

### Short Communication

## Traditional medicinal plants and beliefs system of conservation of sacred lake Prashar, Himachal Pradesh, India

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Available online at: [www.isca.in](http://www.isca.in), [www.isca.me](http://www.isca.me)

Received 5<sup>th</sup> January 2018, revised 4<sup>th</sup> March 2018, accepted 9<sup>th</sup> March 2018

### Abstract

Prashar lake is situated in Himachal Pradesh, named after Parashar Rishi, one of the seven sages of Saptrishi. There are numerous cultural and traditional beliefs associated with this lake play an important role in conservation of the lake. Total 25 traditional medicinal plants were present in the Prashar lake landscape area. It was studied that most of the traditional plants have curative value to treat stomach related problems, fever, Asthma, Arthritis and Analgesic problems. The lake water is used as "Prasad" (sacrament) of the God, as lake water has high medicinal property. Water from the catchment area flows into the lake through many medicinal plants including *Acorus calamus* L., which accounts for medicinal properties in water. This lake reflects a holistic interaction of human and nature.

**Keywords:** *Acorus calamus* L., Prasad, traditional beliefs, sacred lake, pilgrimage, medicinal plants.

### Introduction

Worship of a characteristic scene is a detectable truth which is being trailed by the wide range of individuals, yet particularly saw in those territories with animist roots and a convention of precursor reverence<sup>1</sup>. The Himalaya is a place that is known for various hallowed destinations. Mountains are regularly observed as the sanctuary of divine beings. Individuals tend to look into the statures of the mountains as wellspring of gifts most remarkably, water, fruitfulness, life and recuperating<sup>2</sup>. Adoration of a natural landscape is an observable fact which is being followed by wide range of individuals, yet particularly saw in those territories with animist roots and a convention of precursor reverence<sup>1</sup>. The Himalaya is a land of numerous sacred sites. Mountains are regularly observed as the sanctuary of divine beings. People tend to look up the heights of the mountains as wellspring of gifts most remarkably, water, fruitfulness, life and recuperating<sup>2</sup>. Himachal Pradesh, the land of gods, known as 'Dev Bhoomi' has several sacred sites sacred mountains, natural springs and lakes. One of them is a high altitude lake, the Prashar lake. This sacred site is revered by the local people. The Prashar lake is a part of the cultural and natural heritage of the people of the Mandi district of Himachal Pradesh. At the interface of human culture and nature, it can provide greater opportunities for the development of religious tourism and the visitors will get the chance to know about the cultures, and learn about the nature. The water of this sacred site is protected from any kind of contamination. The various legends, myths and rituals associated with this sacred lake contribute significantly to biodiversity conservation and maintain its water quality. The objective of this study is to

emphasize on the myths, beliefs and use of traditional medicinal plants present in the Prashar site which maintained by the local people and retain the pristine beauty of the Prashar lake. During the study various traditional medicinal plant were studied in Prashar sacred site which is used to heal various diseases.

### Methodology

**The study area:** The Prashar lake is arranged in the Mandi area of Himachal Pradesh (Latitude 31°45'30"N; longitude 77°06'04.30"E) at an elevation of 2,730 m above sea level in the western Himalaya. The lake is oval in shape with an area of 1.30 ha. In this lake, there is a circular floating island, covered with dense macrophytic vegetation, which keeps changing its position throughout the year. The sacred lake is surrounded by small mountain peaks.

**Materials and methods:** The information was collected by the personal interview with open ended simple questions from different knowledgeable persons and by the visual observation. Thirty respondent was interviewed at every visit to collect the complete and relevant information, interviewer comprises of Priest, medicinal practitioners, men-women from the local area (50 years or above) who had knowledge about the traditional medicinal plants and Pilgrims. The interview and field trips were conducted in different seasons, especially during the festivals. During the survey all the identified medicinal plants and their photographs were collected. All announced therapeutic plants species learning were likewise contemplated with the assistance of the accessible writing on Northwestern Himalaya. All reported medicinal plants species knowledge were also studied with the help of the available literature on Northwestern

Himalaya<sup>3</sup> on Garhwal Himalaya<sup>4,5</sup> and Himachal Pradesh region<sup>6,9</sup>. For further accuracy of the botanical name of the medicinal were checked across from some database sites<sup>10,11</sup>.

## Results and discussion

**Beliefs and traditions:** As the name suggested the Prashar Lake is dedicated to *Maharishi Parashar*, who is the father of Saint *Ved-Vyas*, the *Raj Purohit* of Kurav dynasty, stated in *Mahabharata*. *Maharishi Vashishtha*, the Religious and spiritual counselor of *Lord Rama*, was the grandfather of *Maharishi Parashar*. The Sage *Prashar Rishi* is the narrator of first *Purana*, the *Vishnu Purana* of Hindu mythology. He also narrated many other important text scripts such as “The science of life of trees” (botany) in Hindu mythology. He meditated at this place; hence the lake was gets his name after the sage *Parashar*. Thus, this natural site of *Prashar lake* sacred and named after the great seer of *Rigvedic period*, *Parashar*. The local people believed that the *Prashar lake* has many legends and beliefs which make this lake a sacred place in terms of Hindu mythology. One of the prominent legends was that the lake was formed by *Pandavas* after *Mahabharata* when he was on his way, with deity *Kamrunag* to find place for their teacher to meditate. The *Kamrunag* like the place so on his request, *Bheem* one of the brother of *Pandava's* formed the lake by pushing his elbow and forearm on the peak of the mountain of the area. According to locals and caretakers of the *Prashar Lake*, the lake itself represents the spread of the Earth. According to the myth, and which looks real at a glance of the entire lake, it consists of 70% of water 30% of land area which actually represents the Earth. The lake receives fresh water supply from the groundwater recharge and the water received from the melting of snow. During summers, in the month of June, when this heavenly divine spot becomes rich with the impulsive action of nature, the various local deities and village folks of the adjoining areas crowd this area in large number for an annual festival. On this auspicious occasion, nature gods and folks indulge in happiness and harmony. The *Parashar rishi* temple located beside the lake is one of the most momentous and interesting example of the pure pagoda type temple. This temple was built by *Raja Ban Sen* (1301-1340 A.D.), one of the early rulers of the *Mandi Kingdom*. The *Parashar rishi* temple situated far away from the human habitation in the high mountainous region remains almost unattended under the care of nature<sup>12</sup>. Beside folklores, there are a number of religious festivals which are held in the *Parashar* temple. The villagers gather to perform rituals at the lake site, and enjoy the feast together without exploiting components of the area. The *Prashar lake* is worshipped in order to maintain peace and harmony in the villages for the forthcoming year. The *Gur* (a person who act as a communicator between people and god) communicates various instructions related with the conservation and protection of the sacred landscape, biodiversity (plants, fish, etc.) and not to contaminate the lake water, after getting commands from the *devata*. If these instructions are not followed by the people, the *devata* will punish them with bad luck and ill health<sup>13-15</sup>.

**Traditional Knowledge of Medicinal Plants:** It has been the practice in the past to transmit traditional knowledge about the medicinal plants orally by the indigenous people from one generation to the next. This traditional knowledge of medicinal plants is very useful and important in this modern era<sup>4,16</sup>. These medicinal plants provide cure to fight against the disease, especially for those people who are staying in remote areas. But, now a day's, very few people have traditional knowledge of these medicinal plants. The practice of nature conservation has been a very ancient tradition, but practices and beliefs of ancient ethics have been changed now due to the adoption of western cultures and advancement in the medicine industry<sup>17</sup>. There are several medicinal plants, which are naturally available in this area from them total twenty five plants were studied to treat more than thirty different types of diseases (Table-1). The mostly used parts of ethno medicinal plants, was whole plant (41%), leaves (19%), roots (16%), seed and flower each were used 7% whereas, stem 3% used (Figure-1). There are some plants pictures are presented in Figure-2(a-i) which was present in the sacred site *Prashar*. Local people of this area take sacred water of the *Prashar lake* to their homes and use it as a *Prasad* (sacrament) as well as medicine. People have a strong belief that the water has natural power of healing and blessings of *Parashar devata* to cure the various diseases. During the present study, it was observed that the water has medicinal property due to mixing of extract of rhizome, stem and leaves of medicinal plant with lake water.

The most important medicinal plant, which is used as a traditional ayurvedic medicine is *Acorus calamus L.* This plant is abundantly available in the water in the periphery of the lake. This plant has great medicinal value to treat different diseases. *Acorus calamus L.* is generally known as *Sweet flag*, *sweet sedge*, *myrtle flag*. Locally, this plant is known as “*Bare*”. (*Acorus calamus* Linn.), an indigenous medicinal plant of India belongs to family *Acoraceae*. It is described under various therapeutically assemblies e.g. ‘*Lekhaneeya*’, ‘*Triptighna*’, ‘*Arshoghna dashemani*’ by Acharya Charaka<sup>18</sup>. ‘*pippalyadi*’ and ‘*Vachadi*’ by Acharya Sushruta<sup>19</sup>. ‘*Mustadi*’ and ‘*Vatsakadi*’ by Vagbhata<sup>20</sup>. The pharmacognostical properties of *Acorus calamus L.* are depicted through various synonyms like ‘*Shadgrantha*’ indicates having six nodes, ‘*Uragandha*’ means which contain strong aroma, ‘*Lomasha*’ means small hairs and ‘*Golomi*’ which contain small hairs like cow. It has important pharmacological qualities, *Deepana* it work as appetizer, *Pachana* means help in digestive problem, *Vamaka* (emetic), *Medhya* means used as brain tonic, *Kanthya* means good for throat problems, *Sanjnasthapana* means used for restores lost consciousness and *Vedanasthapana* (anodyne) and hence used extensively in therapeutics<sup>21</sup>. *Acorus calamus L.* grows mostly in the hilly region, it is a perennial plant which grows near the edge of the lake and streams. It is semi aquatic plant and its leaves are long and sword shaped, green and yellow in colour. This plant is extensively used for the treatment of –stomach ailments, mental disability, joint pain, and ache. It is also used as a brain tonic for strengthening the memory. *Acorus calamus*

*L.* when mixed with the roots of *Polygala* makes an effective medicine for the treatment of mental and intellectual health. *Acorus calamus L.* is registered in the Pakistani Materia Medica, where roots and rhizomes both are used especially in cases of neurological disorder<sup>22-24</sup>. There are two more very important medicinal plants which are present in the sacred landscape. There is a dictum in this region that “*Jethi bana, bsuti, bare thethi manu kiya mare*” which means that where these three

ayurvedic medicinal plants are present, nobody can die there. Which clearly reflects the medicinal values of these plants. The botanical names of these three medicinal plants are- *Vitexnegundo L.* for *Bana*, *Adhatodavasica L.* for *Basuti* and *Acoruscalamus L.* for *Bare*<sup>25</sup>. These plants are a boon for the treatment of most of the diseases. From these three medicinal plants other plants were also studied in this area. Their medicinal uses are also given in Table-1.

**Table-1:** Some ethnomedicinal plants and part used in different diseases.

Scientific Name	Families	Common Name	Parts	Uses
<i>Achillea millefolium L.</i>	Asteraceae	Common Yarrow	Whole plant	Fever, cold, urinary problem, tooth-ache
<i>Acorus calamus L.</i>	Araceae	Sweet Flag	Whole plant	Old folk remedy for the treatment of arthritis, neuralgia, diarrhea, dyspepsia, hair loss and other disorders, head and stomach aches, aromatic stimulant, mild tonic, etc.
<i>Adhatoda vasica L.</i>	Acanthaceae	Malabar nut, Vasa	Whole plant	Cough, asthma, allergy, bronchial relaxant
<i>Anemone obtusiloba L.</i>	Ranunculaceae	Himalayan Thimbleweed	Roots and seeds	Bruises, fever, body pain, arthritis, anxiety
<i>Argemone mexicana L.</i>	Papaveraceae	Prickly Poppy	Leaves, seeds and roots	Use for Leprosy, skin disease, scabies, boils
<i>Berberis aristata L.</i>	Berberidaceae	Indian Barberry, Chitra	Whole plant	Swollen and sore eyes, broken bone, wounds, gonorrhea, curing piles, unhealthy ulcer, Jaundice, also used for snake and scorpion bites.
<i>Berberis tinctoria L.</i>	Berberidaceae	Nilgiri Barberry	Leaves and roots	Curing jaundice, treatment of cancer to some extent by the tribal and local people.
<i>Centella asiatica L.</i>	Apiaceae	Indian Pennywort	Whole plant	Treatment of anxiety and hypertension, circulation of blood in the veins and capillaries, treatment of arthritis, wound healing, colds, fevers, diarrhea, dysentery, syphilis, hepatitis, ulcers and epilepsy, gastrointestinal problems, treatment of cancer and asthma, memory power
<i>Chenopodium album L.</i>	Chenopodiaceae	Lambsquarters, Goosefoot	Whole plant	Used in the treatment of rheumatism, bug bites, sunstroke, urinary problems, skin problems, etc. These are very nutritious, high in protein, vitamin A, calcium, phosphorus, and potassium.
<i>Geranium pratense L.</i>	Geraniaceae	Meadow Geranium	Roots	Roots are used in Tibetan medicine. Used for the treatment of analgesic, anti-inflammatory and febrifuge, fever, lung infection, pain and swelling in limbs
<i>Geranium nepalense L.</i>	Geraniaceae	Nepal Geranium	Whole plant	Jaundice
<i>Impatiens sulcata L.</i>	Balsaminaceae	Gigantic Himalayan Balsam	Whole plant	Used for various skin problems like pimples etc.
<i>Impatiens scabrida L.</i>	Balsaminaceae	Rugged Yellow Balsam	Stem	Abortifacient
<i>Parochetus communis L.</i>	Fabaceae	Blue oxalis	Whole plant	Used to cure, eyes infection, kidney problems, boils, cuts and wounds

Scientific Name	Families	Common Name	Parts	Uses
<i>Pedicularis bicornuta</i> L.	Orobanchaceae	Horuned Lousewort	Whole plant	Skeletal muscle relaxant
<i>Potentilla anserina</i> L.	Rosaceae	Silverweed Cinquefoil	Leaves	Leaves used as a excellent skin cleansing cream, soothing lotion for reddened skin and for the delicate skins of babies
<i>Potentilla nepalensis</i> L.	Rosaceae	Ratanjot	Root	Root past and powder are used as a healing agent by applying on the wounds, cuts and burns.
<i>Rhododendron spp.</i> L.	Ericaceae	Rhododendron, Rose Tree, Rosebay	Flowers and leaves	Antioxidant effects, dysentery, diarrhea
<i>Roscoeia alpina</i> L.	Zingiberaceae	Mountain Roscoe Lily	Whole plant	Used as veterinary medicine for the treatment of cuts and wounds of cattle, also used as urinary diseases and tuberculosis.
<i>Rumex hastatus</i> L.	Polygonaceae	Arrowleaf Dock	Whole plant	Wound and cut, laxative, skin diseases
<i>Rumex nepalensis</i> L.	Polygonaceae	Napal Dock	Leaves	Leaf extract applied to skin sores, leaf infusion is given in colic and applied to syphilitic ulcers.
<i>Senecio laetus</i> L.	Asteraceae	Cheerful Senecio	Whole plant	Rheumatism
<i>Taraxacum officinale</i> L.	Asteraceae	Dandelion	Whole plant	Laxative, bile, liver problem, improving digestion, used as mosquito repellent, used as a folk remedy to treat warts. Root extract use for Migraines, head ache, Blood purifier
<i>Trifolium pratense</i> L.	Fabaceae	Red Clover, Purple clover	Leaves and flower	Use as antispasmodic, various throat problem
<i>Vitex negundo</i> L.	Verbenaceae	Chaste tree	Whole plant	Cold, flu, asthma, muscular relaxant, Leprosy, cuts and wounds, blisters, itching, eczema, skin disease, sores, scabies, swelling, boils

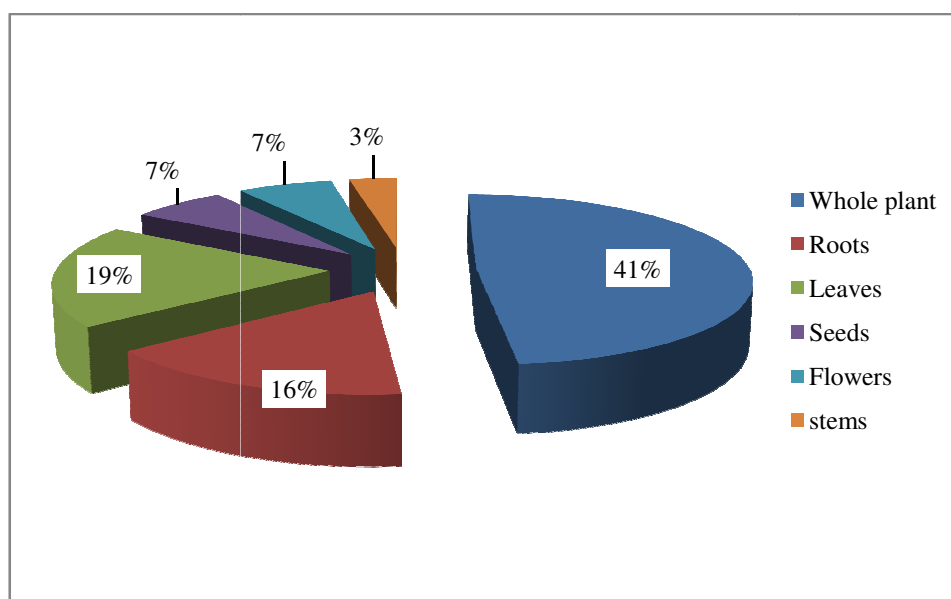


Figure-1: Percentage of plant parts used in medicine.





**Figure-2:** (a) *Acorus calamus* L., (b) *Adhatoda vasica* L., (c) *Geranium pratense* L., (d) *Impatiens scabrifolia* L., (e) *Parochetus communis* L., (f) *Potentilla anserina* L., (g) *Potentilla nepalensis* L., (h) *Senecio laetis* L., (i) *Trifolium pratense* L.

## Conclusion

Traditional culture and beliefs of the people in medicinal plants is the important tool for the conservation and management of the sacred landscape. Preservation of traditions, beliefs and conservation of biological diversity are interlinked with each other<sup>26</sup>. Till now, Prashar lake has maintained its pristine beauty. The natural beauty of the surrounding of the lake may

get deteriorate due to high influx of tourists, in recent years. Therefore, it is necessary to regulate tourist's influx and their activities. The local administration and government should prepare some strategy and guidelines for the protection of this sacred lake based on the traditional culture and beliefs. The current study reveals that area of the Prashar lake was rich in medicinal plants, it may be due to landscape and favorable environmental conditions. It is observed that traditionally and

culturally the knowledge of local inhabitants of the area regarding medicinal plants is good. They use this knowledge in curing the wide range of diseases till now. They consider that the water of the lake also has medicinal values and they have it as a sacrament (*Prasad*) of the god which heals their disease.

## Acknowledgements

We thank to the temple priest, temple administrative head and the local people of the area to share their knowledge and help us in data collection. One of the authors (Rama Kumari) is thankful to University Grants Commission and H.N.B. Garhwal (A Central University) for providing University fellowship for undertaking the present work.

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