
45	Foot crack	Khutta phutnu	106	Throat boils	Ghantima ghau hunu
46	Fracture	Bhachinu	107	Throat pain	Ghanti dukhnu
47	Gastritis	Gano, bayu gola, pet dhadinu	108	Tooth strong	Dat baliyo banaunu
48	Gingivitis	Harsa	109	Toothache	Dat dukhnu
49	Gonorrhoea	Dhatu rog	110	Tumour formation	Masu palaunu
50	Growth of gangrene	Kira parnu	111	Typhoid	Gadeko jwaro, kukhat
51	Harphzoster	Janaikhatira	112	Ulcer	Ulcer
52	Headache	Tauko dukhnu	113	Uterus prolapse	Aang khasnu
53	Heart pain	Mutu dukhnu	114	Uterus swelling	Pisab thaili sunninu
54	Hen's sickness	Kukhura birami hunu	115	Vomiting	Banta hunu
55	Hot	Garmi	116	Vomiting with blood	Bantama ragat dekha parnu
56	Hot and cold	Sardi ra garmi	117	Waist pain	Kammar dukhnu
57	Hyperplasia of spleen	Pitta badnu	118	Weakness	Kamjori
58	Increase energy	Shakti bardak	119	White urine	Seto pisab hunu
59	Increase weight	Taul badnu	120	Whitening of tongue	Jibro seto hunu
60	Indigestion	Apach,tus	121	Worm infestation	Churna, juka pamu, mate
61	Infertility	Bachcha nahunu	122	Wound	Ghau

**PHOTOPLATES**



*Asparagus racemosus* Willd.



*Bauhinia purpurea* L.



*Begonia picta* Sm.



*Callicarpa macrophylla* Vahl



*Calotropis gigantea* (L.) Dryand.



*Costus nspeciosus* (J. Konig.) Sm.



*Curculigo orchioides* Gaertn.



*Datura metel* L.



*Eclipta prostrata* (L.) L.



*Elephantopus scaber* L.



*Euphorbia hirta* L.



*Holarrhena pubescens* (Buch.-Ham.) Wall. ex G. Don



*Jatropha curcus* L.



*Lawsonia inermis* L.



*Mimosa rubicaulis* subsp.  
*himalayana* (Gamble) H. Ohashi



*Morus macroura* Miq.



*Phoenix loureiri* Kunth



*Phyllanthus emblica* L.



*Plumeria rubra* L.



*Rauwolfia serpentina* (L.) Benth. ex Kurz



*Semecarpus anacardium* L.f.



*Senna tora* (L.) Roxb.



*Solanum anguivi* Lam.



*Solanum virginianum* L.





*Solena amplexicaulis* (Lam.) Gandhi



*Tamarindus indica* L.



*Thespesia lampas* (Cav.) Dalzell & Gibson



*Tridax procumbens* L.



Local people collecting plant



Poor transportation in study area



Researcher interviewing local people



Researcher interviewing local people