Ethnomedicinal Plant- A Review

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Authors’ contributions

This work was carried out in collaboration among all authors. Author CP designed the study, performed the statistical analysis, wrote the protocol and wrote the first draft of the manuscript. Authors NK and RB managed the analyses of the study. Author AP managed the literature searches. All authors read and approved the final manuscript.

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ABSTRACT

The ethno-botanical study is having immense importance in the field of medical science; it has a unique importance in the branch of science with much attention. Ethno botany has a special relationship between people and plants. Traditional medicine and ethno plants are very important in the traditional community. The use of medicinal plants has been done since many ages and now it is also considered as a modern medicine. Medicinal plants have been used by various cultures and ethnic groups. Around 80% of conventional medicines used in primary healthcare are extracted from plants around the world. India is one of the world's mega biodiversity nations, with lush vegetation and a vast array of medicinal plants and herbs. Herbal medicines have a bright future in both developing and developed countries.

Keywords: Ethno-plant; traditional medicine; ayurveda; unani; siddha.

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1. INTRODUCTION

Ethnomedicine is more cultural, preferable, mystical, and less clinical. Ethno-botany is the study of the direct relationship between humans and plants. Botanist John William Harsh Berger coined the term ethno-botany in 1895 to describe the study of plant uses by indigenous peoples [1]. The medicinal and nutritional value of these plants is derived from a variety of Phyto molecules with important pharmacological properties [2]. In recent day’s human civilization the most used and recognized form of medicine is plant derived medicinal products throughout the world [2]. Plants generate some types of secondary metabolites which are biosynthetically produced from primary metabolites and these phyto compounds are the primary sources of herbal, pharmaceutical and nutraceutical formulations [2]. India has a long history of herbal medicine, and it is widely accepted among Indians that they were familiar with a much greater number of medicinal plants than residents of any other country on the planet [3].

Ethno medicine is the branch of conventional medicine that is dealing with the cultural interpretation of fitness, disease, and sickness, as well as the method of pursuing healthcare and healing practices [4]. Conventional medicine is the aggregate of all information, expertise, practice-based hypotheses, values, and experiences that are used to maintain health, as well as to prevent, diagnose, improve, or treat physical and mental disease in various cultures [5]. Conventional medicine is a term used to describe alternative medicine that has been accepted by other populations [5].

Considering the potentiality, availability and cost effectiveness various health practitioners and researchers are continuously advising for taking different ethno-medicinal plants or its derivatives to get protection from several health ailments [6,7].

In this current review article the mentioned plants have high medicinal utility from ancient time and are rich with various bioactive ingredients. Also focus on ethnomedicine magical practices for curing diseases.

2. ETHNOMEDICINE AND TRIBAL HEALTH

A man-made world arose from the beginnings of human beings on Earth to meet their various primary needs, including hunger, thirst, sex, love, care, affection, and shelter, as well as religious, political, and socio-economic requirements. Medicinal awareness has been created as a result of this for the purposes of healthcare and body fitness. They discovered medicinal plants, animals, and minerals that could be used to treat diseases [8].

Except for Allopathy, all other Indian medical systems rely heavily on herbal drugs for disease care, including Ayurveda, Siddha, Naturopathy, Unani, Homeopathy, and Ethno-medicine. Ayurveda is the world’s oldest medicinal method, with origins dating back to between 4500 BC and 500 BC during the Vedic period, with historical texts between 1000 and 2000 BC [9].

Tribal people live in forested areas and are familiar with a variety of plants and herbs that they use for food and medicine. Herbal medical practitioners in India have used over 6000 of the 15,000 herb plant species as herbal drugs or medicine [8]. According to Manu-Smriti, plants are mindful and respond to pain and touch. They proclaimed that plants are sacred in origin and designated several plants as the “Abodes of God,” demonstrating knowledge of the significance of plants and forests in preserving the necessary environmental circumstances for the healthy expansion and creation of the living planet [10].

Tribals also have ethnogynecological awareness (ethnogynecology) for female health issues and gynecological problems such as menstrual pain, menopause, leucorrhoea, miscarriage, delivery, and abortion, among other items. Every tribal community uses these herbs in a special and different way [11].

3. INDIAN TRADITIONAL MEDICINAL PLANTS

India has more than 8,000 medicinal plant species, as per the Botanical Survey of India. Traditional healing systems have a long history in the country, and many of them include the use of these plants.
Table 1. Some traditional medicinal plants that are used to treat a variety of illnesses

<table>
<thead>
<tr>
<th>Sr. no.</th>
<th>Botanical name</th>
<th>Family</th>
<th>Common name</th>
<th>Phytochemical compounds</th>
<th>Ethno-medicinal uses</th>
<th>Pharmacological uses</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td><em>Azadirachta indica</em></td>
<td>Meliaceae</td>
<td>Neem</td>
<td>Phenolic compounds, alkaloids, glycosides, terpenoids, flavonoids, azadirachtin, nimbin, azharon, nimbidol, azadirone, melianol, steroids, and tannins.</td>
<td>Worm, influenza rheumatism, asthma, bacterial infection, infestations tuberculosis, diarrhea, jaundice, dysentery, smallpox measles, urinary and inflamed gums, diseases are all handled with plant parts.</td>
<td>• Antimicrobial&lt;br&gt;• Anti-cancer&lt;br&gt;• Anti-fertility&lt;br&gt;• Anti-inflammatory&lt;br&gt;• Anti-malarial&lt;br&gt;• Antioxidant&lt;br&gt;• Neuro-protective&lt;br&gt;• Insect repellent [12]</td>
</tr>
<tr>
<td>2</td>
<td><em>Mentha piperita</em></td>
<td>Lamiaceae</td>
<td>Mint</td>
<td>Flavonoids, carbohydrates, alkaloids, phenols, coumarin, saponin, steroids, essential oils (menthol, menthone, pulegone, Menthofuran) azulenes, choline, carotenoids and tannins.</td>
<td>It is used in indigestion, diarrhoea, hyperacidity, anemia, morning sickness, bad breath and gum problem, Irritable bowel syndrome, tuberculosis, bronchitis, eczema, acne, anxiety, Crohn's disease, colitis, gallbladder, liver complaints.</td>
<td>• Antibacterial&lt;br&gt;• Antioxidant&lt;br&gt;• Anti-inflammatory&lt;br&gt;• Anti-cancer&lt;br&gt;• Anti-diarrheal&lt;br&gt;• Anti-pyretic&lt;br&gt;• Anti-parasitic&lt;br&gt;• Anti-tussive [13]</td>
</tr>
<tr>
<td>3</td>
<td><em>Ocimum sanctum</em></td>
<td>Lamiaceae</td>
<td>Holy basil</td>
<td>Phenolics, flavonoids, phenyl propanoids, terpenoids, fatty acid, ursolic acid, apigenin, luteolin, steroids, eugenol, and carvacrol.</td>
<td>It is used for nausea, cold and flu, fever, indigestion, stress, anxiety, earache, bronchitis, malaria, diabetes, asthma, heart disease, snakebite antidote, hepatitis, tuberculosis, genitourinary disorders, migraine, acne, anti-aging purposes</td>
<td>• Antimicrobial&lt;br&gt;• Anti-tussive&lt;br&gt;• Antioxidant&lt;br&gt;• Anti-diabetic&lt;br&gt;• Anti-pyretic&lt;br&gt;• Anti-inflammatory&lt;br&gt;• Anti-arthritic [14,15]</td>
</tr>
<tr>
<td>4</td>
<td><em>Zingiber officinale</em></td>
<td>Zingiberaceae</td>
<td>Ginger</td>
<td>Phenolic compounds, flavonoids, steroids, triterpenoids, glycosides, tannins, saponins, proteins,</td>
<td>Nausea, vomiting, nose bleeds, rheumatism, chest congestion, stomach upset, coughs, cholera, cold,</td>
<td>• Anthelmintic&lt;br&gt;• Anti-arthritic&lt;br&gt;• Anti-cancer&lt;br&gt;• Anti-diabetic</td>
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<tr>
<td>5</td>
<td><em>Allium cepa</em></td>
<td>Amaryllidaceae</td>
<td>Onion</td>
<td>Flavonoids, carbohydrates, proteins, saponins, alkaloids, glycosides, reducing sugars,</td>
<td>It is mainly used for common cold, normalizes blood pressure, prevent diarrhea, inhibits microbial infection,</td>
<td>• Anti-diabetic</td>
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<td>oils and tannins.</td>
<td>increases appetite, treats diabetes, inhibits cancer cell growth, stimulates respiratory tract, helpful in swollen</td>
<td>• Anti-cancer</td>
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<td></td>
<td>feet, hair</td>
<td>• Antimicrobial</td>
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<td></td>
<td></td>
<td>• Antioxidant [12]</td>
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<td>6</td>
<td><em>Curcuma longa</em></td>
<td>Zingiberaceae</td>
<td>Turmeric</td>
<td>Carbohydrates, protein, curcumin, tannins, alkaloids, saponins, flavonoids, terpenoids</td>
<td>It is used to cure burns, cuts, improves digestion, dissolves gallstone, relieves arthritis, prevents cancer,</td>
<td>• Antioxidant</td>
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<td>and cardiac glycosides, coumarins, and steroids</td>
<td>helps in Alzheimer, and inhibits bacteria, virus, fungi, and parasites, cures acne, pimples, allergy, and pores</td>
<td>• Antimicrobial</td>
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<td>• Antiseptic</td>
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<td>• Anti-inflammatory</td>
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<td></td>
<td>• Anti-carcinogenic</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td>• Antimicrobial</td>
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<tr>
<td>7</td>
<td><em>Spinaciaoleracea</em></td>
<td>Amaranthaceae</td>
<td>Spinach</td>
<td>Flavonoids, carotenoids, β-carotene, apocyanin, ascorbic acid, proteins, amino acids,</td>
<td>It is used in digestion, liver and kidney diseases, diuretic, laxative, inflammation of the lungs, bowels, sore</td>
<td>• Anti-diabetic</td>
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<td>steroids, tannins, carboxydrates, carboxydrates, carboxydrates, anthroquinones, coumarin,</td>
<td>throat, ring worm scabies, constipation, anemia, diabetes, fever, brain and heart disease, urinary infection,</td>
<td>• Antioxidant</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td>and saponins.</td>
<td>gallstones</td>
<td>• Anti-inflammatory</td>
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<td></td>
<td>• Anti-carcinogenic</td>
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<td>• Antimicrobial</td>
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<td>Protection against Gamma Radiation</td>
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<td>Hepato-protective [17]</td>
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<tr>
<td>8</td>
<td><em>Mangifera indica</em></td>
<td>Anacardiaceae</td>
<td>Mango</td>
<td>Alkaloids, flavonoids, saponins, tannins, phenols, ascorbic acid, carotenoids,</td>
<td>The leaves are used to treat burns and scalds, used for skin disorders, chewed to</td>
<td>• Analgesic</td>
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<td></td>
<td></td>
<td>• Antimicrobial</td>
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</tbody>
</table>

*Carbohydrates, amino acids and proteins, volatile oil.*

*diarrhoea, stomachache, baldness, toothache, and snakebite are all handled with this herb.*

*Anti-hypertensive*  
*Anti-microbial*  
*Antioxidant*  
*Anti-diabetic*  
*Anti-cancer*  
*Antimicrobial*  
*Antioxidant*  
*Anti-platelet*  
*Anti-inflammatory*  
*Anti-thrombotic*  
*Anti-hypertensive [16]*  
*Antioxidant*  
*Antimicrobial*  
*Antiseptic*  
*Anti-inflammatory*  
*Anti-carcinogenic*  
*Anti-allergic*  
*Anti-diabetic [16]*  
*Analgesic*  
*Antimicrobial*
<table>
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<tr>
<th>Sr. no.</th>
<th>Botanical name</th>
<th>Family</th>
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<th>Pharmacological uses</th>
</tr>
</thead>
</table>
| 9      | *Citrus limon*    | Rutaceae    | Lemon       | Alkaloids, flavonoids, limonoids, steroids, terpenoids, carotenoids, tannic acids and phenolic compound. | Tighten gums, asthma, and cough; And the bark is used to treat fever, rheumatism, cholera, and ulcerated tongue. | Anti-convulsant
Anti-inflammatory
Anti-cancer
Gastro-protective
Hepato-protective [17] |
| 10     | *Musa paradisiaca* | Musaceae    | Banana      | Alkaloids, flavonoids, tannins, phenolic compounds, carotenoids, anthocyanins, and cardiac glycosides. | It cures depression, treats emotional sickness, increase blood and cures anemia, reduces risk of blood pressure, menstrual cramp, helps to reduce morning sickness, constipation, ulcers, mosquito bites. | Anti-diabetic
Anti-hypertensive
Antioxidant
Anti-diarrheal
Antimicrobial
Anti-cancer
Anti-ulcer [17] |
| 11     | *Malus domestica* | Rosaceae    | Apple       | Phenolics, flavonoids and carotenoid, saponin, glycosides and steroid, carbohydrates, and proteins. | Used in kidney stones, constipation, blood formation, diarrhoea, high blood pressure, cardiac problems, useful in sore eyes, inflammation, Alzheimer’s, cancer, diabetes, gallstone, obesity loss. | Antioxidant
Anti-inflammatory
Antimicrobial
Anti-depressant
Anti-diabetic
Anti-cancer
Anti-asthmatic [17] |
<table>
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<th>Pharmacological uses</th>
</tr>
</thead>
<tbody>
<tr>
<td>12</td>
<td>Coriandrum sativum</td>
<td>Apiaceae</td>
<td>Coriander</td>
<td>Flavanoids, alkaloids, tannins, saponin, terpenoids, sterol, carbohydrate, protein, and fat.</td>
<td>It is used to treat indigestion, worm infections, rheumatism, convulsions, insomnia, anxiety, joint pain, used as a diuretic herb, skin disease, and irritable bowel syndrome.</td>
<td>• Antioxidant&lt;br&gt;• Diuretic&lt;br&gt;• Anti-diabetic&lt;br&gt;• Sedative&lt;br&gt;• Antimicrobial&lt;br&gt;• Anti-convulsant&lt;br&gt;• Anthelmintic syndrome, diarrhoea. [17]</td>
</tr>
<tr>
<td>13</td>
<td>Citrus sinensis</td>
<td>Rutaceae</td>
<td>Orange</td>
<td>Fats, terpenoids, steroids, and amino acids, ascorbic acid, and carotenoids. Phenolics, flavonoids, alkaloids, carbohydrates, fixed oils, and lipids, tannins, sugars, proteins, terpenoids, steroids, amino acids.</td>
<td>The fruit is a blood purifier and appetiser that is used to treat bilious diarrhoea, acne, skin disease, itching, obesity, swollen spleen, constipation, coughs, dyspepsia, digestive tract ailments, nerve disorders, blood pressure, headaches, and rheumatism.</td>
<td>• Antimicrobial&lt;br&gt;• Anti-parasitic&lt;br&gt;• Anti-proliferative&lt;br&gt;• Insecticidal&lt;br&gt;• Relaxant, Sedative&lt;br&gt;• Anxiolytic&lt;br&gt;• Protective of UV&lt;br&gt;• Anti-osteoporotic&lt;br&gt;• Anti-obesity&lt;br&gt;• Hypocholesterolemic&lt;br&gt;• Antioxidant [17]</td>
</tr>
<tr>
<td>14</td>
<td>Camellia sinensis</td>
<td>Theaceae</td>
<td>Green tea</td>
<td>Flavonoids, tannins, caffeine, polyphenolic compound, acid, theobromine, anthocyanins, theophylline, and gallic acid.</td>
<td>Green tea aids weight loss and digestion, reduces blood sugar levels, and is used to treat cancer, heart disease, high cholesterol, esophageal, Alzheimer's and Parkinson's disease, tooth decay, depression, good sleep, and wrinkles</td>
<td>• Antioxidant&lt;br&gt;• Anti-carcinogenic&lt;br&gt;• Anti-arteriosclerotic&lt;br&gt;• Antimicrobial&lt;br&gt;• Anti-cancer&lt;br&gt;• Anti-diabetic&lt;br&gt;• Weight control&lt;br&gt;• Anti-hypertensive&lt;br&gt;• Cardio-protective [17]</td>
</tr>
<tr>
<td>15</td>
<td>Prunus dulcis</td>
<td>Rosaceae</td>
<td>Almonds</td>
<td>Flavonoids, carotenoid, phenolics, tannins, lignans, anthocyanins, phytosterols,</td>
<td>Almond has memory-enhancing properties and is used to treat insomnia,</td>
<td>• Antioxidant&lt;br&gt;• Anti-aging&lt;br&gt;• Hepato-protective</td>
</tr>
<tr>
<td>Sr. no.</td>
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<tr>
<td>16</td>
<td><em>Marsilea quadrifolia</em></td>
<td>Marsileaceae</td>
<td>Marsilea</td>
<td>Polyphenols, tannins, saponins, flavonoids, steroids, terpenoids, alkaloids, carbohydrates, and proteins.</td>
<td>headaches, respiratory problems, colic pain and peptic ulcer disease, constipation, skin radiance and fairness, hair collapse, scratching, kidney stone, ladder, and teeth strengthening.</td>
<td>• Memory Improving&lt;br&gt;• Anxiolytic Activity&lt;br&gt;• Hypoglycemic&lt;br&gt;• Anti-inflammatory&lt;br&gt;• Immuno-stimulant [17]</td>
</tr>
<tr>
<td>17</td>
<td><em>Lactuca sativa</em></td>
<td>Asteraceae</td>
<td>Lettuce</td>
<td>Phenols, flavonoids, triterpenoid, saponins, anthocyanin, β- carotene, ascorbic acid, riboflavin, niacin, carotene, iodine, and fluorine.</td>
<td>It's used to treat colds, respiratory problems, asthma, insomnia, anaemia, migraines, epilepsy, diarrhoea, bronchitis, hepatitis, snake bites, skin disorders, and inflammation, as well as to improve memory and reduce blood sugar levels.</td>
<td>• Anti-tussive&lt;br&gt;• Analgesic&lt;br&gt;• Anti-diabetic&lt;br&gt;• Anti-pyretic&lt;br&gt;• Antimicrobial&lt;br&gt;• Anti-tumour&lt;br&gt;• Anti-inflammatory&lt;br&gt;• Hepato-protective&lt;br&gt;• Antioxidant [17]</td>
</tr>
<tr>
<td>18</td>
<td><em>Crinum asiaticum</em></td>
<td>Amaryllidaceae</td>
<td>Spider Lily</td>
<td>Alkaloids, tannins, phenols, flavonoids, cardiac glycosides, triterpenes, steroids, saponins, ambelline, lycoriside, crinine, powelline, and ungeremine.</td>
<td>It is used to treat injury and inflamed joints, carbuncles and tumours, poisoned arrow wounds, bites and stings, swellings, fever, inflammation, masses, stop bleeding and treat gonorrhoea, cause</td>
<td>• Analgesic&lt;br&gt;• Antimicrobial&lt;br&gt;• Anti-inflammatory&lt;br&gt;• Antiviral&lt;br&gt;• Anti-cancer&lt;br&gt;• Anti-tumour</td>
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<tr>
<td>19</td>
<td><em>Cicer arietinum</em></td>
<td>Fabaceae</td>
<td>Chick Peas</td>
<td>Alkaloids, carbohydrates, proteins, amino acids, fixed oils, phytosterols, phenolic compounds and tannins, flavonoids, glycosides, saponins, and amino acids are only a few of the several compounds contained in plants.</td>
<td>Used for insufficient milk or sperm, kidney stones, urine problems, menstruation, treats bronchitis, sunstroke, snake bites, diabetes, hypertension, itchy skin, tumor, increases bone health, controls blood pressure, prevent cancer, develops memory and thinking power.</td>
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</tr>
<tr>
<td>20</td>
<td><em>Ipomoea aquatica</em></td>
<td>Amaranthaceae</td>
<td>Water spinach</td>
<td>Flavonoids, amino acids, alkaloids, <em>ipod</em>, hormones, saponins, phenols, reducing sugars, tannins, -carotene, glycosides, and minerals are some of the compounds found in plants.</td>
<td>It lowers cholesterol, treats jaundice and liver damage, anaemia, indigestion, constipation, diabetes, heart attack prevention, lowers blood pressure, improves immunity, treats ulcer, menstrual pain, fever, and rejuvenates skin.</td>
<td></td>
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<tr>
<td>21</td>
<td><em>Allium cepa</em></td>
<td>Amaryllidaceae</td>
<td>Onion</td>
<td>Flavonoids, proteins, glycosides, alkaloids, saponins, carbohydrates, acid compounds, reducing sugars, oils and tannins.</td>
<td>It is primarily used to treat the common cold, normalise blood pressure, prevent diarrhoea, inhibit microbial infection, increase appetite, treat diabetes, inhibit cancer cell development, stimulate the respiratory tract, and aid in the treatment of swollen feet and hair.</td>
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<tr>
<td>22</td>
<td><em>Spinacia oleracea</em></td>
<td>Amaranthaceae</td>
<td>Spinach</td>
<td>Flavonoids, carotenoids, β-</td>
<td>It's used for digestion, liver</td>
<td>Anti-diabetic</td>
</tr>
</tbody>
</table>

*Anti-mitotic [17]  
Antioxidant  
Anti-hypertensive  
Anti-cancer  
Anti-diabetic  
Anti-inflammatory  
Antimicrobial  
Anti-pyretic  
Anti-cancer [17]  
Anti-diarrheal  
Antiseptic  
Anti-cancer [17]  
Anti-diabetic  
Anti-cancer  
Antimicrobial  
Antioxidant  
Anti-platelet  
Anti-inflammatory  
Anti-thrombotic  
Anti-hypertensive [17]  
Anti-diabetic
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</tr>
</thead>
</table>
| 23     | *Actinidia deliciosa* | Actinidiaceae | Kiwi        | Flavonoids, polyphenols, anthocyanin, carotenoids, alkaloids, tannin, proteins, triterpenoids, carbohydrate, and minerals. | Kiwi is used for digestive health, hair growth, and strong bones, as well as for eye disease, pregnancy, stress, high blood pressure, and cancer prevention, as well as to minimize kidney stone formation, lower blood sugar levels, and improve sleep. | • Anti-diabetic  
• Hepato-protective  
• Dermatological Activity  
• Antioxidant  
• Anti-inflammatory  
• Cardio-protective  
• ACE Inhibitor [19] |
| 24     | *Prunus dulcis*     | Rosaceae   | Almonds     | Flavonoids, carotenoid, phenolics, tannins, lignans, anthocyanins, phytoestrogens, polyphenols, and fatty acids. | Almond has memory-enhancing properties and is used to treat insomnia, headaches, respiratory problems, colic pain and peptic ulcer disease, constipation, skin radiance and fairness, hair collapse, scratching, kidney stone, ladder, and teeth strengthening. | • Antioxidant  
• Anti-aging  
• Hepato-protective  
• Memory Improving  
• Anxiolytic Activity  
• Hypoglycemic  
• Anti-inflammatory  
• Immuno-stimulant [17] |
| 25     | *Marsilea quadrifolia* | Marsileaceae | Marsilea    | Polyphenols, flavonoids, terpenoids, saponins, steroids, alkaloids, tannins, carbohydrates, and proteins. | It's used to treat colds, respiratory problems, asthma, insomnia, anaemia, migraines, epilepsy. | • Anti-tussive  
• Analgesic  
• Anti-diabetic  
• Anti-pyretic |
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<th>Ethno-medicinal uses</th>
<th>Pharmacological uses</th>
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| 26     | *Nigella sativa*     | Ranunculaceae | Black cumin | Alkaloids, carboxylic acid, phenol, resin, saponin, coumarins, and steroid, protein, fat, and carbohydrates. | diarrhoea, bronchitis, hepatitis, snake bites, skin disorders, and inflammation, as well as to improve memory and reduce blood sugar levels. | • Antimicrobial  
• Anti-tumour  
• Anti-inflammatory  
• Hepato-protective  
• Antioxidant [17] |
| 27     | *Malus domestica*    | Rosaceae  | Apple       | Phenolics, flavonoids and carotenoid, saponin, glycosides and steroid, carbohydrates, and proteins. | Used in kidney stones, constipation, blood formation, diarrhoea, high blood pressure, cardiac problems, useful in sore eyes, inflammation, Alzheimer's, cancer, diabetes, gallstone, obesity loss. | • Antioxidant  
• Anti-inflammatory  
• Anti-diabetic  
• Anti-depressant  
• Antimicrobial  
• Anti-cancer  
• Anti-asthmatic [16] |
| 28     | *Musa paradisiaca*   | Musaceae  | Banana      | Alkaloids, flavonoids, tannins, phenolic compounds, carotenoids, anthocyanins, and cardiac glycosides. | It reduces the risk of blood pressure, menstrual cramps, morning sickness, constipation, ulcers, and mosquito bites by curing depression, treating emotional sickness, raising blood and curing anaemia. | • Anti-diabetic  
• Anti-hypertensive  
• Antioxidant  
• Anti-diarrheal  
• Antimicrobial  
• Anti-cancer  
• Anti-ulcer [16] |
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</table>
| 29      | *Petroselinum crispum* | Apiaceae | Parsley     | Flavonoids, volatile oils, proteins, minerals, carotenes, carotenoids, ascorbic acid, coumarins, tocopherol, myristicin, essentials oils. | Prevents tumour, liver disease, kidney stones, high blood pressure, diabetes, obesity, anaemia, and urinary infections, bruising, cough, broken or chapped skin, stomach disorders, swelling, and insect bites. | • Antioxidant  
• Anti-diabetic  
• Anti-platelet  
• Antimicrobial  
• Hypotensive  
• Anti-pyretic  
• Gastro-protective  
• Cyto-protective  
• Laxative  
• Analgesic [20] |
| 30      | *Vitis vinifera* | Vitaceae | Grapes      | Flavonols, myricetin, flavon-3-ols, flavonoids, quercetin, tannin, peonidin, anthocyanin, cyanidin, ellagic acid, and Proanthocyanidins. | Fresh fruits, consumed or processed into wine, juice, leaves are used in diarrhoea, unripe fruit is astringent, used in throat affections, laxative, stomachic, consumption, uterine tumours, and liver hardness, laxative, stomachic, consumption, uterine tumours, and liver hardness | • Antioxidant  
• Hepato-protective  
• Anti-carcinogenic  
• Anti-bacterial  
• Anti-viral  
• Anti-diabetic  
• Cardio-protective [17] |
4. RECENT STUDIES ON ETHANO-MEDICINAL PLANTS

4.1 Ethnomedicine Knowledge of Iranian Traditional Healers and the Novel Coronavirus Disease 2019 (COVID-19)

The coronavirus disease 2019 (COVID-19) outbreak started in China in December 2019, and quickly spread across the world. Based on their ethnopharmacological expertise, Iranian traditional healers have used a number of medicinal plants to prevent and treat COVID-19. The aim of this study was to look into Iranian traditional healers' ethnomedicinal awareness in order to relieve COVID-19 signs and symptoms. Because of the COVID-19 pandemic's limits, 26 traditional healers in Kerman and Zahedan, Iran, conducted oral interviews. The names of COVID-19 prescribed remedies were compiled, and their scientific names were confirmed. Following that, a thorough search of scientific databases was conducted. Finally, herbs with some proven properties linked to the respiratory system were listed; these herbs were most likely useful in the prevention or treatment of COVID-19. Althaea officinalis, Hordeum vulgare, Zataria multiflora, Zingiber officinale, Malva sylvestris, Allium sativum, Glycyrrhiza glabra, and Matricaria chamomilla are considered as the most popular herbs by Iranian traditional healers for prevention and/or treatment of COVID-19. Recent research has shown that the above herbs listed are effective in treating respiratory disorders like influenza. They also possess properties that are antitussive and immune-modulating. Since there is no successful treatment for COVID-19, conventional medicine and ethnomedicine information can be used as good sources for new drug development [21].

4.2 Ethnomedicinal Applications of Forest Plants for the Treatment of Common Ailments by Gond and Madia Tribes of Maharashtra, India

The aim of this study was to record the various ethnomedicinal plants used by the Gond and Madia Gond tribes in Maharashtra's Gadchiroli District (India). Following screening, 120 people from the Gond and Madia tribes were interviewed about their use of medicinal plants. A total of 79 medicinal plants were found as a result of this interaction, which they claimed to use for the treatment of 34 ailments. Angiosperms were represented by 30 families and 57 genera of plants. The informant consensus factor (ICF) and relative frequency of citation (RFC) were used to determine ethno botanical indices. The most important plant family was Fabaceae (10.1%), followed by Mimosaceae (7.6%), Moraceae (7.6%), Caesalpiniaceae (6.3%) and Rubiaceae (6.3%). Some of the dominant genera reported were Ficus (5 species), Acacia (3 species), Terminalia (3 species), and Albizia (2 species). Dermal disorders, blood-related diseases, diabetes, edema, and fever were among the illnesses claimed to be treated. The ICF values for various ailments ranged from 0.0 to 0.84 in this analysis, with swelling ailments having the highest ICF of 0.84, based on 27 reports and five plant species. The highest RFC value (0.45) was found for Acacia catechu (Family: Mimosaceae) and the lowest RFC value (0.09) was found for Emblica officinalis, (Family: Euphorbiaceae) [22].

5. CONCLUSION

The current review examines the broad range of phytochemicals, pharmacological, therapeutic, and nutritional potentialities of some essential Indian traditional medicinal plants. According to the above analysis and explanations, these medicinal plants have been used as a significant medicinal, pharmacological, therapeutic, pharmaceutical, and nutritional source for a variety of diseases, which are briefly described in the current review report. The analysis study reveals that commonly used Indian medicinal plants are much more beneficial than previously thought worthy of recovery from various diseases or combating some other serious life-threatening diseases.

CONSENT

It’s not applicable.

ETHICAL APPROVAL

It’s not applicable.

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COMPETING INTERESTS

Authors have declared that no competing interests exist.
REFERENCES


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