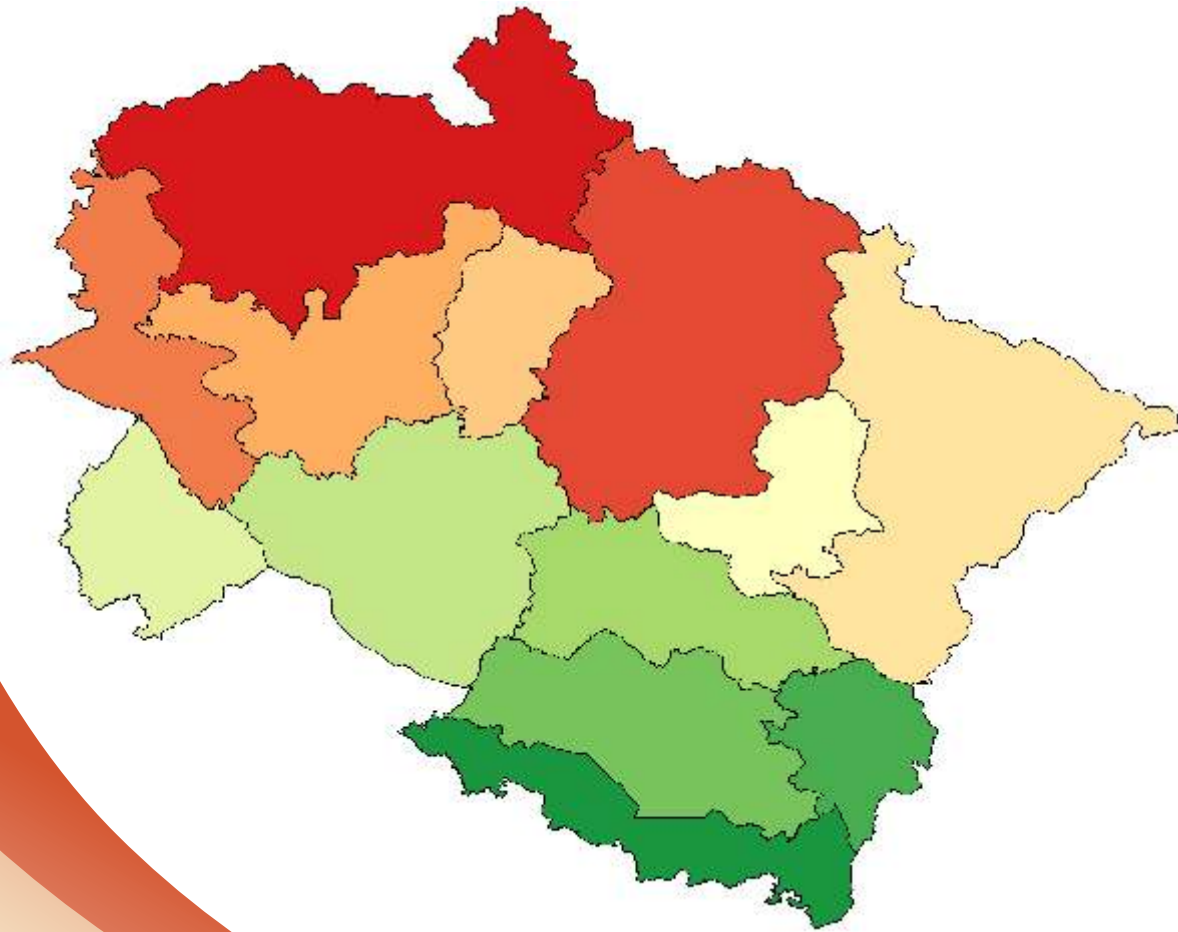


# SPRING ATLAS OF UTTARAKHAND



Supported by



Central Himalayan Rural Action Group



# SPRING ATLAS OF UTTARAKHAND



**CHIRAG**

Central Himalayan Rural Action Group



Advanced Center for Water Resources  
Development and Management

## Editors

Dr. Badrish Singh Mehra

Dr. Himanshu Kulkarni

## Contributing Team

### **CHIRAG**

BHUPAL SINGH BISHT

BISHAN SINGH RAIKWAL

GIRISH VARMA

SHASHANK PALUR

### **ACWADAM**

YOGESH BAROLA

JAYESH DESAI

### **ATREE**

MANISH KUMAR





# Contents

Foreword	1
Preface	2
About Chirag	3
Acknowledgements	4
<hr/>	
Uttarakhand spring inventory map	5
Rainfall variation map of Uttarakhand	6
Identified springs in critical districts of Uttarakhand	7
Details of representative springs	
Dhargara Dhara	8-11
Ghatgarh Dhara	12-15
Salkuli Naula	16-20
Kulgarh Naula	21-24
Mouna Talla Dhara	25-28
Dansil Naula	29-32
Basgaon school Naula	33-36
Para Naula	37-40
Naghar Naula	41-44
Meherkhola Dhara	44-47
Annexures - Spring inventory	

# Acronyms and Abbreviations

<b>APL</b> Above Poverty Line	<b>BPL</b> Below Poverty Line
<b>LPM</b> Litres Per Minute	<b>LPCD</b> Litres Per Capita Daily
<b>TDS</b> Total Dissolved Solids	<b>TH</b> Total Hardness
<b>FC</b> Fecal Coliform	<b>WUC</b> Water User Commitee
<b>BDO</b> Block Development Officer	
<b>Rmt.</b> Running metre	<b>Cum.</b> Cubic metre
<b>Sqm.</b> Square metre	<b>GP</b> Gram Panchayat
<b>RRH</b> Roof Rainwater Harvesting	



उत्पल कुमार सिंह  
Utpal Kumar Singh



उत्तराखण्ड शासन  
Govt. of Uttarakhand  
नेताजी सुभाष चन्द्र बोस भवन  
Netaji Subhash Chandra Bose Bhavan  
सचिवालय  
Secretariat  
4, सुभाष मार्ग, देहरादून  
4, Subhash Marg, Dehradun  
Phone (off.) 0135-2712100  
0135-2712200  
(Fax) 0135-2712500  
E-mail : cs-uttarakhand@nic.in

Foreword


Springs are the primary source of water for fulfilling requirements related to drinking, household activities and irrigation in many households in the Indian Himalayan region. The profound dependence of hill communities on springs makes their conservation and rejuvenation a basic facet of water security. In addition, springs have always served as an integral part of the hill eco system.

Factors like deforestation, erratic trends in precipitation, marked decline in winter rains, changes in land-use and land cover and forest fires have severely affected spring discharge. The problem of dying springs is being increasingly felt across the Indian Himalayan region. There are evidences that the aquifers are depleting which is manifest in the declining water discharge from the Himalayan springs. What is even more disturbing is the deterioration in the quality of spring water, further aggravating the situation.

Springs have not received their due and are today facing an existential threat in many parts of the Himalayas and it is therefore imperative that all the stake holders such as the state agencies, universities, technical institutions, civil society organisations and non-governmental organisations come together to develop new methods and planning tools to identify springsheds using a transdisciplinary approach. The strategy adopted by Central Himalayan Rural Action Group (CHIRAG) to build capacities through knowledge transfer and to map and manage springsheds in a participatory manner, has shown positive results. The approach uses a systematic but demystified hydrogeological approach to protect, develop, monitor and manage springs with the help of communities.

CHIRAG together with the Spring Initiative Partners have been able to successfully demonstrate the hydrogeology and community based springshed management model, which can be replicated across the state to help conserve our natural springs. The spring atlas being developed by CHIRAG and its partners provides a detailed spring inventory. The document highlights basic steps involved in systematic springshed management from reconnaissance survey to impact assessment and will therefore prove to be a handy tool for future initiatives in springshed management.

I hope this compilation will be of immense help for water managers, consumers and institutions and organization working towards addressing the water crisis in the Himalayan region.



(Utpal Kumar Singh)



Springs are fed by aquifers, a system of rocks/rock material, which stores and transmits water. The occurrence and movement of groundwater in aquifers is based upon the storativity and transmissivity of aquifers. The extent of Himalayan aquifers, their geometry and hydrological parameters exhibit large variation as a function of the complex geology of The Himalaya. The complex nature of Himalayan aquifers, in turn, results in a diverse spring typology and spring-water properties, whether it is spring discharge or spring water quality. The revival of springs was earlier based on a classical approach of using watershed management and spring-source protection. The approach needed revision, keeping in mind not only the complex geology of the region but the diverse system of rock types and structure even at seemingly local scales. The relationship between watersheds, aquifers and springs is important in designing and planning of conserving spring water.

Understanding the demand for spring water, designing augmentation of and supplies from spring water and developing a correct understanding of the groundwater systems that support springs are all important in the process of springshed management. Equipping communities with knowledge and decision-support about spring water is essential. Hence, agents-of-change are clearly required to make a difference on the ground in programmes on springshed management. Trained human resources have made a significant difference to Chirag's springshed management efforts in the Kumaon Region of Uttarakhand state. Foundation training and continued collaboration of CHIRAG's spring team with ACWADAM has led to comprehensive mapping followed by systematic spring-water conservation work, on more than 100 springs in the region. The effort, over a period of nearly a decade, culminated in significant improvements to spring-water discharge in the region. The process of springshed management is captured through a section-wise demonstration through this spring atlas. The atlas showcases the process that begins with inventorying springs and concludes with impact monitoring for some typical springs in the region.

Lastly, the document is also a reflection of the success of a community-based groundwater management model for spring-water in the Himalayan region that many other initiatives have decided to emulate. The demand for springshed management is only growing and the atlas can provide a potential guide for newer initiatives on how trained human resources at the last mile can make scientifically based decision support and action possible so as to ensure effective, decentralized spring water management possible across the entire Indian Himalayan Region.



The Central Himalayan Rural Action Group (CHIRAG) was registered in July 1986 under the Societies Act of 1860, with a mandate to work in the central section of the Himalayas that lie in Uttarakhand. The registered office of CHIRAG is located in Delhi while the main operations office is based at village Simayal in Nainital District. CHIRAG seeks to improve the quality of life and facilitate the movement towards self-reliance of local communities, particularly women and marginalized communities. To achieve this goal CHIRAG works closely with local communities employing community based strategies for the sustainable and equitable use of resources. CHIRAG's vision is to be a catalyst for the creation of a society rooted firmly in the principles of dignity, justice and solidarity

### CHIRAG'S MISSION:

CHIRAG's mission is to improve the quality of life of rural people- especially the financially underprivileged and women - in the Central Himalaya. The organization tries to do this through interventions in health, education and natural resource management, and by providing access to diversified livelihood options. CHIRAG promotes sustainable ownership and management of common resources by community.

Central Himalayan Rural Action Group has been working on issues of water and sanitation for the past three decades. It began working on recharge and rejuvenation of Himalayan springs in a more focused way by adopting a springshed hydro-geological approach since 2008 to try and address the issue of reduced water availability and deterioration of water quality in the springs. It took technical support from Advanced Center for Water Resources Development and Management (ACWADAM), Pune, and collaborated with technical and research institutions like Indian Institute of Technology (IIT) Roorkee and Ashoka Trust for Research in Ecology and the Environment (ATREE), Bangalore for focus on hydrology and geology and its' different aspects to address the concept of recharge to the springs. In the initial years CHIRAG invested a lot of time and effort in developing its own understanding of Himalayan geology and devising scientific techniques of recharging different types of springs. This knowledge was later transferred to the local communities. Presently, all the work is done through active participation of the village level institutions. Community members are provided trainings on the concept of geology, hydrogeology and water management. The treatment plans are jointly developed and implemented for recharge activities for the springs later they are handed over to the community institutions which take care of its maintenance. The springs are monitored regularly for discharge and water quality.

So far, CHIRAG has developed treatment plans, treated and monitored 211 springs in 16 blocks spread over 8 districts of Kumaun and Garhwal regions of Uttarakhand. The focus is on involving the community and building their capacity in basic geology, hydrology and water management. Since women are the most important stakeholder, conscious effort is made to form women led water users group locally called the 'Jal Upbhokta Samitti' and involve them in recharge activities and decision making process. A Key Resource Person (KRP) is also selected from among the community and intensive training imparted to him/her. The KRP acts as the local knowledge source on springs and ensures sustainability of the process.

CHIRAG's hands on experience in implementing spring rejuvenating programmes and projects along with its collaboration with esteemed institutions along with various partners have helped CHIRAG in improving its scientific understanding of geology and hydrology of the Himalayan spring system and have led to a better and more effective implementation.

CHIRAG has been actively pursuing action research activities in the Himalaya for the past 10 years, with various partner organisations. This document is a result of CHIRAG's interventions and experience gained by working on spring water conservation and management in Kumaun region of the Himalaya. The document essentially is an overview of the entire work of CHIRAG on spring water management which is based on the science of hydrogeology. It is an effort to bring forward a practitioner's perspective on the importance of hydrogeology in spring water related work. Many organizations have played a pivotal role in ensuring the initiation of hydrogeological studies in the Himalayas.

Foremost, CHIRAG would like to extend its gratitude towards ARGHYAM for their constant support both in terms of finances and knowledge. They provided us with the opportunity to take the science to the grass roots and help in improving lives of the community.

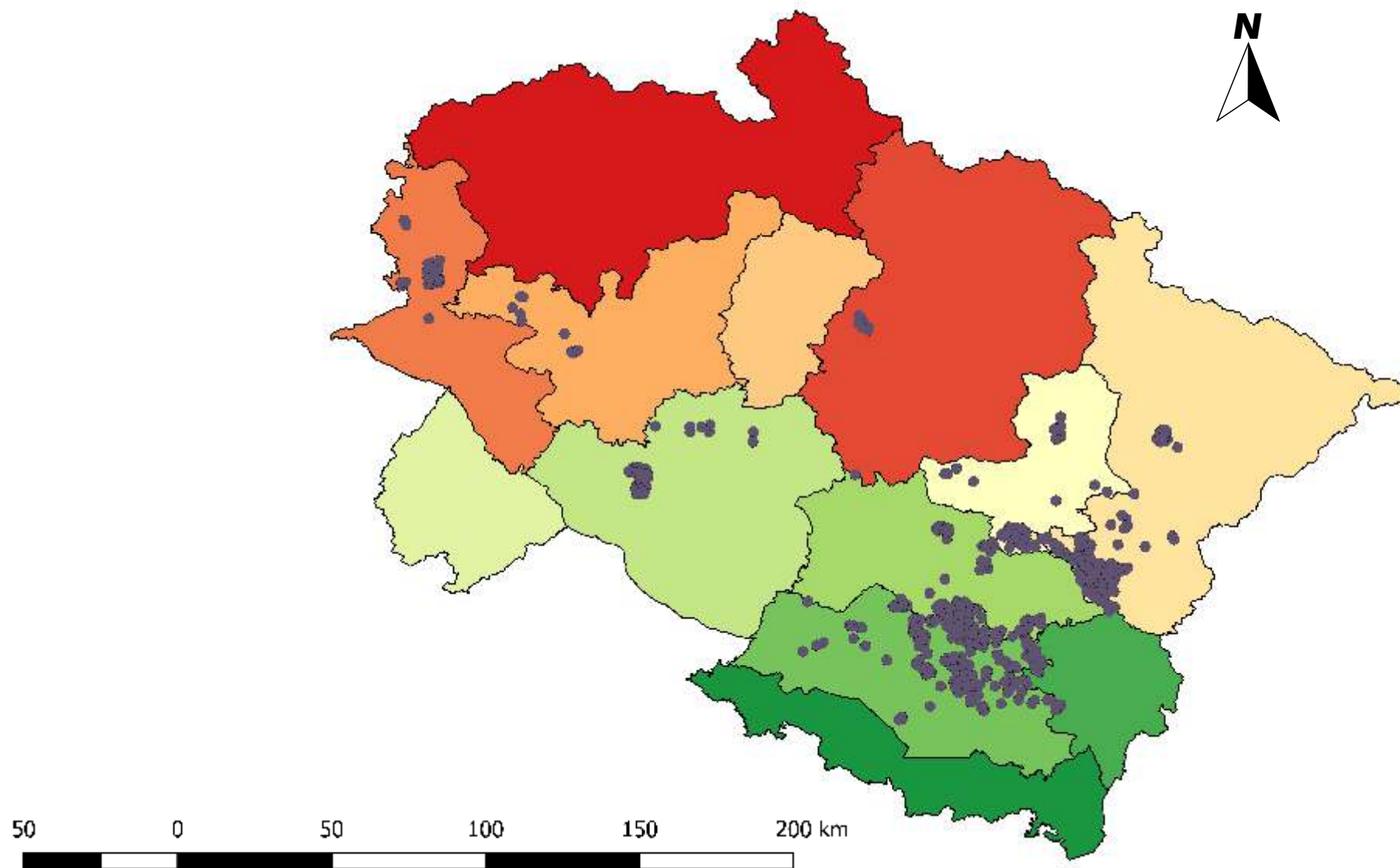
We would like to sincerely thank our technical support agency, ACWADAM for partnering with CHIRAG in the spring development programme. ACWADAM introduced us to hydrogeology based springwater management in the Himalayas and prodded us towards developing a fresh perspective on the Himalayan groundwater resource and trained many of our staff members on how to disseminate knowledge on ground and empower the community

CHIRAG would also like to thank ATREE, IIT-Roorkee, Himmothan, People's Science Institute, Himalayan Gram Vikas Samiti, Himalayan Seva Sangh, Swajal and CEDAR for their kind support and contribution in this document in the form of spring inventory for Uttarakhand. CHIRAG would like to express gratitude to all the staff members who have played a role in each and every step in the creation of this document and without whom this would not have been possible.

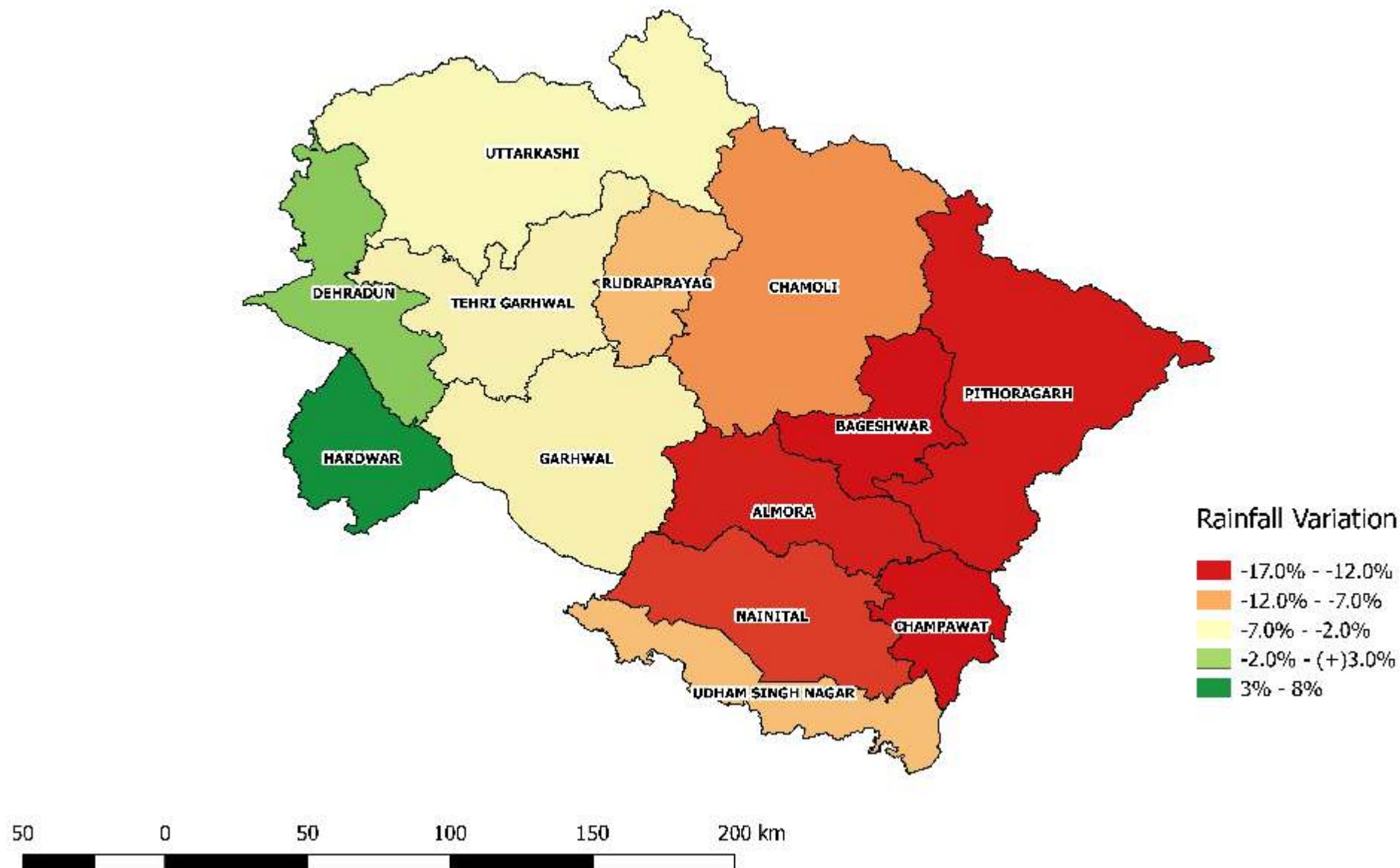
Last but not the least, CHIRAG would like to give credit to the community for their continued support throughout the programme. Without their involvement and support, this programme would never have been a success.



# Uttarakhand spring inventory map



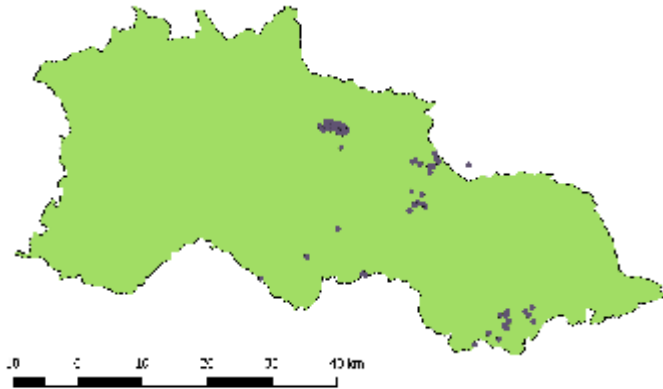
# Rainfall variation map for Uttarakhand



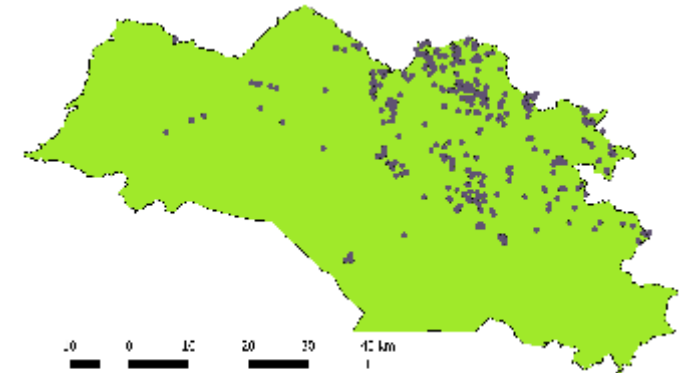
An analysis of 100 year (1901 - 2002) rainfall data was done to create the above rainfall variation map. It is evident that the Kumaon region (eastern districts) has shown highest variation in rainfall over last 100 years (source: IMD rainfall data)

# Identified springs in critical districts of Uttarakhand

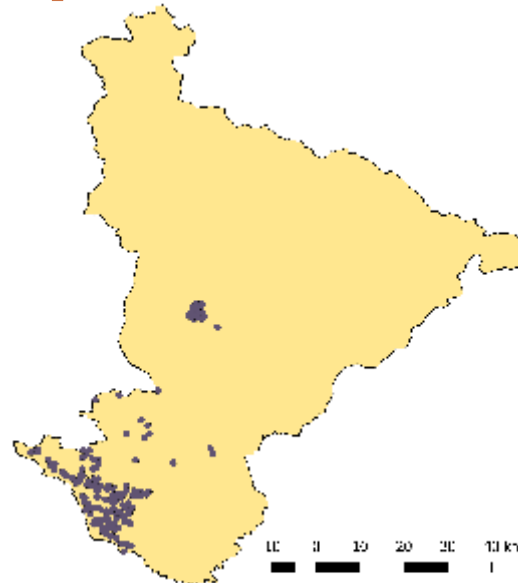
## Almora



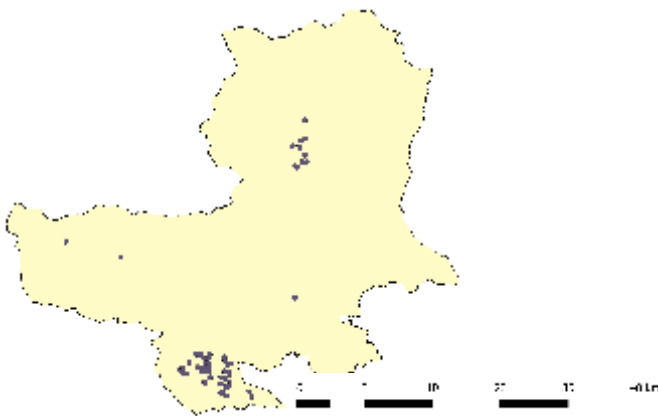
## Nainital



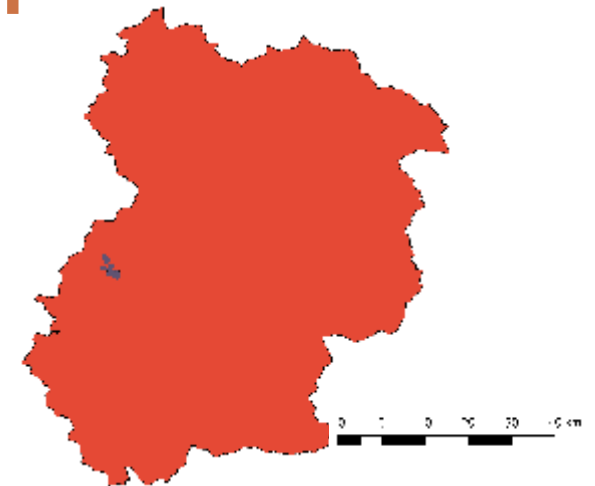
## Pithoragarh



## Bageshwar



## Chamoli



## Reconnaissance survey

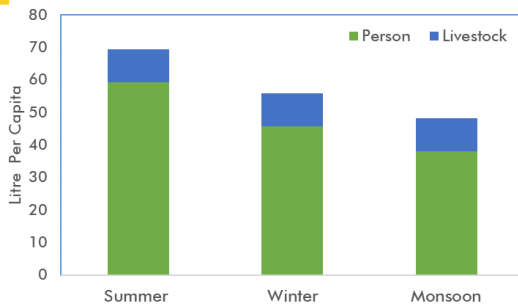
The Dhadgara dhara is situated in Raikholi village that lies in the Bageshwar block of Bageshwar district, Uttarakhand. The location of the spring is 29.74577 °N and 79.80541°E. The elevation is around 1550 mts above MSL. The average temperature ranges between 30°C to 10°C. The average rainfall in the village is around 1350 mm annually.



### Water quality and discharge

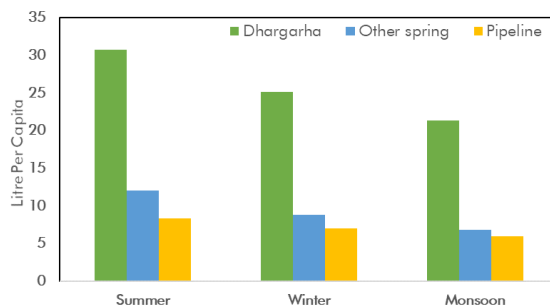
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (mg/l)	Discharge (lpm)
7.32	320	190	10	156	Nil	1	320	10.66

### Per Capita water usage



Per capita water usage of the people in Raikholi village is higher during summer with 59 lpcd and is lower during monsoon with 38 lpcd. However, the livestock consumption is lesser during summer and higher during monsoon.

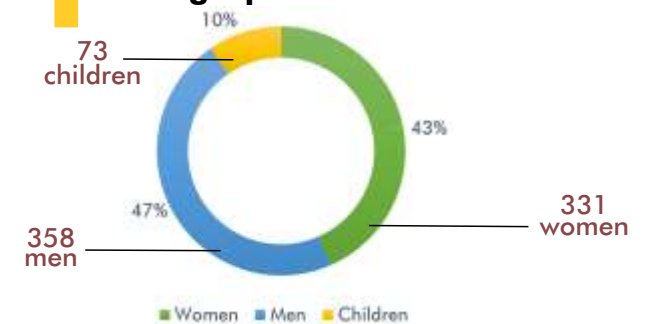
### Spring source and usage



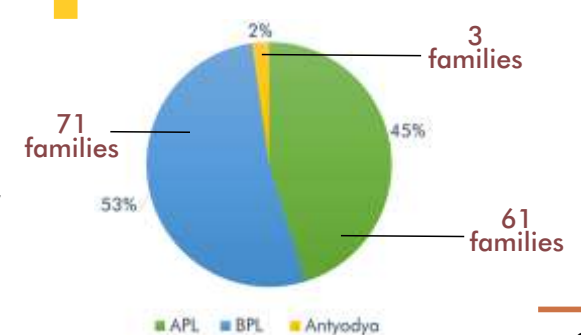
The families depend on Dhargarha dhara, distribution line laid from Saryu river and other local spring across all three seasons. However, the dependency on Dhargarha dhara remains high across all three seasons with maximum during summer. During summer, water availability from the distribution line and the local spring decreases and hence the demand on Dhargarha dhara increases.

## Dhargara Dhara

### Demographic Distribution



### Economic categorisation



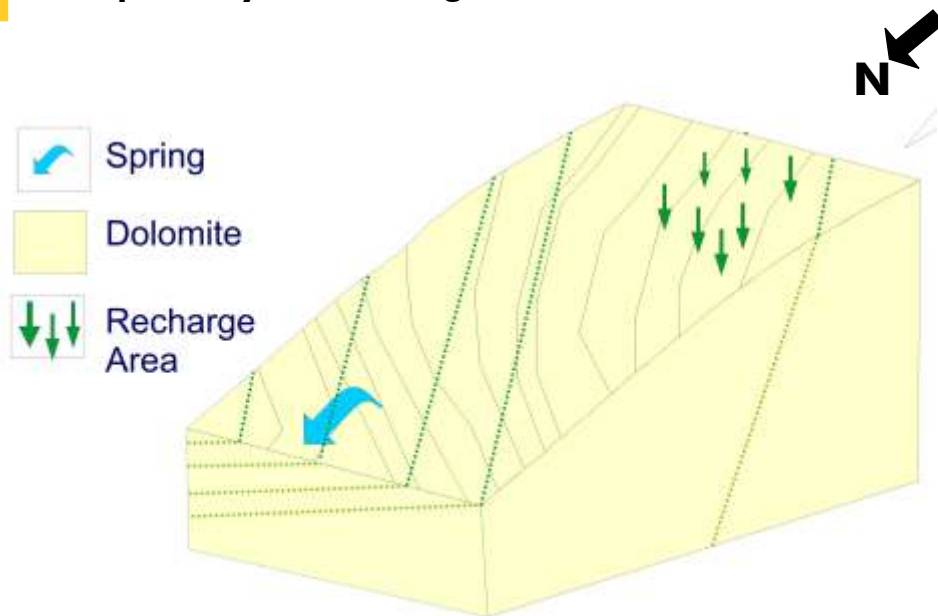


## Hydrogeology

### Geology of springshed

The underlying geology consists solely of dolomite. The general dip direction is towards the northeast direction. The strike runs along northwest to southeast axis. The average dip amount is 30 degrees. The water originating from the spring is through the sedimentary rock system in the springshed. Therefore, the spring is classified as a Karst spring. The discharge remains high throughout the year because of the karstic nature of dolomites.

### Conceptual layout of Dhargara Dhara



### Recharge area details

The recharge area of the Dhargara dhara lies on the southwest slope of the spring. The total recharge area identified was 2.5 ha. Most of the land in recharge area belonged to individuals in the village.

A part of recharge area was under agriculture while the remaining part of the land was populated by oak forests.

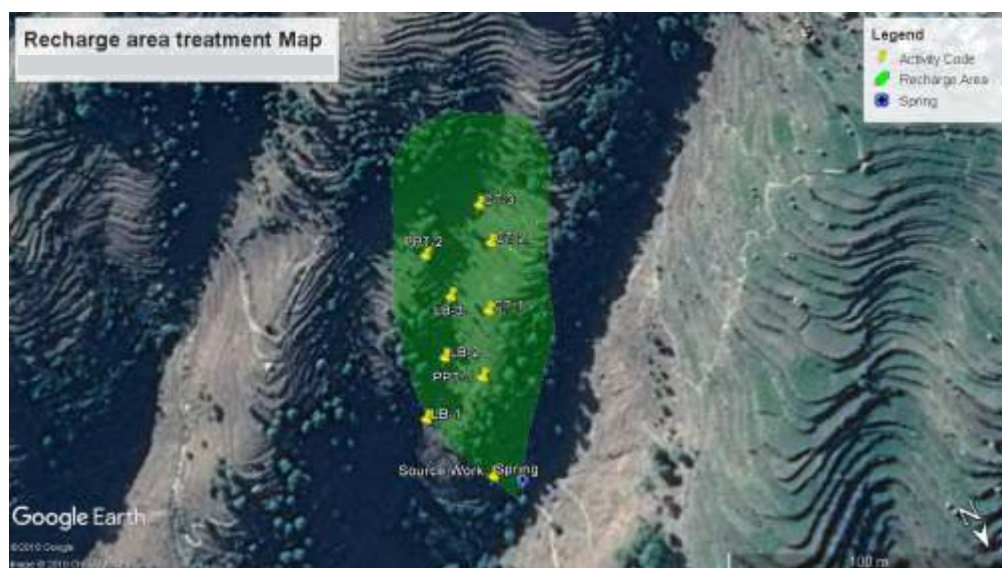
### Geology and Recharge area map



## Implementation

## Dhargara Dhara

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
Contour trench	Mts.	350
Percolation Pit	Cum.	80.06
Loose Boulder check dam	Mts.	14.50
Source work	No.	1

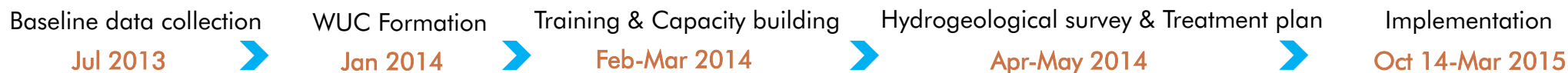
### Treatment plan

The treatment plan was implemented only in 2 ha out of total 2.5 ha recharge area. The recharge structures implemented were Contour trenches, percolation pits, check dams, and source improvement work. The selection of structures was done on the basis of slope and soil type in the recharge area

The structures were constructed by the community under the supervision of the Jal samiti. The community contributed 20% of the cost in form of labour. An Operation and Maintenance fund was set up by the WUC to take care of the structures in the long term.

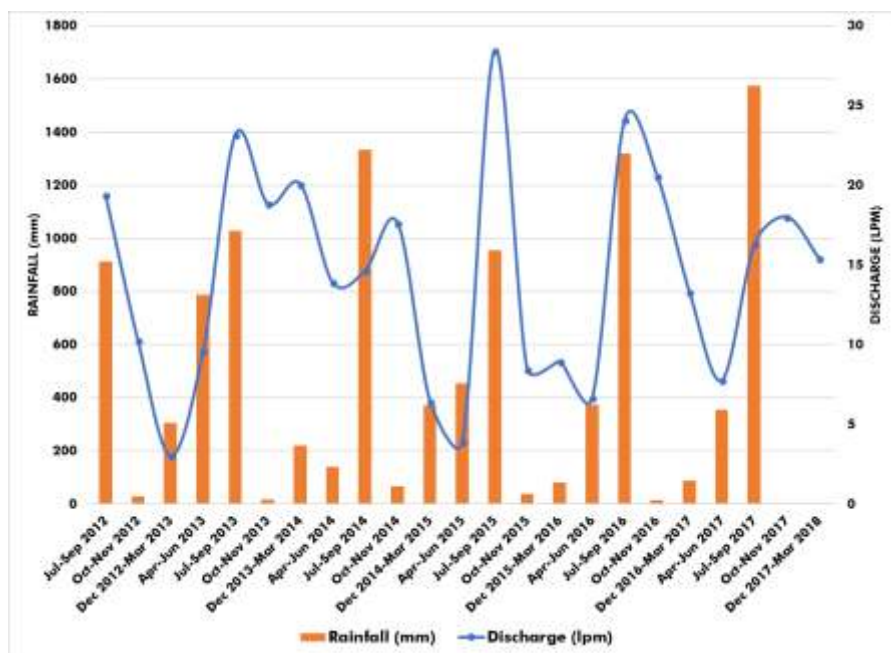
### Challenges

A part of the recharge area identified was found to fall in private land of the villagers from Bouri and Raikholi. However due to the lack of permission from Bouri land owners, the available recharge area for implementation got reduced by 0.5 ha.



## Impacts

### Hydrological impacts



#### Hydrological cycle

#### Total Annual Rainfall (mm)

#### Average Discharge (LPM)

July 2014- June 2015	2226	10.66
July 2015- June 2016	1448	13.13
July 2016- June 2017	1774	16.44

## Dhargara Dhara

Total rainfall in July'14-June'15 recorded was 2226 mm while the average discharge was 10.66 lpm. Implementation was carried out during Oct-Nov 2014. July15 – Jun 16 received less rainfall (1448 mm) as compared to its previous year (34% reduction from the previous year). However, discharge increased to 13.13 lpm with a rise of 4% from the previous year's discharge in spite of less rainfall which indicates some level of impact due to interventions. In the subsequent year, rainfall increased to 1774 mm (5% rise from the previous year's rainfall) with further increase in discharge which was recorded as 16.44 lpm.

### Social impacts

#### Institutional impact

Post implementation the WUC tied up with the gram panchayat and further carried out some more implementation like check dams. A proposal for the future maintenance work through the Gram panchayat has been submitted to the BDO office.

## Reconnaissance survey

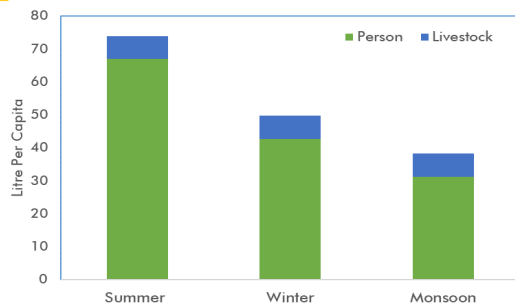
The Ghatgarh dhara is located in Chattola village that lies in the Ramgarh block of Nainital district, Uttarakhand. The location of the spring is 29.46619 °N and 79.58108°E. The elevation is around 1850 mts above MSL. The average temperature is ranges between 30°C to 0°C. The average rainfall in the village is around 1200 mm annually.



## Water quality and discharge

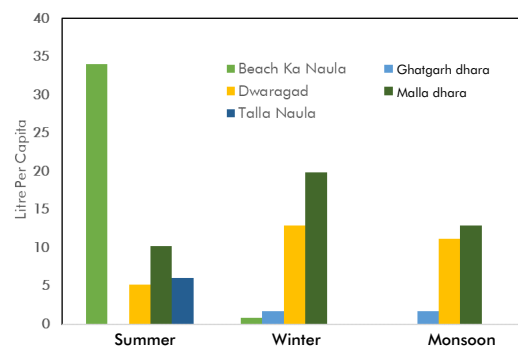
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
6.4	110	80	20	48	NIL	NIL	YES	2.26

## Per Capita water usage



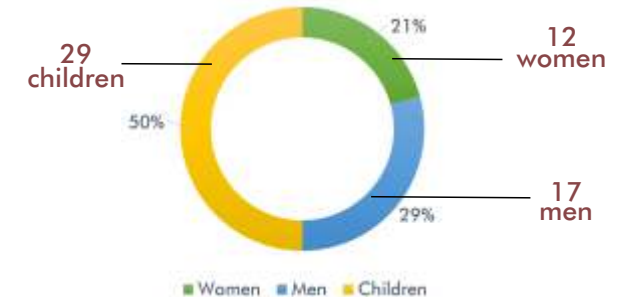
The water in the village is used only for domestic and livestock. Per capita water usage is higher during summer with 67 lpcd and is lower during monsoon with 31 lpcd. However, the livestock consumption is lesser during summer and higher during monsoon.

## Spring source and usage



People from Chattola village get water from multiple sources (*springs*). Per capita usage from Ghatgarh dhara is lower during both monsoon and winter and is absent during summer. This indicates that the Ghatgarh dhara probably dries up during summer leading to increased demand on Beach ka naula.

## Demographic Distribution



## Economic categorisation



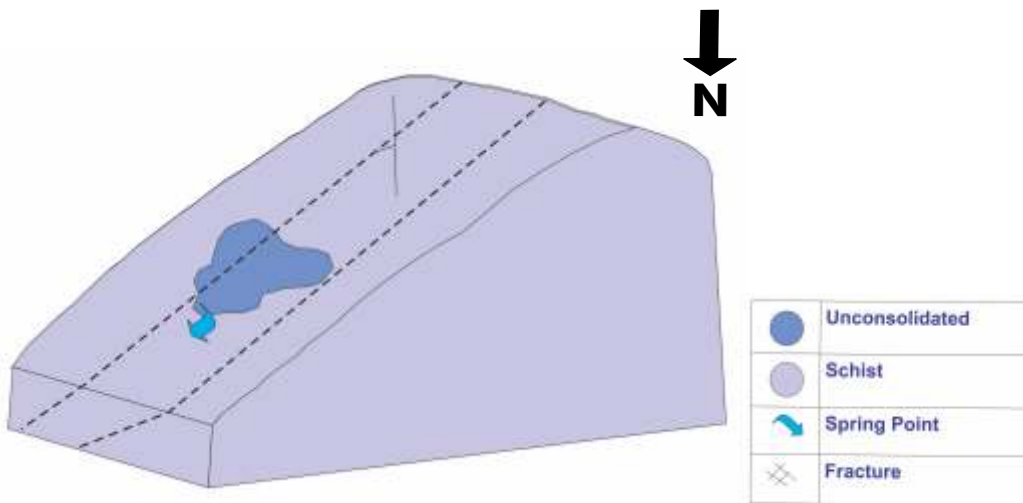


# Hydrogeology

## Geology of springshed

The geology dominantly consist of schist. Spring emerges out through a saturated system of unconsolidated colluvial deposit which forms the primary aquifer for Ghatgarh dhara. The rock bed strikes along NW-SE direction and is dipping towards the north east direction. The average dip amount is 25 degrees. There are two major fracture sets which influence the discharge. One set runs along the N-S axis and another along NE-SW axis. The fractured schists also probably contributes into the spring.

## Conceptual layout of Ghatgarh Dhara



# Ghatgarh Dhara

## Recharge area details

The recharge area of the Ghatgarh dhara lies on the southwest slope of the spring and mostly falls under private lands used for agriculture and horticulture. Some portions of the land are covered by oak forests. The identified recharge area was 3 Ha. The slope in the recharge area is 26.8% and the aspect is towards NNE direction.

## Geology and Recharge area map



# Implementation

## Ghatgarh Dhara

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
Percolation Pit 1	Mts.	350
CWR tank	No.	1
Terrace Levelling	Sqm.	534

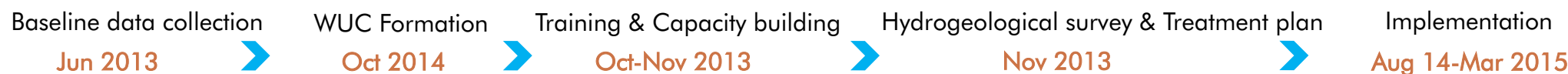
### Treatment plan

The total recharge area was 3.1Ha out of which 1.5Ha was treated due to land ownership issues. The recharge structures proposed in the area were percolation pits, khals, water reservoirs, terrace levelling. The selection of structures was done on the basis of the slopes present in the recharge area.

The structures were constructed by the community under the supervision of the Jal samiti. The community contributed 20% of the cost in form of labour.

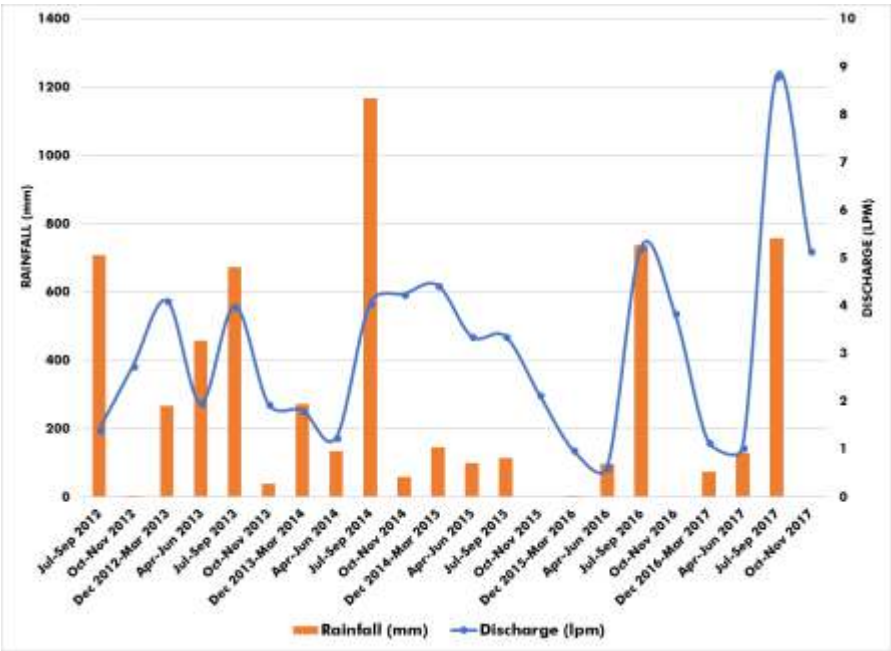
### Challenges

The entire catchment area was under private ownership and the owners had migrated to larger towns. Some land parcels were sold off to other parties by these land owners which were not available for implementation. However the remaining land which was barren was subjected to implementation after getting NOC from the respective owners. Jal Samiti was instrumental in acquiring the NOC for implementing recharge programme.



Impacts

Hydrological impacts



Hydrological cycle	Total Annual Rainfall (mm)	Average Discharge (LPM)
July 2013- June 2014	1119	2.26
July 2014- June 2015	1473	4.03
July 2015- June 2016	216	1.77
July 2016- June 2017	941	2.81

During July 2013-June 2014, total rainfall was 1119 mm and the average discharge was 2.26 lpm. Total rainfall increased to 1473 mm in July 2014-June 2015 and the average discharge increased to 4.03 lpm (16% increase from the previous year) which indicates a direct relationship between discharge and rainfall. Implementation was carried out during Oct-Nov 2014. July15 – Jun 16 received less rainfall (216 mm) as compared to its previous year and the discharge also decreased to 1.77 lpm. The rainfall had reduced by 85% from the previous year’s rainfall but still kept spring flowing. In the next year an increase in rainfall (941 mm) resulted into improved annual average of 2.81 lpm which is slightly more than the discharge in 2013-2014 even after receiving more rainfall.

Social impacts

Institutional impact

Post implementation the WUC tied up with the gram panchayat and has further implemented percolation pond. A proposal for the future maintenance work through the Gram panchayat has been submitted to the govt. officials.

Collection efficiency

Post implementation, two additional families could benefit from the surplus water available from the from the water reservoir constructed up stream

## Reconnaissance survey

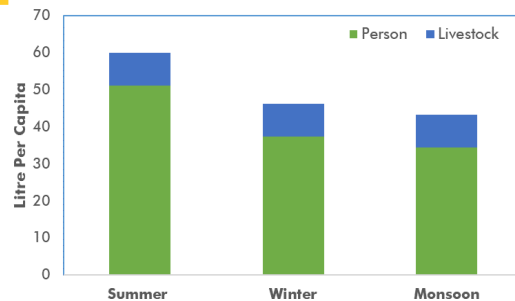
Salkuli naula is situated in Salkuli village is located in the Ramgarh block in Nainital district of Uttarakhand. The location of the spring is at 29.50679°N and 79.56997°E. The village lies at an altitude of 1310 mts above mean sea level. The climate of the area is temperate in nature and the temperatures range from 35°C to 10°C throughout the year. The average annual rainfall is 750mm.



## Water quality and discharge

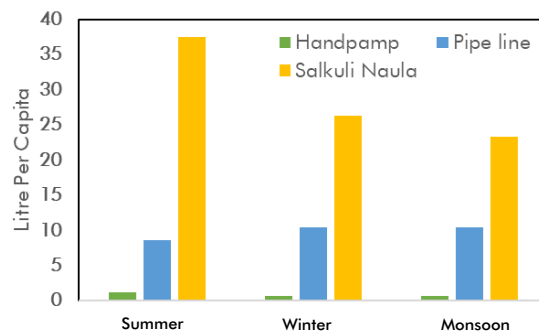
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
7	200	125	32	96	0.01	1	YES	3.55

## Per Capita water usage



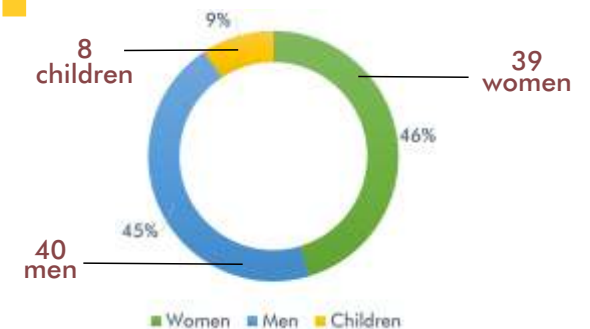
Per capita water usage in Salkuli village is higher during summer. However, the livestock consumption is lesser during summer and higher during monsoon. This particular trend is found in majority of the villages.

## Spring source and usage



Salkuli village gets water from three sources viz. Salkuli naula, distribution line laid from Pokhri village and a hand pump. Availability of water from hand pump and distribution line decreases from monsoon to summer and hence the dependency goes high on Salkuli naula.

## Demographic Distribution



## Economic categorisation



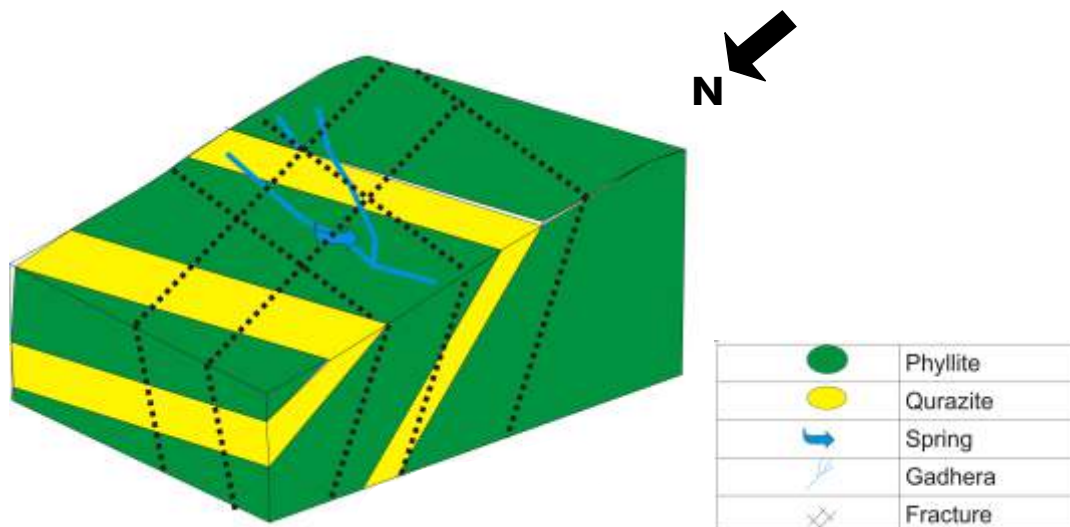


## Hydrogeology

### Geology of springshed

The geology comprises of alternate layers of phyllite and quartzite. The general dip direction is towards the northeast direction. The strike runs along northwest to southeast. The average dip amount is 40 degrees. The water originating from the spring is through the fracture system in the spring shed. Therefore, the spring is classified as a fracture spring. There are two dominant fracture sets in the area, one running along the NE-SW direction and another along the SE-NW direction. The later fracture set is the one responsible for diverting the water into the spring.

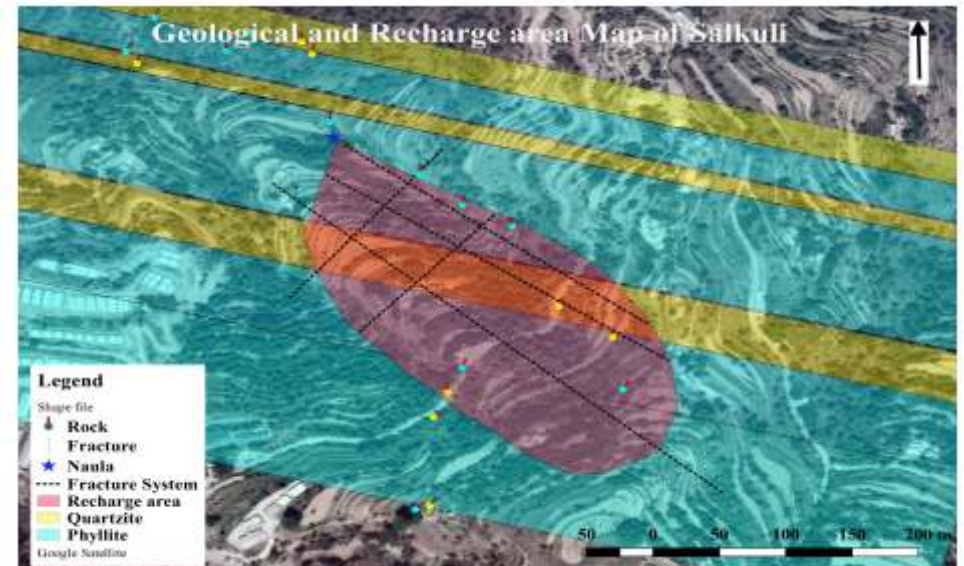
### Conceptual layout of Salkuli Naula



### Recharge area details

The recharge area of the Salkuli Naula lies on the southeast slope of the spring point. The recharge area falls in the boundary of private land holders and some part lies in the area of Banj village. The area identified for recharge was 5 Ha. The land was mainly used for agriculture while most of it was fallow. The average slope of the recharge area was around 36.4% and the aspect towards NW direction.

### Geology and Recharge area map



# Implementation

## Salkuli Naula

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
RRH Recharge pit	No.	4
Deep recharge pit	No.	78
Percolation pit	Cum.	2.10
Protection wall	Rmt.	4.75
Naula work	No.	1

### Treatment plan

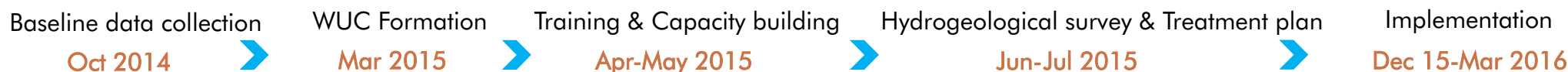
The area identified for recharge was 5 Ha out of which 3 ha was treated due to private land ownership in Banj village. The recharge structures proposed in the area were roof rain water harvesting, percolation pits, naula repair and deep recharge pits. The selection of structures was done on the basis of the slope of the recharge area.

The activities were carried out by the community under the supervision of Jal samiti. The community contributed 20% of the cost in form of labour.



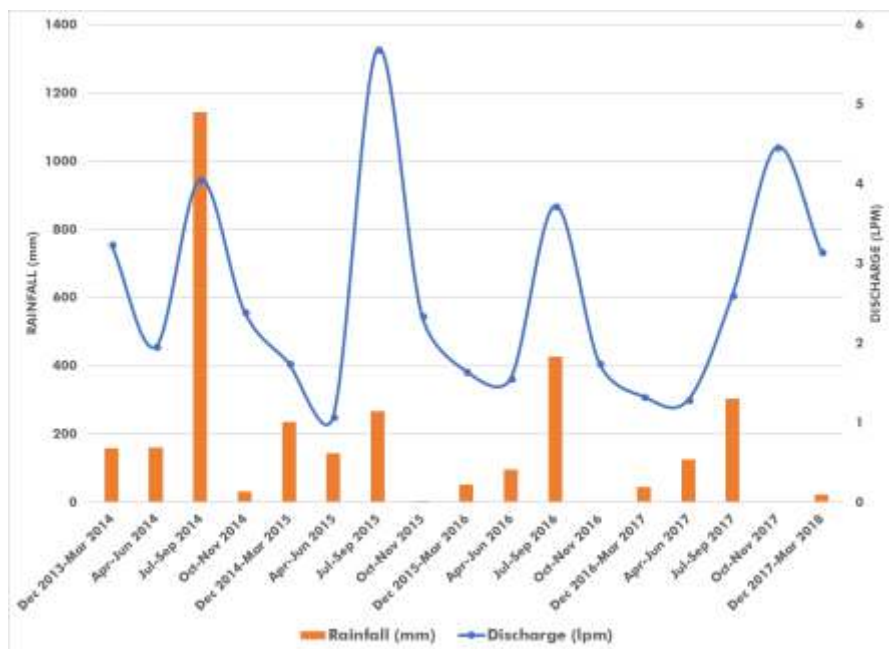
### Challenges

A part of the catchment area identified was found to fall in private land owned by people belonging to Banj village where the NOC wasn't given thereby ruling out some part of the recharge area for implementation.



## Impacts

### Hydrological impacts



The Salkuli Naula yields an average minimum discharge of 1.08 lpm during lean summer of April 2015. Implementation work was carried out in December 2015 prior to that the average discharge was 2.61 lpm with total rainfall of 2037.8 mm. Post implementation, the rainfall sums to 1017.7 mm with average discharge of 2.48 lpm. The ratio of pre to post implementation (average discharge to total rainfall) implies 0.5 times increase in discharge. The discharge is reduced to 1.08 lpm in the lean season of 2015 while it reads to 1.56 and 1.29 lpm in 2016 and 2017 respectively during the same season. This indicates increased discharge of 0.21 lpm in spite of declining rainfall in 2016 and 2017.

### Social impacts

#### Women Leadership

The intervention helped the women of the village tremendously by raising their confidence. Hitherto shy and quite in front of others, the women gradually took lead in the samiti and is presently entirely responsible for its functioning, they have also conducted training sessions for other samitis and presented their case in multiple functions. The

#### Collection efficiency

The collection efficiency increased due to Chirag's intervention. The spring that used to shrivel significantly during the summers before the intervention saw enough water to contribute to irrigation in addition to drinking for the beneficiaries.



Discharge measurement



Baseline survey



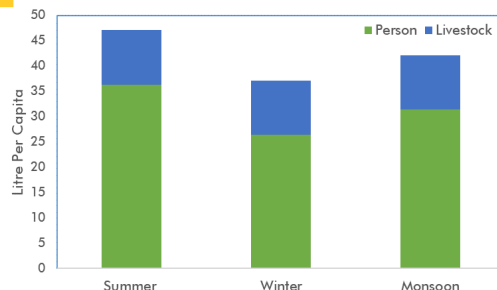
## Reconnaissance survey

Kulgarh naula is located in the Kulgarh village of Simra gram panchayat in Nainital district, Uttarakhand. The location of the spring is at 29.52465°N and 79.57412 °E. The village lies at an altitude of 1140 mts above mean sea level. Temperatures range from 35°C to 10°C throughout the year. The average annual rainfall is 750mm. The main sources of water for the villagers is through pipeline distribution system and springs.

### Water quality and discharge

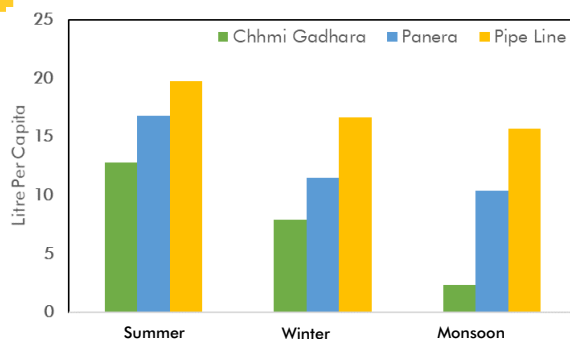
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
7.52	170	100	16	96	3	1	YES	30

### Per Capita water usage



Per capita water usage in Kulgarh village is higher during summer with 36 lpcd. Interestingly, in Kulgarh the usage is lower during winters with 26 lpcd. Monsoon usage is more or less the same as that of summer. However, the livestock consumption is more during winters and minimum during summers.

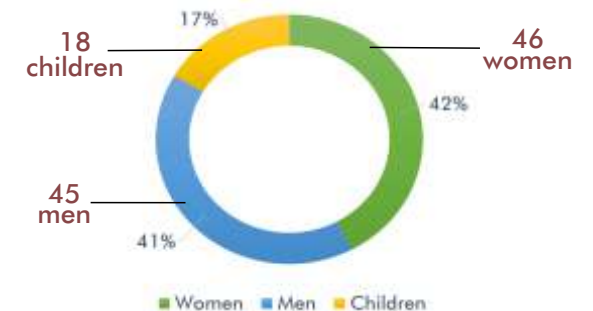
### Spring source and usage



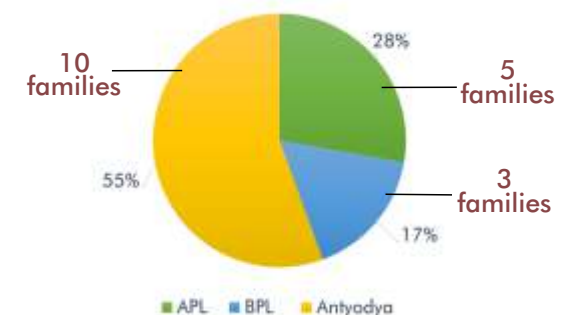
The families in Kulgarh depend on Chimi gadhera, Kulgarh naula (Panera) and a distribution line laid from Pokhri village for their water needs. Communities depend more on distribution line across all three seasons as it provides water through tap in every household. However, post monsoon the supply from distribution line becomes inconsistent resulting into increased demand on Kulgarh naula and Chimi gadhera.



### Demographic Distribution



### Economic categorisation



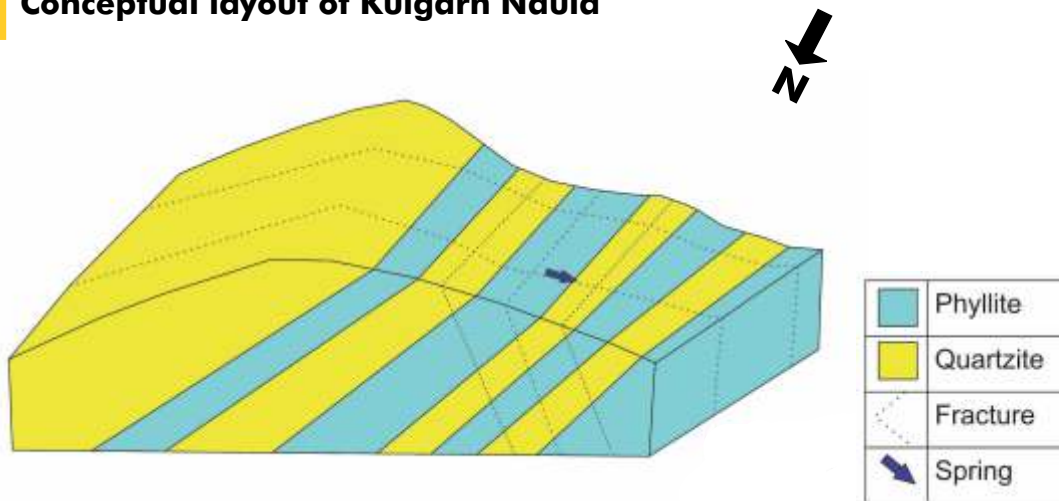


## Hydrogeology

### Geology of springshed

The geology in Kulgarh spring dominantly comprise of alternate bands of phyllite and quartzite. The general dip direction is towards the northeast direction. The strike runs along northwest to southeast ranging from  $290^{\circ}$  N to  $155^{\circ}$  N. The average dip amount is 15-50 degrees. The water originating from the spring is through the fracture system. Therefore, the spring is classified as a fracture spring. There are two dominant fracture sets in the area, one running along the N-S direction and another along the E-W direction. The second fracture set is the one responsible for bringing the water into the spring.

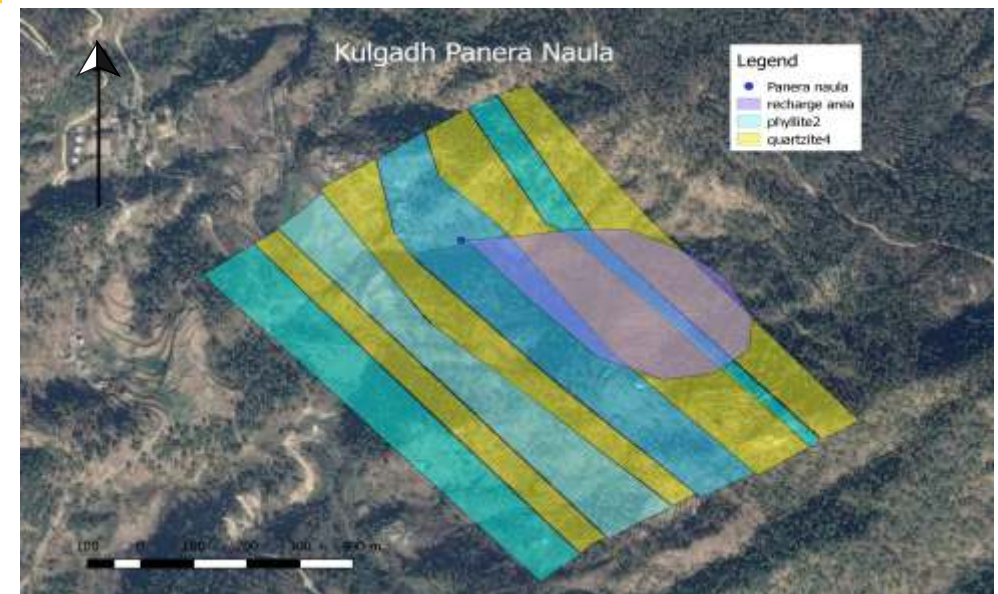
### Conceptual layout of Kulgarh Naula



### Recharge area details

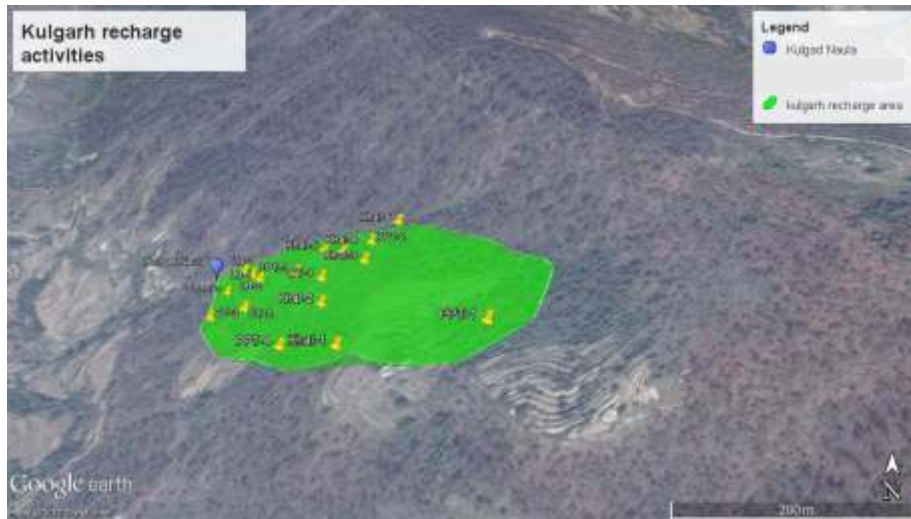
The recharge area of the Panera Naula lies on the southeast of the spring point. The recharge area falls in the boundary of the neighbouring Singoli village. The area classified suitable for recharge was 7.92 Ha. The land was partly used for agriculture while most of it was barren and is now populated by pine forests and shrubs. The shrubs are found mostly along the streams. The average slope of the recharge area was around 22% aspect is towards NWW direction.

### Geology and Recharge area map



## Implementation

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
Sub-surface checkdam	Rmt.	5.2
Loose boulder checkdam	Rmt.	20
Contour trenches	Rmt.	1699
Protection wall	Rmt.	9
Percolation pit 1	Cum.	30
Khal	Cum.	174
Drainage of khal	Rmt.	135
Plantation	No.	500

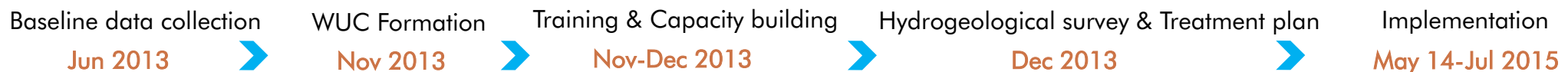
### Treatment plan

The area classified suitable for recharge was 7.92 Ha out of which 5.79 ha. The recharge activities proposed in the area were Contour trenches, percolation pits, khals, check dams, plantations and direct seed sowing. The selection of structures was done on the basis of the slope of the recharge area.

The activities were undertaken by the community under the supervision of Jal samiti. The community contributed 20% of the cost in form of labour.

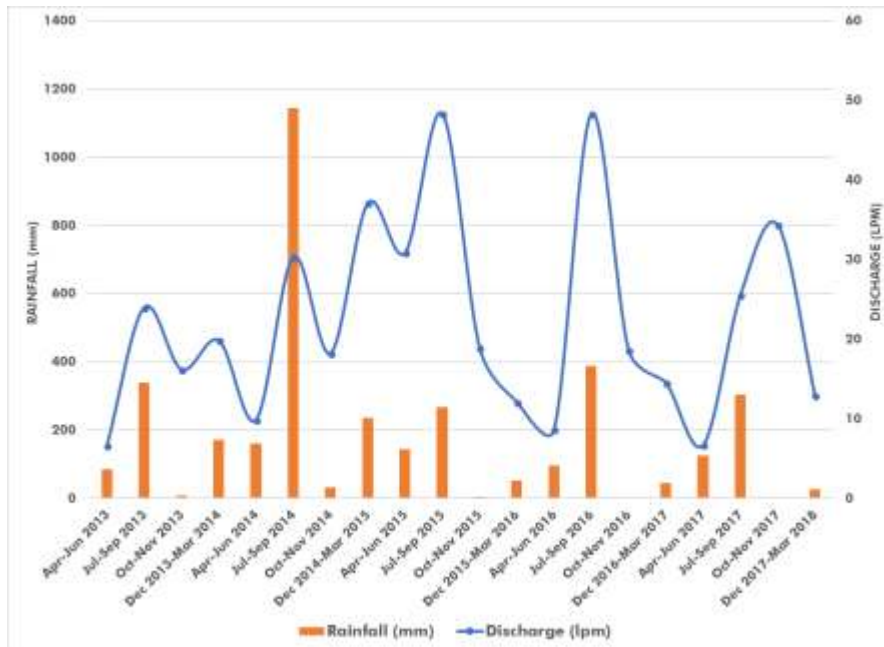
### Challenges

A part of the catchment area identified was found to fall in private land owned by people belonging to Singoli village. As a result, acquiring NOC for carrying out recharge activities was getting difficult. Jal Samiti then had to take the initiative to go and talk to the owners of the land in which their recharge area was found to fall. Samiti was able to convince the land owners by making them understand the importance of these activities in spring revival.



## Impacts

### Hydrological impacts



The Kulgarh spring discharges a minimum 6 lpm during the lean season (April to June 2013). The implementation was carried out in April 2014 during which the minimum discharge was 9 lpm. The discharge to rainfall ratio pre-implementation calculates to 0.009 while for the post implementation phase it reads as 0.027. This indicates a proportionate increase in discharge even when the rainfall is decreasing. The spring has sustained a discharge of 6 lpm during the lean season of 2017 in spite of less rainfall that particular year.

### Social impacts

#### Collection Efficiency

The collection efficiency increased due to Chirag's intervention. The spring that used to shrivel significantly during the summers before the intervention saw enough water to contribute to irrigation in addition to drinking for the beneficiaries.

#### Conflict resolution

A part of the recharge area of the spring falls in Beduli village. The owners who were reluctant to allow any work to be done in their land were convinced by the Jal samite members themselves with help from Chirag. The same work was done for a spring that belonged to the owners as well by the beneficiaries. Conflicts that were not infrequent during the summer months for water collection became extremely rare once the spring started showing an increase in discharge.

#### Women Leadership

The intervention helped the women of the village tremendously by raising their confidence. Hitherto shy and quite in front of others, the women gradually took lead in the samiti and is presently entirely responsible for its functioning, they have also conducted training sessions for other samitis and presented their case in multiple functions.

## Reconnaissance survey

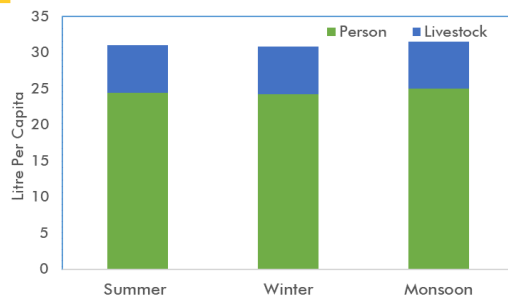
Mouna talla dhara is situated in Mouna village in Ramgarh block of Nainital district in Uttarakhand. The location of the spring is 29.52994°N and 79.65630°E. The average elevation in this area is around 1350 mts above MSL. The average temperature ranges from 35°C to 5°C and the annual average rainfall in the village is around 1050mm.



## Water quality and discharge

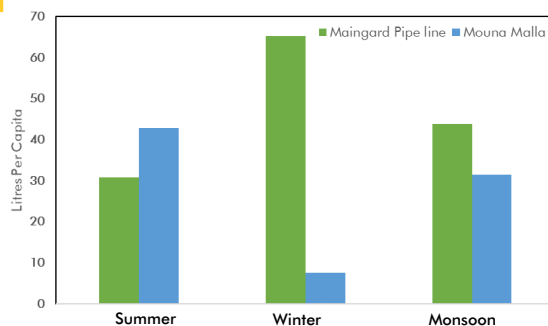
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
6.44	110	70	16	96	0.01	NIL	YES	7.55

## Per Capita water usage



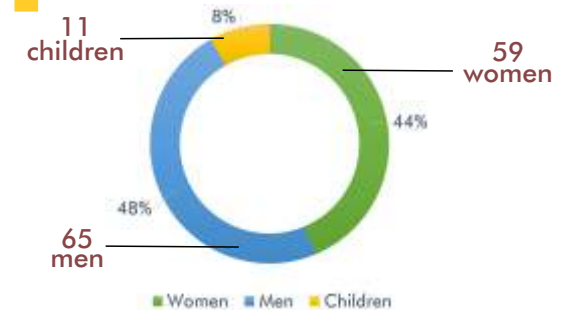
Per capita water usage in Mouna village by people is almost the same across all three seasons. In case of livestock also, the consumption is nearly equal across all three seasons.

## Spring source and usage

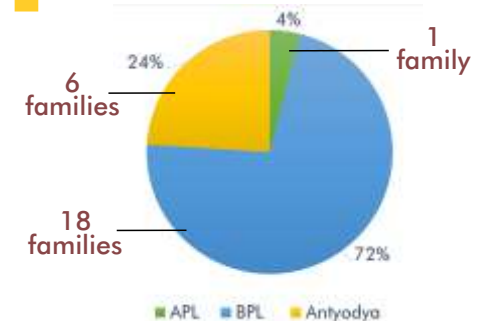


Families in Mouna village entirely depend only on Maingarh gadhera and Mouna Dhara to meet their demand. Mouna talla dhara becomes the main source of water during summer months. Interestingly the use of maingarh dhara increases during winter and decreases for Mouna dhara which indicates that the discharge of Mouna dhara probably decreases drastically during winter.

## Demographic Distribution



## Economic categorisation



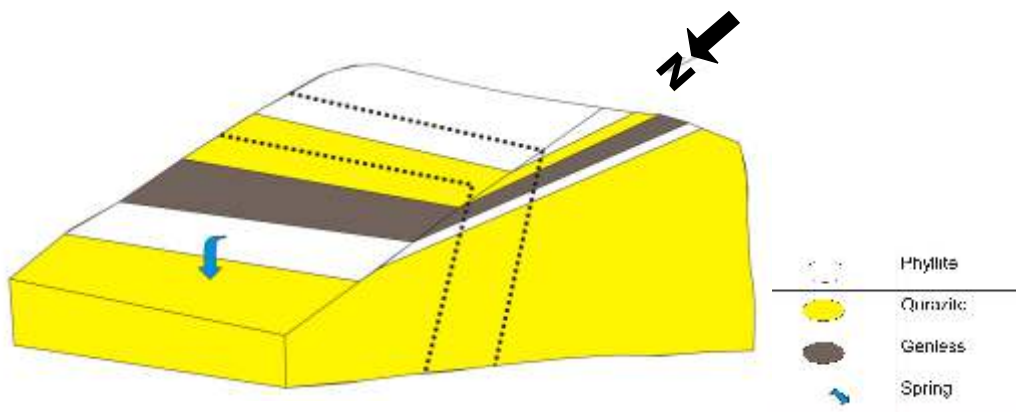


## Hydrogeology

### Geology of springshed

The underlying rocks are alternate bands of phyllite and quartzite and gneiss. The general dip direction is towards the north direction. The strike runs along northeast to southwest. The average dip amount is 35 degrees. The water originating from the spring is through the fracture system in the spring shed. Therefore, the spring is classified as a fracture spring. There is two dominant fracture sets in the area, one running along the N-S direction and another along the E-W direction. The second fracture set is the one responsible for diverting the water into the spring.

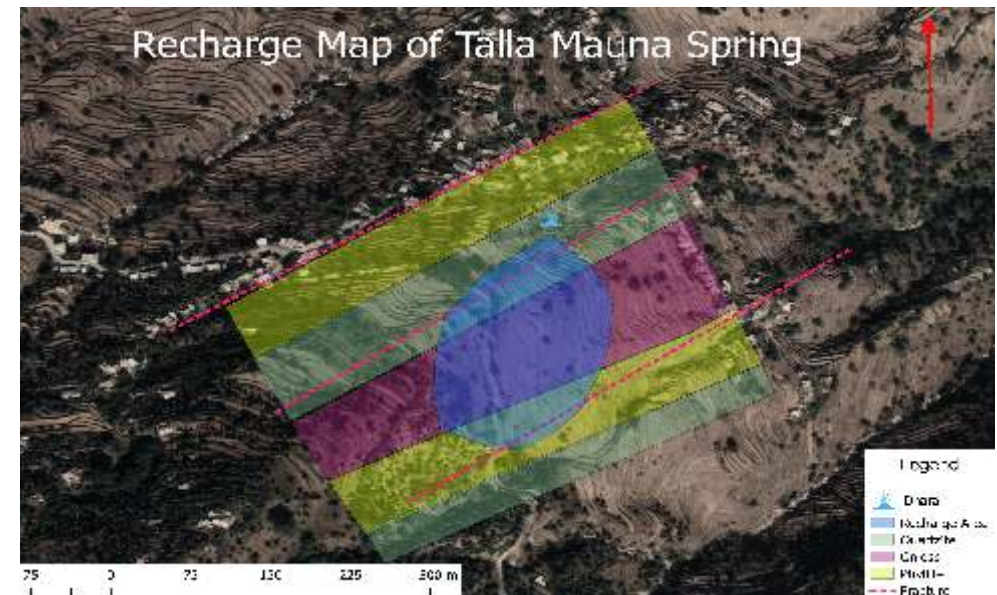
### Conceptual layout of Mouna Talla Dhara



### Recharge area details

The recharge area of the Mouna talla dhara lies on the south facing slope of the spring point. The recharge area falls under private ownership. The area identified for recharge was 9 Ha. The land was mostly habitated and used for agriculture purposes. The slope in the recharge area is 15.7% and aspect is towards NNE direction.

### Geology and Recharge area map



## Implementation

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
Sub-surface checkdam	Rmt.	5.2
Deep Recharge pit	No.	120

### Treatment plan

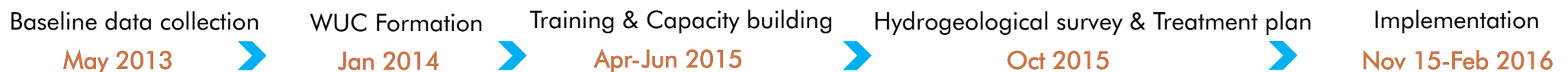
The recharge area identified was 9 Ha out of which 8 ha was treated. The recharge structures proposed in the area were deep recharge pits. Selection of structures was done on the basis of the slope conditions present in the recharge area.

### Challenges

The main challenge was with regards to availability of land available for implementing recharge structures. In case of agricultural land, deep recharge pits were designed. Some portion of the recharge area had houses and thus no earth activity was possible.

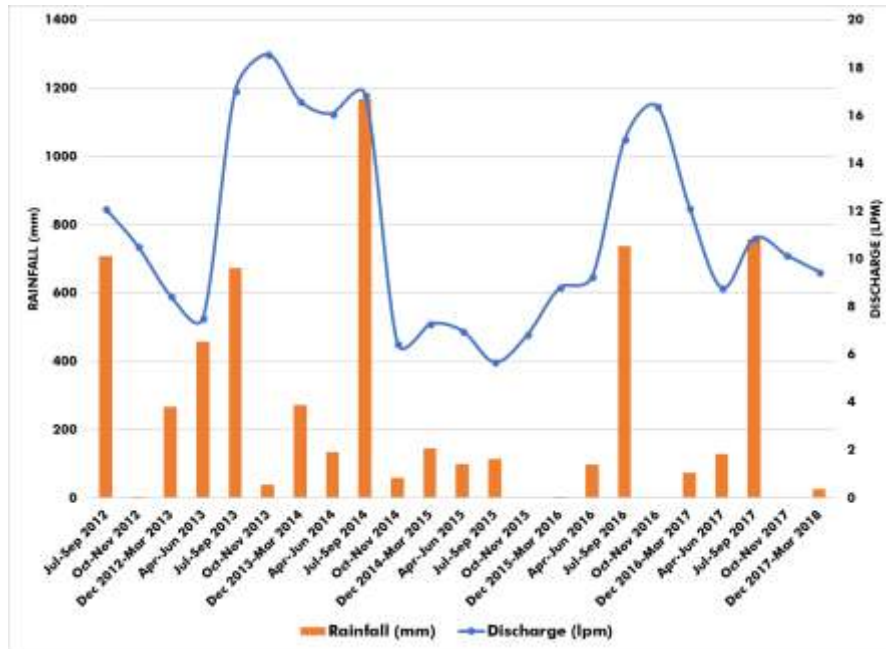


Planning implementation activities



## Impacts

### Hydrological impacts



In the lean season period, the trend of minimum average discharge increases from 7.55 lpm in 2013 to 16 lpm in 2014 and again decreases 7 lpm in 2015. After implementation the minimum average discharge significantly increased to 9.04 lpm in lean season as against 7.27 lpm during pre-implementation phase in 2016. In the monsoon of 2015, the implementation year, a slight fall is observed in the discharge. Discharge rises to 15.02 lpm during next monsoon. (Rainfall- Discharge ratio increased to with a magnitude 0.9).

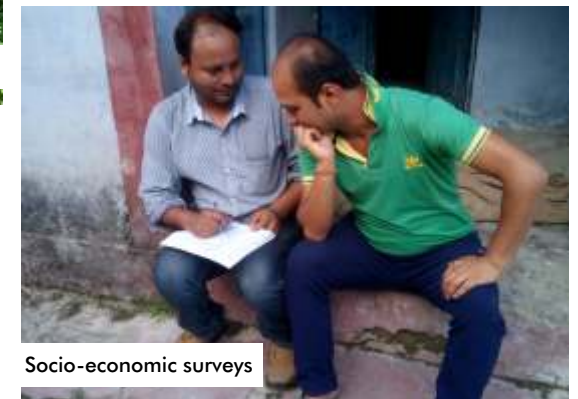
### Social impacts

#### Women Leadership

The intervention helped the women of the village tremendously by raising their confidence. Hitherto shy and quite in front of others, the women gradually took lead in the samiti and is presently entirely responsible for its functioning, they have also conducted training sessions for other samitis and presented their case in multiple functions.



Hydrogeological surveys



Socio-economic surveys



## Reconnaissance survey

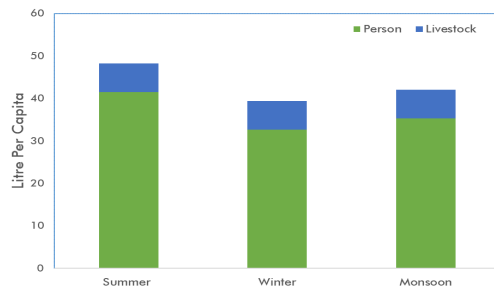
Dansil naula is situated in the Losgyani village that lies in the Ramgarh block in Nainital district of Uttarakhand state. The location of the spring is 29.46588 °N and 79.57100°E. The elevation is around 2100 mts above MSL. The average temperature is ranges between 30°C to 0°C while the average rainfall in the village is around 1200 mm annually.



## Water quality and discharge

pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
6.4	110	80	20	48	NIL	1	YES	0.68

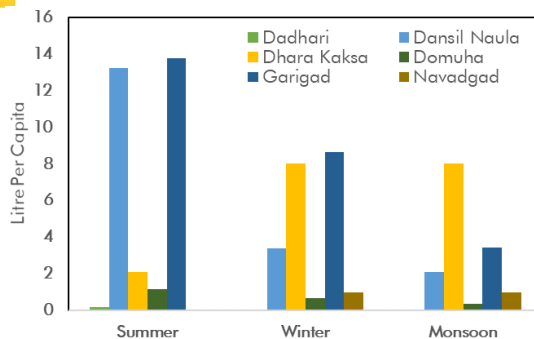
## Per Capita water usage



Per capita water usage in Kulgad village by people is higher during summer with 41 lpcd and lower during monsoon with 33 lpcd.

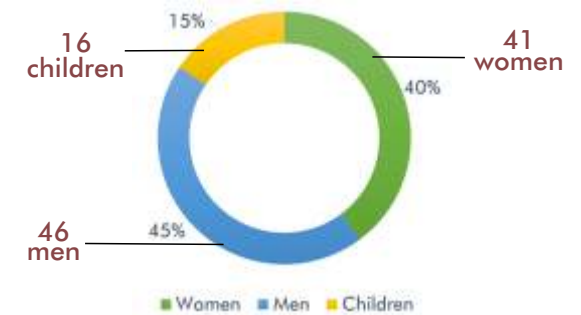
However, the livestock consumption is more during winters and minimum during summers and monsoons.

## Spring source and usage



Losgyani village gets its water from multiple sources out of which Dansil naula, Garigad and Dhara kaksa forms major sources. Dependency on Dhara kaksa is more during monsoon and winter while during summer it is high on Dansil naula and Garigad. The other sources have little contribution in meeting the village water demand. However, the discharge in both Dansil naula and Garigad reduces in summer resulting into crisis.

## Demographic Distribution



## Economic categorisation



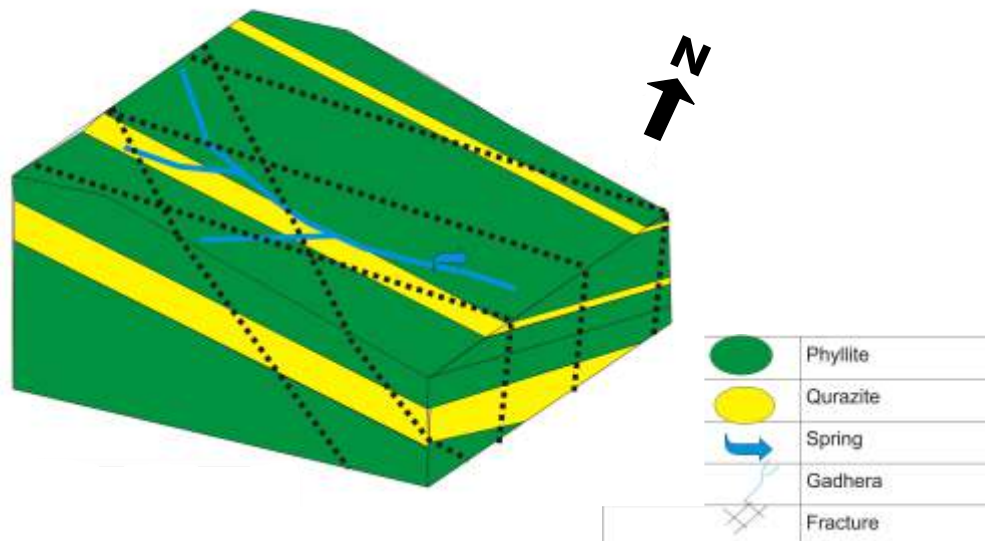


## Hydrogeology

### Geology of springshed

The geology is made up of alternating bands of Phyllite and Quartzite running along E-W direction and dipping towards south east. The average dip amount is around 30 degrees. There are two dominant fracture sets in this springshed. One of them strikes NE-SW while the other one strikes SE-NW axis. Both of these fracture sets bring water to the spring. The spring therefore is classified as a fracture spring.

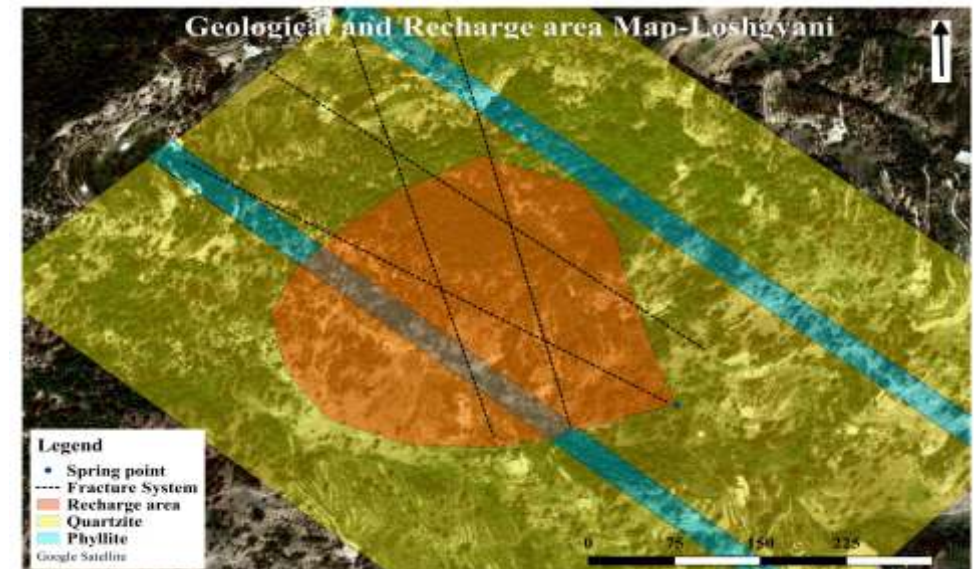
### Conceptual layout of Dansil Naula



### Recharge area details

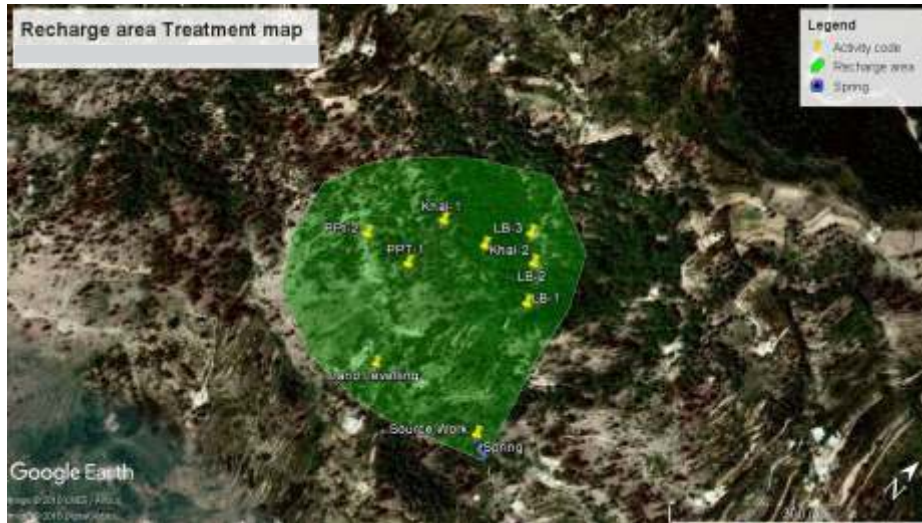
The recharge area of the Dansil naula lies on the northwest slope of the spring. The recharge area identified measured 5 Ha. The land belonged to private holders and the van panchayat. The land was partly used for agriculture while most of it was barren and is now populated by oak forests. The average slope is 45.8% and aspect is towards SE direction.

### Geology and Recharge area map



# Implementation

## Recharge area treatment map



## Recharge activity details

Name of work	Unit	Quantity
Protection wall	Rmt.	2.25
Loose boulder checkdam	Rmt.	27.58
Contour trenches	Rmt.	40
Khal	Cum.	15.16
Percolation pit 1	Cum.	51.84
Terrace levelling	Sqm.	2623
Terrace Bunding	Rmt.	200
Source work	No.	1

## Treatment plan

The recharge area identified was 5 Ha out of which only 3.5 ha was treated. The slopes in the recharge area were quite steep and therefore not much of the physical activities were feasible. However, a lot of terrace levelling and bunding was carried out to stabilise the slopes. Also some amount of drainage line treatment measures were undertaken.

The structures were constructed by the community under the supervision of the Jal samiti. The community contributed 20% of the cost in form of labour.

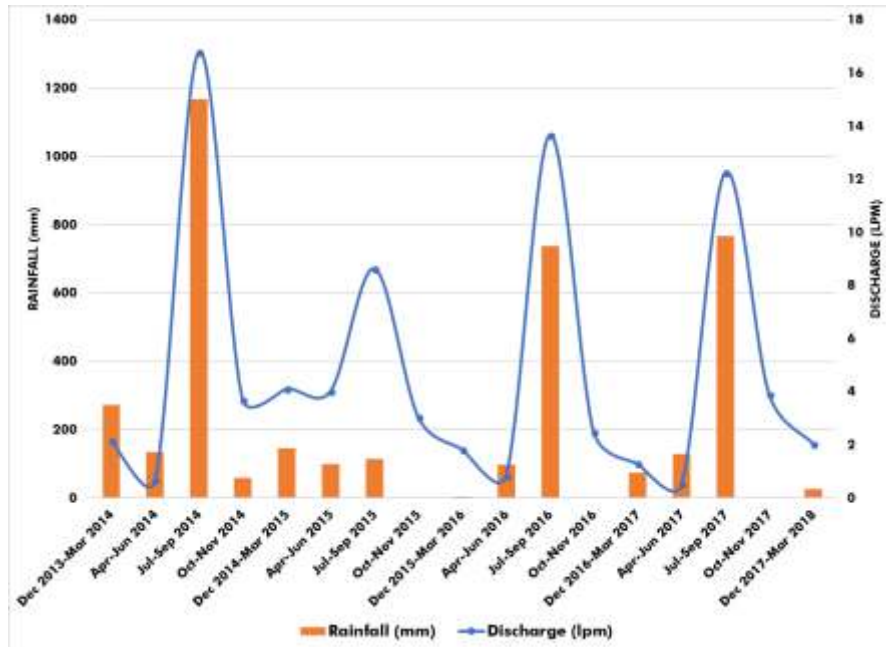
## Challenges

Majority of the identified catchment area was van panchayat land. Therefore limited activities were carried out in the available van panchayat land. The other challenge was with respect to slope of the catchment area. The slopes were very steep and therefore limited recharge activities were carried out.



# Impacts

## Hydrological impacts



The minimum discharge recorded in the pre-implementation phase was 0.68 lpm. Due to good rainfall in 2015 spring has sustained a discharge of 4.3 lpm during the summers of 2015. The implementation work carried out during Oct 2014- Jan 2015. Post- implementation, the spring continued to discharge even after massive drop in rainfall (excluding summer showers) during the year 2015-16 (91% reduction as compared to previous year 2014-15). In spite of this decline, the spring did not dry up and continued to discharge at lower rates with 55% reduction during winter and 74% reduction during summer for the year 2015-2016.

## Social impacts

### Women Leadership

The intervention helped the women of the village tremendously by raising their confidence. Hitherto shy and quite in front of others, the women gradually took lead in the samiti and is presently entirely responsible for its functioning, they have also conducted training sessions for other samitis and presented their case in multiple functions.





## Reconnaissance survey

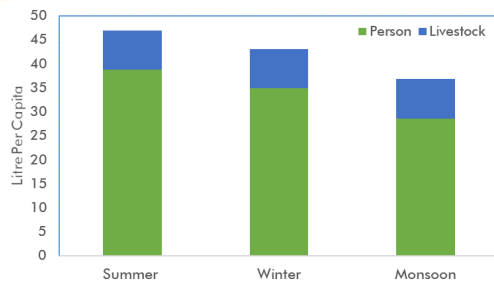
Basgaon school naula is located in Ramgarh block in Nainital district of Uttarakhand. The location of the spring is 29.50555°N and 79.55235°E. The average elevation of the village is 1370 mts. The average temperature varies from 35°C to 10°C and the average annual rainfall in the village is 750 mm.



## Water quality and discharge

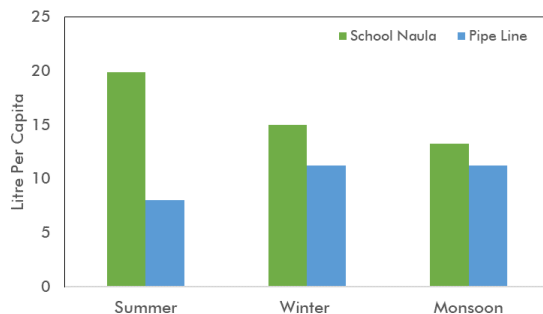
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
6.9	490	340	48	240	3	1	YES	8.25

## Per Capita water usage



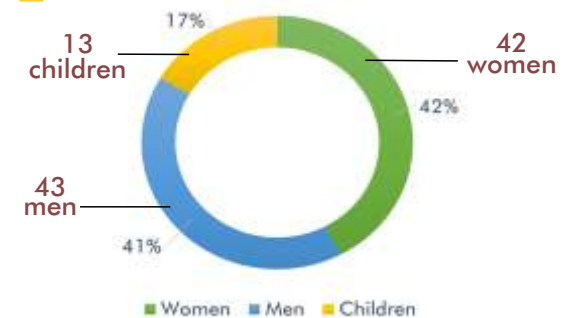
Per capita water usage in Basgaon village by people is higher during summer with 38 lpcd and lower during monsoon with 28 lpcd. However, the livestock consumption is more during winters and minimum during summers and monsoons.

## Spring source and usage

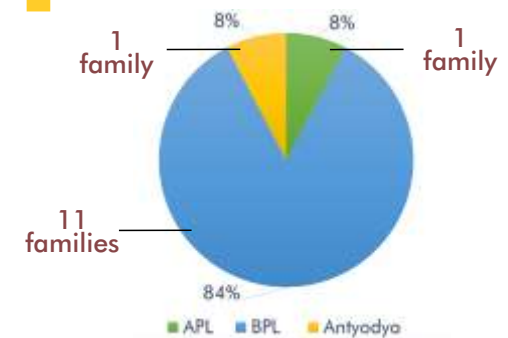


Basgaon village gets its water from school naula and a pipe line distribution system by PHE department. Dependency on school naula in terms of per capita daily is more than pipe line across all three seasons. However, the per capita usage from the pipe line reduces in summer indicating inconsistency in the supply leading to increased per capita usage from school naula.

## Demographic Distribution



## Economic categorisation

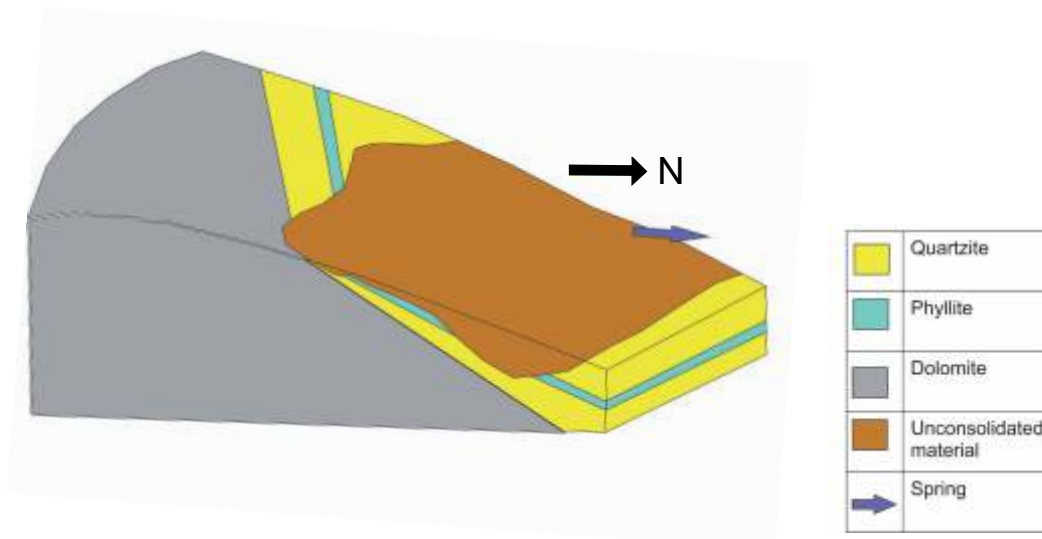


## Hydrogeology

### Geology of springshed

The geology of Basgaon school naula is dominated by layers of Quartzite, Phyllite and Dolomite. There is a large area covered by unconsolidated colluvial material deposited due to the erosion of the mountain top. The major area of infiltration happens through this unconsolidated material, which forms the major aquifer that feeds into the naula. A spring oozing out through such aquifer setting forms a classical case of depression spring.

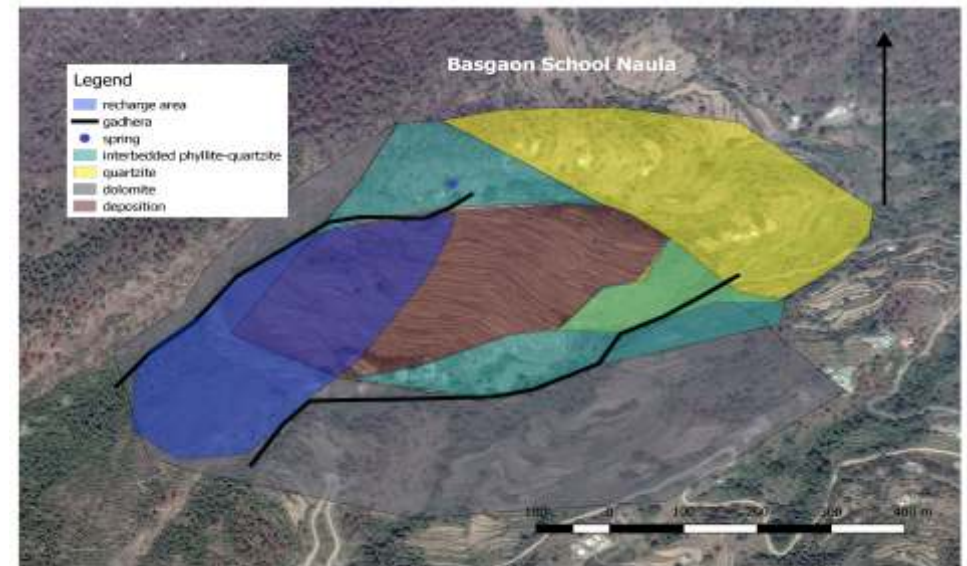
### Conceptual layout of Basgaon School Naula



### Recharge area details

The recharge area of Naula lies on the southwest of the spring location. The recharge area falls in private lands and van panchayat area of the village. The slope of the recharge area was 30.9% and the slope aspect is in NEE. The total recharge area identified was 4.08 ha. The land was partly used for human inhabitation and agriculture while most of it was fallow and is now populated by oak and shrub forest.

### Geology and Recharge area map



## Implementation

## Basgaon School Naula

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
Drainage of khal	Rmt.	40
Loose boulder checkdam	Rmt.	11.96
Contour trenches	Rmt.	546
Khal	Cum.	15.16
Percolation pit 1	Cum.	19.50
Terrace levelling	Sqm.	2010
Terrace Bunding	Rmt.	770
Percolation pit 2	Cum.	53.54

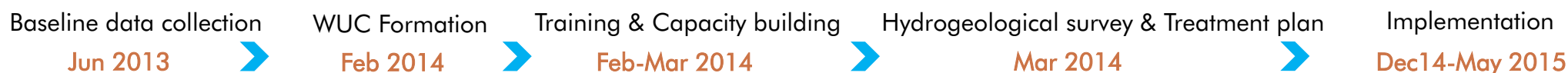
### Treatment plan

The recharge area was estimated to be 8.5 Ha out of which 4.08 Ha was treated. The recharge structures proposed in the area were percolation pits, khals, check dams, naula repair, contour trenches and terrace levelling. The selection of structures was done on the basis of the slope of the recharge area.

The structures were constructed by the community under the supervision of the Jal samiti. The community contributed 20% of the cost in form of labour in van panchayat lands and 40% in private lands. A proposal of setting up an Operation and Maintenance fund was submitted to the block level administration.

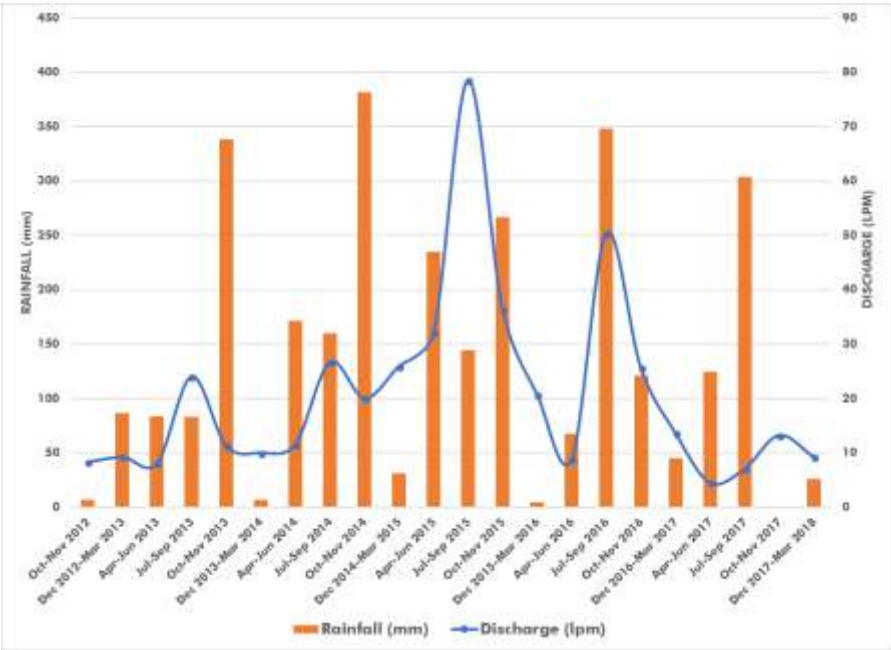
### Challenges

Majority of the identified catchment area was private land while the rest was van panchayat land. Therefore, limited activities were carried out in the available van panchayat land. The support from the village was not 100% owing to the presence of local politics in the village. Jal samiti members were majority from SC communities inhabiting downstream while the catchment area land owners belonged to upper caste leading to local politics.



Impacts

Hydrological impacts



Total rainfall in July'13-June'14 recorded was 600 mm while the average discharge was 14.18 lpm. Implementation was carried out during Dec-May 2015. In the next consecutive year (July14 – Jun 15) the rainfall recorded was 808 mm (25% increment from the previous year). The average discharge (26.15 lpm) in the same year also increased by approx. 45%.

In the subsequent year (July15 – Jun 16), rainfall decreased drastically to 483 mm (67% drop from the previous year's rainfall). However, the discharge of the spring was not affected severely. Rather it showed an increase of 25% as compared to previous year indicating a clear impact of implementation activity. But if an analysis is made taking into account only lean season discharge, then it shows a negative plot because the lean season discharge has certainly reduced in the year July 15- Jun16 due to less rainfall but the overall annual average discharge has gone up.

Hydrological cycle	Total Annual Rainfall (mm)	Average Discharge (LPM)
July 2013- June 2014	600	14.18
July 2014- June 2015	808	26.15
July 2015- June 2016	483	36.10



School kids fetching water from the spring



## Reconnaissance survey

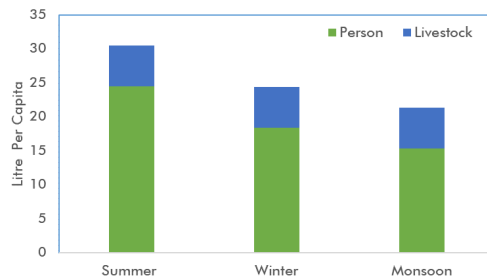
Para naula is located in Harinagar village from Ramgarh block of Nainital district in Uttarakhand. The location of the spring is 29.47552 °N and 79.59597°E. The average elevation is around 1800 mts above MSL. The average temperature is ranges between 30°C to 0°C. and the average rainfall is around 1200 mm annually.



## Water quality and discharge

pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
6.5	210	140	32	80	NIL	NIL	YES	2.48

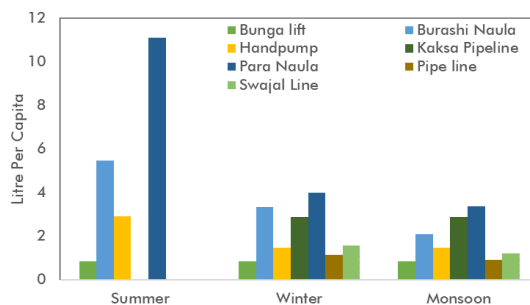
## Per Capita water usage



Per capita water usage in Harinagar village by people is higher during summer with 24 lpcd and lower during monsoon with 15 lpcd.

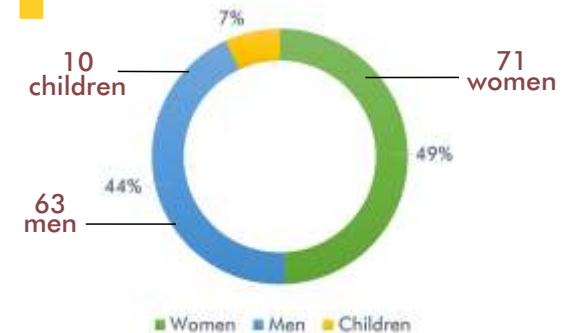
However, the livestock consumption is more during winters and minimum during summers and monsoons.

## Spring source and usage

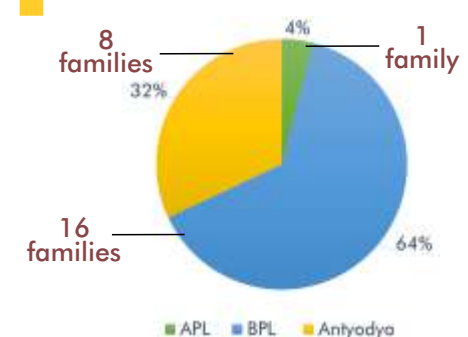


Harinagar village gets its water from multiple sources. It is very clear from the data that the water usage from Para naula is high during summer. Even after having so many sources in the village, the dependency on Para naula is high which indicates that it is the main source in the village.

## Demographic Distribution



## Economic categorisation



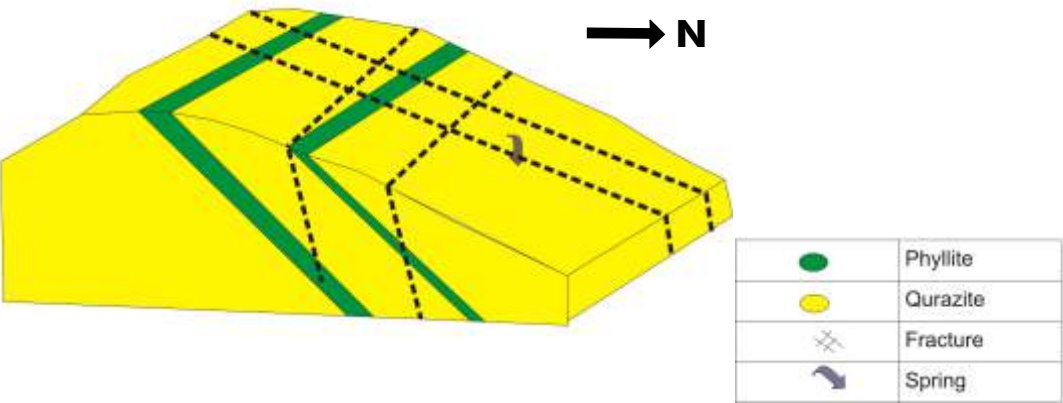


# Hydrogeology

## Geology of springshed

The underlying rocks are alternate bands of phyllite and quartzite. The general dip direction is towards the northeast direction. The strike runs along northwest to southeast axis. The average dip amount is 30 degrees. The water originating from the spring is through the fracture system in the spring shed. Therefore, the spring is classified as a fracture spring. There are two dominant fracture sets in the area, one running along the N-S direction and another along the SE-NW direction. The first fracture set is the one responsible for diverting the water into the spring.

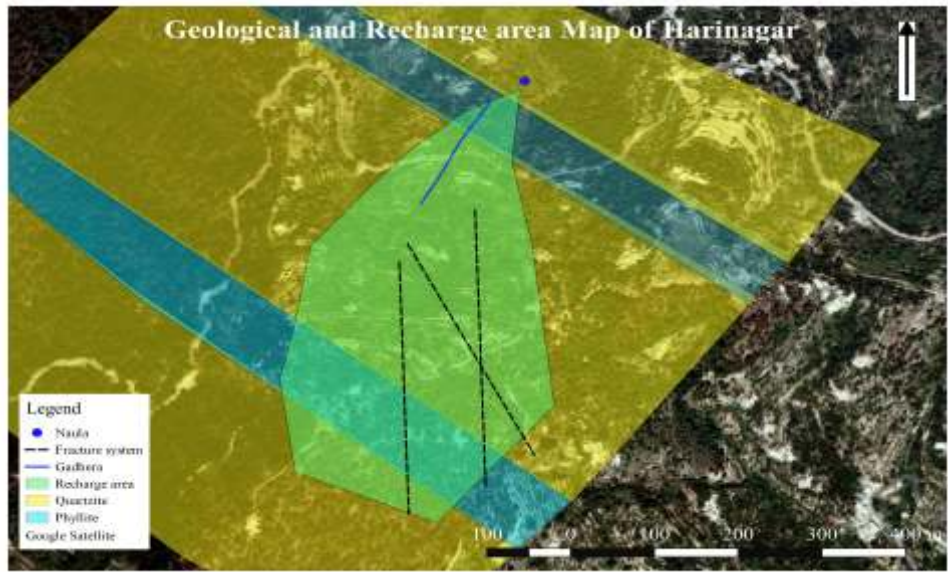
## Conceptual layout of Para Naula



## Recharge area details

The recharge area of the Para Naula lies on the south of the spring point. The recharge area identified was 8 Ha. A part of the recharge area falls in private lands while the rest comes under reserve forest. The private land was partly used for agriculture and the remaining part was populated by pine and oak forests and shrubs. Most of the forest area is also covered by shrubs. The average slope of the recharge area is 28.6% and the aspect is towards NNE direction.

## Geology and Recharge area map



# Implementation

## Recharge area treatment map



## Recharge activity details

Name of work	Unit	Quantity
Handpump repair	No.	1
Loose boulder checkdam	Rmt.	10.63
Contour trenches	Rmt.	100
Terrace levelling	Sqm.	2110
Protection wall	Rmt.	3.26

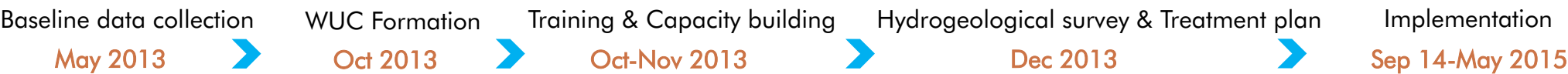
## Treatment plan

The recharge area was estimated to be 8 Ha out of which 4.5 Ha was treated. The recharge structures proposed in the area were percolation pits, khals, check dams, naula repair, contour trenches and terrace levelling. The selection of structures was done on the basis of the slope of the recharge area.

## Challenges

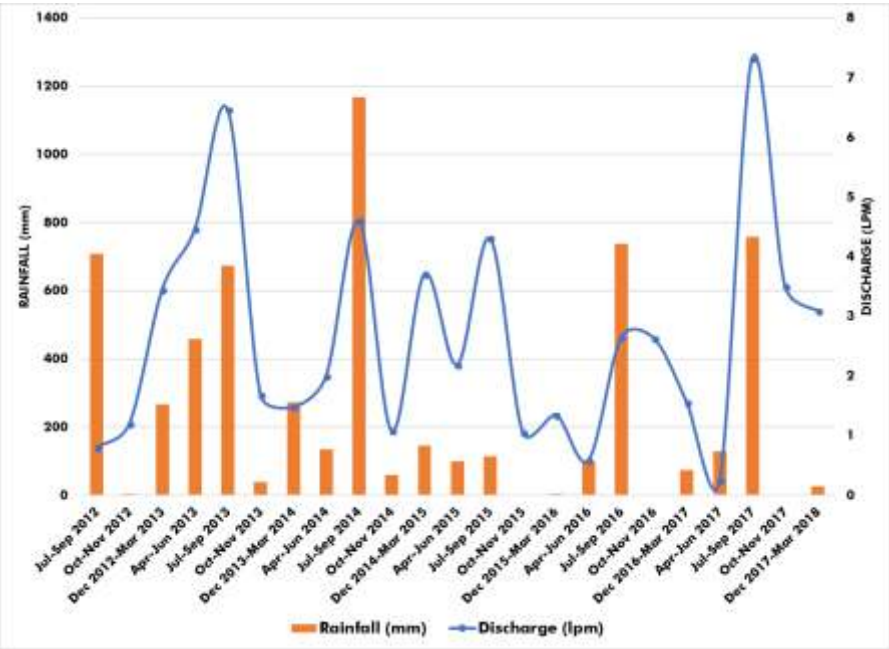
Part of the catchment area (approx. 2- 2.5 ha) was under Reserve forest. The permission for implementation from the forest department was not granted for that part of the recharge area.

The other challenge was in bringing out strong women leadership in the Jal samiti due to the existence of local political influence of other members in the samiti.



# Impacts

## Hydrological impacts



It is clear from the hydrograph that the discharge of spring has been declining throughout the monitoring years. The spring was on the verge of drying after yielding 1.35 lpm in the winter of 2016 but in the subsequent year the spring continued to flow with 1.56 lpm discharge in winters of 2017 in spite of declining rainfall. This would have been possibly due to the implementation measures that were undertaken. Moreover, nearly half portion of the recharge area that was lying in the forest reserve was not available for recharge activities. If the permission was granted for carrying out recharge intervention in that portion, it would have certainly made some visible impact.



Social (Individual household) survey



Hydrogeological survey



## Reconnaissance survey

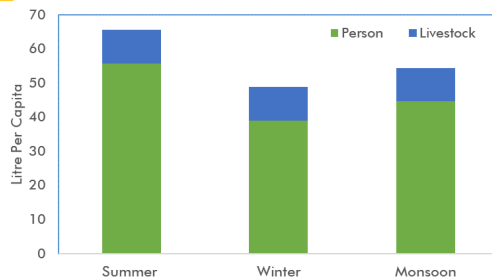
Meherkhola is a village in Ramgarh block of Nainital district in Uttarakhand. The location of the spring is 29.5297778 °N and 79.65472°E. The average elevation in this area is around 1350 mts above MSL. The average temperature ranges from 35°C to 5°C. The annual rainfall in the village is around 1050mm.



## Water quality and discharge

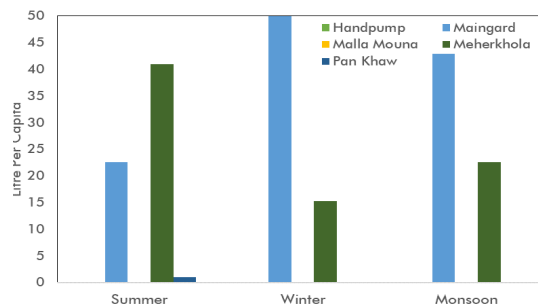
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
6.41	50	40	16	48	0.01	NIL	YES	6.83

## Per Capita water usage



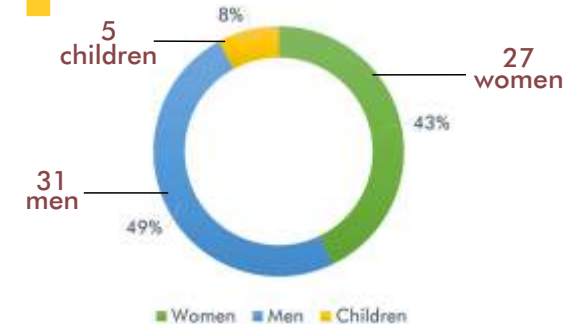
Per capita water usage in Meherkhola village by people is higher during summer with 55 lpcd and monsoon with 45 lpcd. While it is lower during winter with 39lpcd. However, the livestock consumption is more during winters and minimum during summers and monsoons.

## Spring source and usage

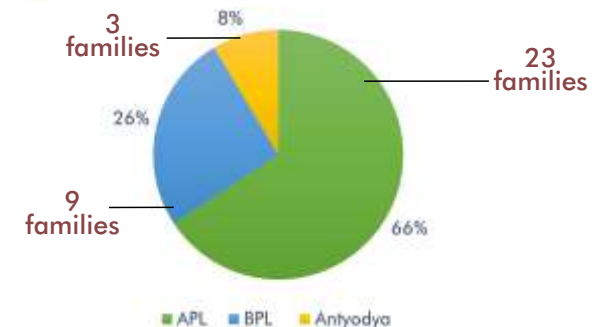


Harinagar village gets its water from multiple sources. It is very clear from the data that the water usage from Para naula is high during summer. Even after having so many sources in the village, the dependency on Para naula is high which indicates that it is the main source in the village.

## Demographic Distribution



## Economic categorisation

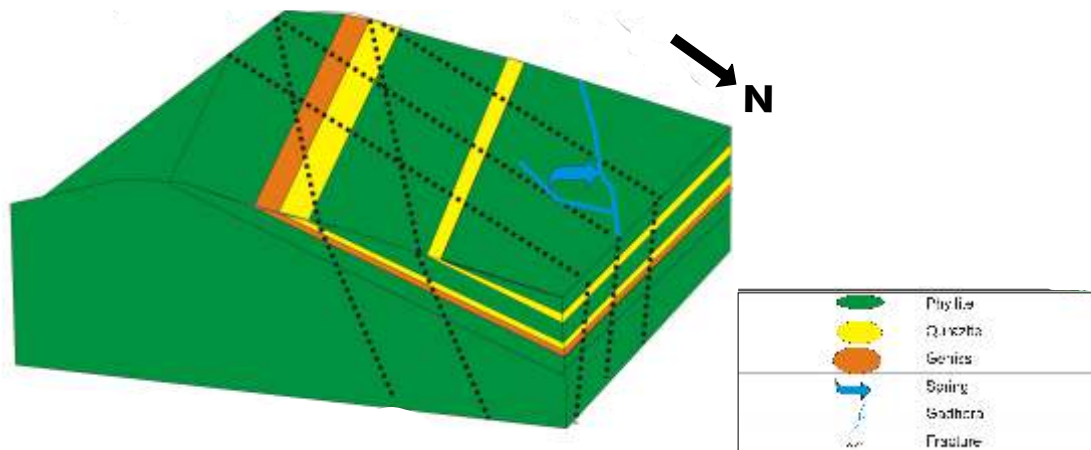


## Hydrogeology

### Geology of springshed

The underlying rocks are alternate bands of Phyllite, Gneiss and Quartzite. The general dip direction is towards the north direction. The strike runs along northwest to southeast axis. The average dip amount is 40 degrees. The water originating from the spring is through the fracture system in the spring shed. Therefore, the spring is classified as a fracture spring. There are two dominant fracture sets in the area, one running along the N-S direction and another along the NE-SW direction. The second fracture set is the one responsible for diverting the water into the spring.

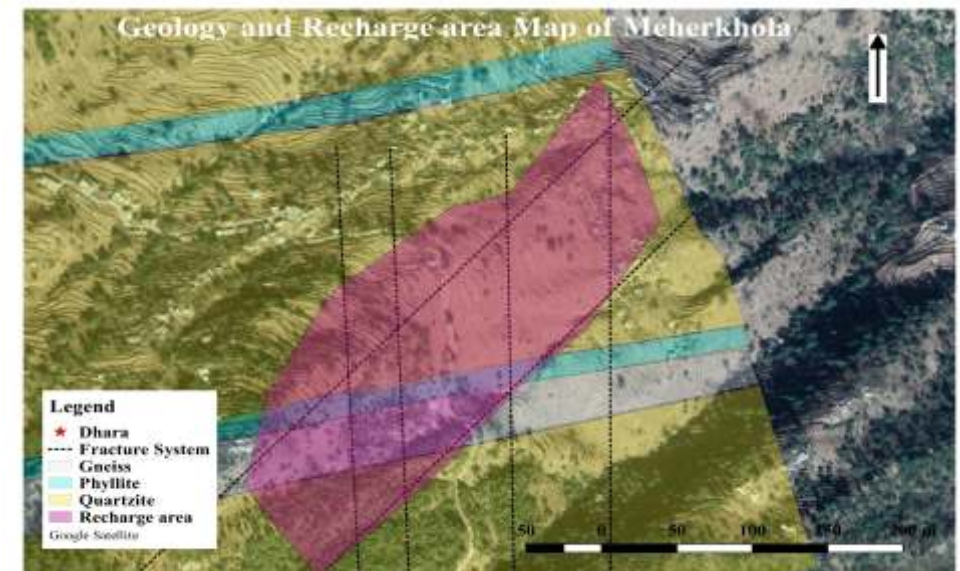
### Conceptual layout of Meherkhola Dhara



### Recharge area details

The recharge area of the Meherkhola lies on the south of the spring point. The total recharge area identified was 12 Ha. Most of the land belongs to private owners and was only used for agriculture and habitation. The average slope of the recharge area is 17.6% and the aspect is towards NE direction.

### Geology and Recharge area map





# Implementation

## Meherkhola Dhara

### Recharge area treatment map



### Recharge activity details

Name of work	Unit	Quantity
Gully plug	Rmt.	8.50
Sub surface check dam	Rmt.	11.88
Contour trenches	Rmt.	1095.25
Percolation pit-1	Cum.	34
Percolation pit-2	Cum.	87.85
Khal repair work	Cum.	5
Drainage of khal	Rmt.	87

### Treatment plan

The recharge area was estimated to be 12 Ha out of which 10 Ha was made available for treatment. The recharge structures proposed in the area were percolation pits, khals, check dams, naula repair, contour trenches and terrace levelling.

The implementation was carried out in the private land owned by the people of Chapad village which was made available after having an agreement between the owners and Jal samiti.

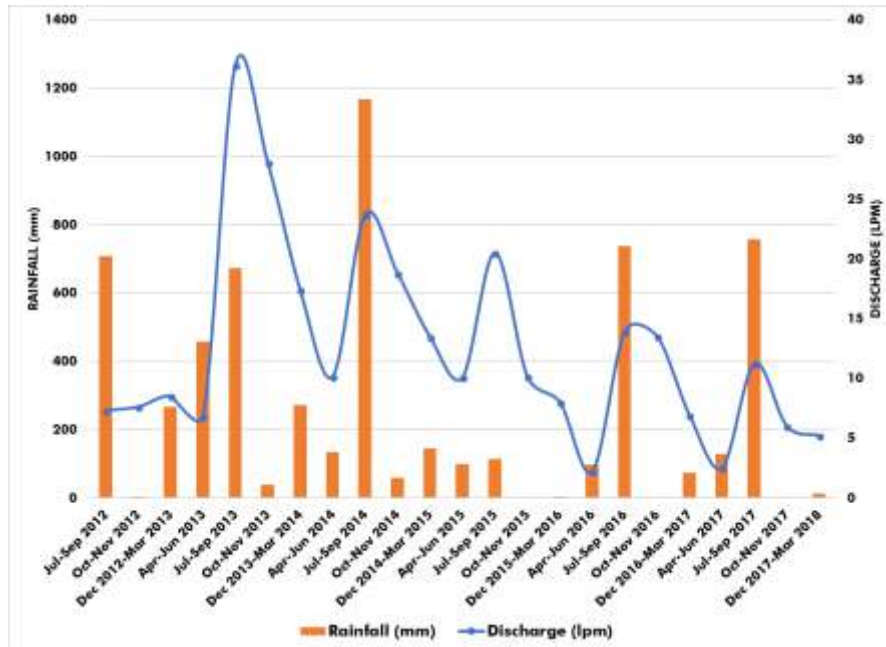
### Challenges

A part of the catchment area identified was found to fall in private land owned by people belonging to Chapad village. As a result, acquiring NOC for carrying out recharge activities was getting difficult. The other challenge came when a hospital was constructed in the catchment area post intervention along with some development activities at source which further led to source diversion.



# Impacts

## Hydrological impacts



From the hydrograph, it is evident that the spring is constantly declining, especially the peak discharge. The rainfall also decreased by 1257 mm post implementation year (July15- Jun16) . Interestingly, a very slight increase of 0.31 lpm is observed in the lean period of 2017 to that of 2016. The implementation was carried out during Jul14- Mar15.

Such minor impact possibly could be due to the developmental activities at source leading to its diversion and the construction of hospital in the recharge area.

## Meherkhola Dhara



## Reconnaissance survey

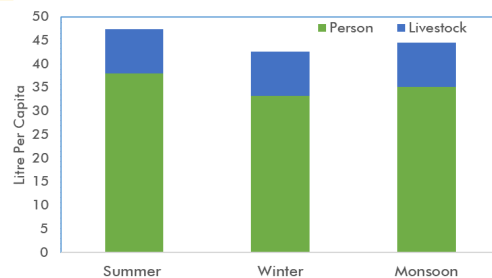
Naghar village lies in the Bageshwar block of Bageshwar district of Uttarakhand. The location of the spring is 29.78020 °N and 79.77740°E. The average elevation is around 1800 mts above MSL. The average temperature is ranges between 30°C to 10°C. The average rainfall received in the village is around 1350 mm annually.



## Water quality and discharge

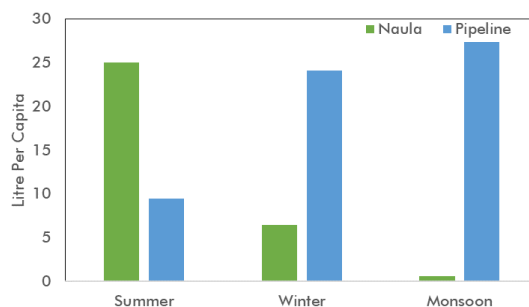
pH	TDS (mg/l)	Salinity (mg/l)	Chloride (mg/l)	TH (mg/l)	Total Iron (mg/l)	Nitrate (mg/l)	FC (YES/NO)	Discharge (lpm)
7.22	360	210	40	320	0.01	1	YES	1.76

## Per Capita water usage



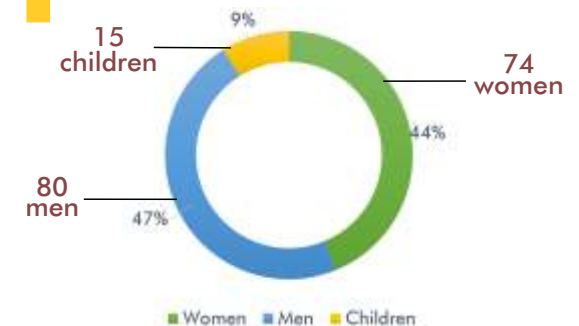
Per capita water usage in Naghar village by people is higher during summer with 38 lpcd and lower during winter with 33 lpcd. The usage is almost similar in both summer and winter. However, the livestock consumption is more during winters and minimum during summers and monsoons.

## Spring source and usage



Harinagar village gets its water from multiple sources. It is very clear from the data that the water usage from Para naula is high during summer. Even after having so many sources in the village, the dependency on Para naula is high which indicates that it is the main source in the village.

## Demographic Distribution



## Economic categorisation



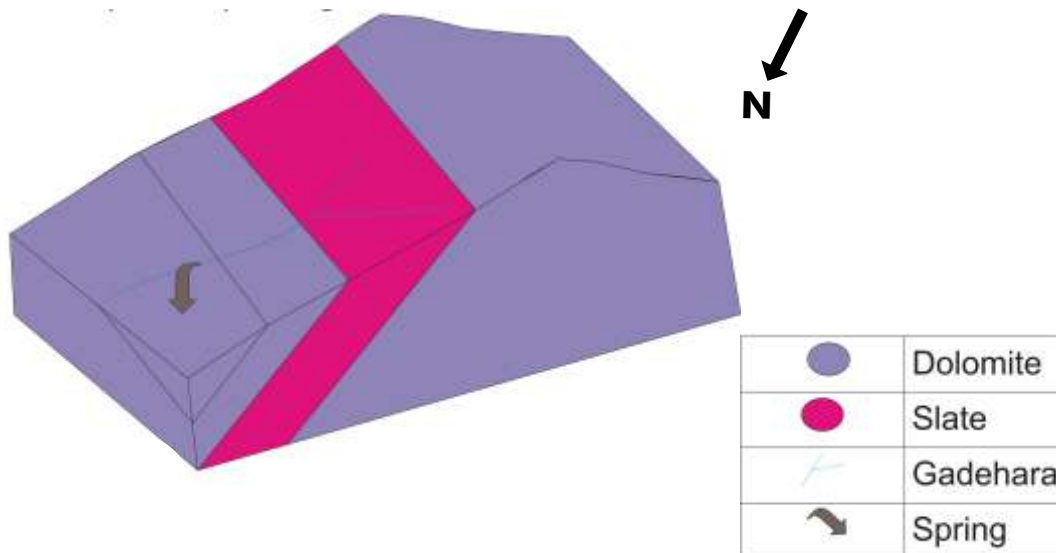


## Hydrogeology

### Geology of springshed

The underlying rocks are dolomite and slate. The general dip direction is towards the northeast direction. The strike runs along northwest to southeast axis. The average dip amount is 40 degrees. The water originating from the spring is through the karst system in the spring shed. Therefore, the spring is classified as a karst spring. Due to the karstic nature of dolomite, the spring has potential to discharge at higher magnitudes. However, it will also depend upon the amount of karst features available.

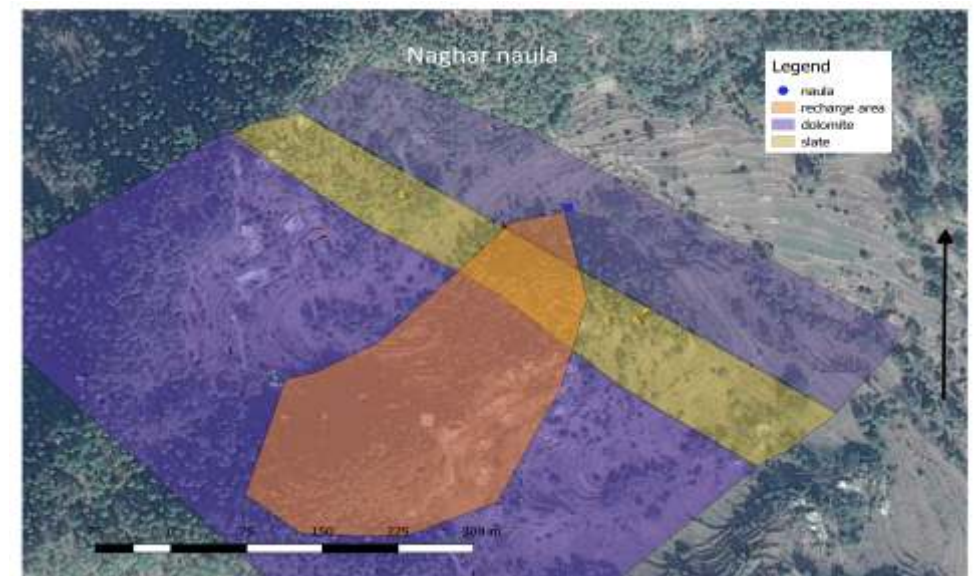
### Conceptual layout of Naghar Naula



### Recharge area details

The recharge area of the Naghar Naula lies on the southwest of the spring point. The recharge area identified was estimated around 7 Ha. The recharge area fell under the van panchayat of village Khakar and private lands of village Joshigaon. The land was partly used for agriculture while most of it was barren and is now populated by oak and pine forests. The average slope in the recharge area is approx. 21.2% and aspect is towards NE direction.

### Geology and Recharge area map



Implementation

Recharge area treatment map



Recharge activity details

Name of work	Unit	Quantity
Terrace levelling	Sqm.	5748
Terrace bunding	Rmt.	150
Contour trenches	Rmt.	300
Percolation pit	Cum.	49.34
Plantation	No.	500
Loose boulder checkdam	Rmt.	11.79

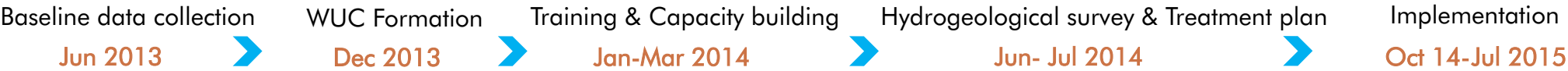
Name of work	Unit	Quantity
Contour trench repair	Rmt.	600
Khal	Cum.	19.20
Drainage of Khal	Rmt.	60
Source repair work	No.	1
Brushwood checkdam	Rmt.	15

Treatment plan

The recharge area was estimated to be 12 Ha out of which 10 Ha was made available for treatment. The implementation was carried out in the private land owned by the people of Chapad village which was made available after having an agreement between the owners and Jal samiti.

Challenges

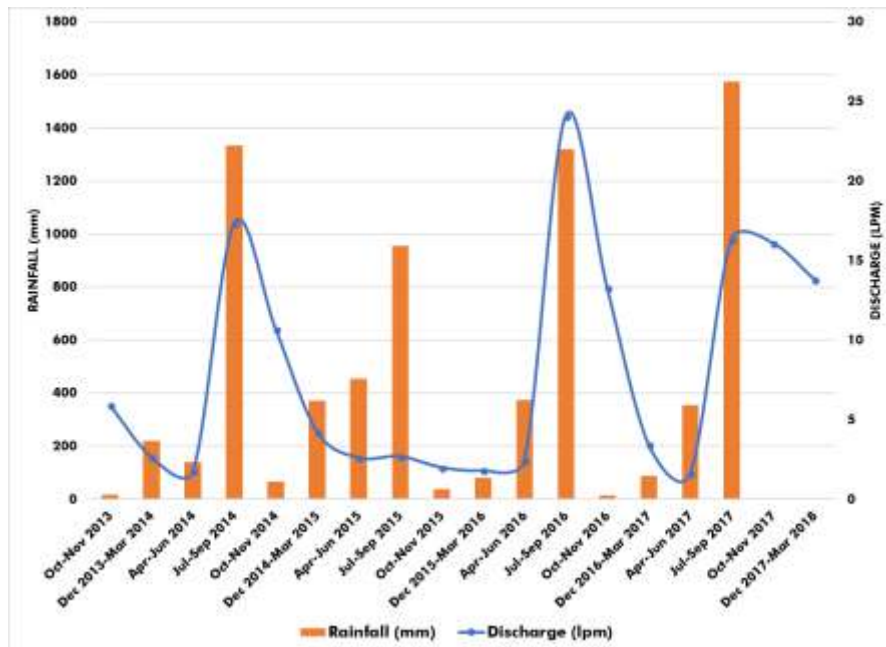
The main challenge was with regards to availability of land available for implementing recharge structures. The catchment area was covering two areas viz. Joshi gaon’s private land and van panchayat land of Khakar village. While the beneficiaries from Naghar naula were from Joshi gaon and Naghar gaon. So a Jal Samiti was formed with members from all three locations to facilitate implementation.





## Impacts

### Hydrological impacts



From the hydrograph, it is evident that the spring has shown reduction trend in discharge during lean season across all the years. However, the discharge in the lean season of Jul14'- Jun15' has shown minor improvement. Although the quantum was not high. The implementation was undertaken during that same year. The average lean season discharge of 1.76 lpm had gone up to 2.6 lpm which is roughly 32% increase. The lean season discharge during 2017 had further drop to 1.6 lpm . However, the annual average discharge (10.66 lpm) of that year had certainly gone up as compared to its previous year 2016 which was recorded as 2.23 lpm.



Jal Samiti meeting



Community involvement in mapping springsheds



# **Annexures**

## ***Spring inventory***

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
1	Nainital	Kokilbanna	Kokilbanna	Ghopagadhera Dhara	29.45103	79.62092	1915
2	Nainital	Suppi	Supi Kafli	Kafli Dhara	29.42847	79.61458	1959
3	Nainital	Suppi	Supi Bhumka	Bhumka Naula	29.44731	79.61450	1986
4	Nainital	Gajar	Gajar	Nar Da Naula	29.42802	79.62807	2071
5	Nainital	Gajar	Gajar - II	Gajar Naula	29.42653	79.63132	2055
6	Nainital	Sunkiya	Sunkiya - I	Sunkiya Dhara	26.44050	79.64358	2035
7	Nainital	Sunkiya	Sunkiya - II	Sunkiya Dhara -2	29.44343	79.63930	2031
8	Nainital	Meora	Meora	ChoyaGadhera	29.46908	79.61198	1839
9	Nainital	Gargaon	Gargaon	Diggi Naula	29.46564	79.62306	1752
10	Nainital	Nathuakhan	Nathuakhan	Kafaldhari Naula	29.46389	79.59381	1867
11	Nainital	Gargaon	Gargaon Shaila	ShailaGadhera	29.47705	79.63135	1850
12	Nainital	Loshgyani	Loshgyani	Dansil naula	29.46588	79.57100	2124
13	Nainital	Kamoli	Dhokane	PaneraGadhera	29.52482	79.56533	1244
14	Nainital	Bhadyun	Bhadyun	Bhadune Dhara	29.53013	79.54118	1277
15	Nainital	Nawli	Nawli	Diggi Dhara	29.53598	79.52490	993
16	Nainital	Chiori	Chiori	Panera Naula	29.50935	79.54132	1607
17	Nainital	Chiori	Kaflaad	Gadhera naula	29.52382	79.54537	1484
18	Nainital	Chopra	Chopra	Dhoina Naula	29.53838	79.59647	1336
19	Nainital	Bhadyun	Beduli	Keligad Dhara	29.52758	79.53329	1280
20	Nainital	Chopra	Chopra - II	Mungru Naula	29.53838	79.58923	1291
21	Nainital	Bhadyun	Bhadune - II	Bedu Naula	29.52630	79.58923	1508
22	Nainital	Lohali	Lohali	Lohali Dhara	29.48947	79.50605	1246
23	Nainital	Balyali	Balyali	Shiv Mandir Naula	29.50555	79.55236	1395
24	Nainital	Balyali	Balyali	Talla Balyali Naula	29.49442	79.54880	1248
25	Nainital	Pinron	Pinron	Pyura Pani	29.28617	79.64261	1375
26	Nainital	Banna	Banna 1	PadaGadhera	29.29017	79.62994	1495
27	Nainital	Pinron	Pinsela	Gairadi Dhara	29.30736	79.63748	1596
28	Nainital	Banna	Banna Bassa	Harsia Dhar	29.31781	79.62019	1713
29	Nainital	Simrar	kulgad	kulgad	29.52465	79.57412	1140
30	Nainital	Navali	Navali	Keligad	29.52865	79.52765	1099
31	Nainital	Kamoli	Kamoli	Ghat	29.39389	79.09453	1259
32	Nainital	Basgaon	Basgaon	School	29.50555	79.55236	1369
33	Nainital	Manarsa	Manarsa	road	29.54511	79.53856	1049
34	Nainital	baribaj	Salkuli	Salkuli	29.50679	79.56998	1307

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
35	Nainital	Simrar	Dol	Dol	29.51111	79.58803	1385
36	Nainital	baribaj	baribaj	Banj	29.49958	79.57192	1472
37	Nainital	Kwarab	Kwarab	Dumtana	29.55392	79.61528	1121
38	Nainital	Basgaon	Kastnauli	kastnauli	29.50325	79.54028	1625
39	Nainital	Kwarab	Kwarab	Shiv	29.54653	79.61156	1312
40	Nainital	Mouna	Mouna	Meherkhola	29.52978	79.65472	1432
41	Nainital	Mouna	Mouna	Mall	29.52994	79.65631	1386
42	Nainital	Mouna	Mouna	Tall	29.52994	79.65631	1386
43	Nainital	Kafuda	Kumati	Dhara	29.52911	79.64731	1520
44	Nainital	Chapar	Chapar	Chapar	29.54086	79.62750	1311
45	Nainital	Daiyari	Simayal	Naag	29.54578	79.62514	1255
46	Nainital	Daiyari	Simayal	Bhumka	29.47553	79.59597	1804
47	Nainital	Haringar	Haringar	Para	29.50022	79.63108	1625
48	Nainital	Chattola	Chattola	Ghatgar	29.46619	79.58108	1881
49	Nainital	Loszyani	Loszyani	Dansil	29.45386	79.61716	1823
50	Nainital	Bhorsa	Bhorsa	Aamgad	29.27680	79.61760	858
51	Nainital	Pastola	Pastola	Jala	29.27442	79.62903	843
52	Nainital	Pandeygaon	Pandeygaon	Dhara	29.34606	79.58706	1592
53	Nainital	Pandeygaon	Pandeygaon	Datta	29.35219	79.57578	1729
54	Nainital	Malwatal	Malwatal	Talla	29.31825	79.64167	1332
55	Nainital	Songaon	Songaon	Brahampani	29.31825	79.64167	1594
56	Nainital	Pandeygaon	Bilaspur	Kholi	29.35219	79.57550	1451
57	Nainital	Sunkiya	Sunkiya	Bhateliya	29.43742	79.64806	2185
58	Nainital	Parbara	Parbara	Pradhan	29.41519	79.66653	2011
59	Nainital	Parbara	Parbara	Dikki	29.41856	79.67219	2097
60	Nainital	Saliyakot	Saliyakot	Malla	29.42547	79.68119	953
61	Nainital	Sunderkhal	Sunderkhal	Bhumiya	29.40853	79.67597	2129
62	Nainital	Majhera	Majhera	Bhakhali	29.41781	79.64844	1934
63	Nainital	Doba	Doba	Panera	29.47066	79.60081	1829
64	Nainital	Majhera	Majhera	Panditji	29.49120	79.46930	1051
65	Nainital	Bayasi	Nauna	Dhara	29.49853	79.47236	1078
66	Nainital	Jajula	Jogyari	Jogyari	29.49850	79.46361	1169
67	Nainital	Unchakot	Uchakot	Malla	29.47397	79.45286	1414
68	Nainital	Unchakot	Uchakot	Talla	29.53858	79.38669	1151
69	Nainital	Darima	Darima	Mangru	29.53897	79.38672	1143
70	Nainital	Unchakot	Unchakot	ChipChip	29.53864	79.38897	1130
71	Nainital	Pandaygaon	Pandaygaon	Kaulapani Dhara	29.35072	79.57969	1525

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
72	Nainital	Pandaygaon	Pandaygaon	Karkota Dhara	29.35300	79.57061	1552
73	Nainital	Pandaygaon	Pandaygaon	Harijan Dhara II	29.34942	79.57314	1543
74	Nainital	Pandaygaon	Pandaygaon	Harijan Dhara	29.34661	79.57381	1534
75	Nainital	Nauval	Nauval	Naul Naula	29.33894	79.58744	1449
76	Nainital	Nauval	Nauval	Naul Dhara	29.33158	79.58697	1404
77	Nainital	Galnai	Galnai	Galani Gadhera	29.26911	79.75436	1383
78	Nainital	Banoliya	Banoliya	Banoliya ChinaraGadhera	29.23728	79.78925	1670
79	Nainital	Hartapa	Hartapa	Niglat HartapaGadhera	29.44472	79.48928	1370
80	Nainital	Devipura	Devipura	ChampagarhGadhera	29.41059	79.29564	651
81	Nainital	Kafuda	Kaflaad	Seem Dhara	29.51831	79.63444	1607
82	Nainital	Daiyari	Shimayal	Silori Dhara	29.53758	79.62514	1280
83	Nainital	Peora	Peora	Bhumka Naula	29.51983	79.62572	1441
84	Nainital	Peora	Peora	Gadhera Naula	29.51686	79.62511	1444
85	Nainital	Peora	Peora	Malla Bakhli Naula	29.51814	79.62317	1540
86	Nainital	Simrar	Sinoli	Sinoli Naula	29.52489	79.57622	1264
87	Nainital	Lohali	Lohali	Chichna Dhara	29.49562	79.50490	1081
88	Nainital	Lohali	Lohali	Jadapani Dhara	29.48439	79.51099	1467
89	Nainital	Chiori	Kaflad	Panera Naula	29.52133	79.54949	1470
90	Nainital	Chopra	Chopra	Bhagat Naula	29.54056	79.58945	1231
91	Nainital	Basgaon	Basgaon	Road Dhara	29.50640	79.55653	1320
92	Nainital	Basgaon	Basgaon	Shiv Mandir Naula	29.50166	79.55570	1451
93	Nainital	Basgaon	Basgaon	Basgaon Road Dhara	29.50640	79.55653	1326
94	Nainital	Basgaon	Basgaon	Tawalekh Dhara	29.49442	79.54877	1766
95	Nainital	Gargaon	Gargaon	Kholiya Naula	29.46969	79.62067	1753
96	Nainital	Gargaon	Gargaon	Kholiya Naula 2	29.46979	79.62078	1815
97	Nainital	Gargaon	Gargaon	Bakhli Naula	29.46630	79.62001	1752
98	Nainital	Gargaon	Gargaon	Arya Naula	29.46774	79.61860	1778
99	Nainital	Meora	Meora	Bakhli Naula	29.46673	79.61775	1765
100	Nainital	Meora	Meora	Gottho Naula	29.46768	79.61493	1810
101	Nainital	Nathuakhan	Nathuakhan	Bhatti Naula	29.47277	79.60506	1812
102	Nainital	Nathuakhan	Nathuakhan	Mandir Naula	29.46929	79.60777	1844
103	Nainital	Losgayani	Losgayani	Gairigar Naula	29.46688	79.58670	1890
104	Nainital	Losgayani	Losgayani	Gairigar Dhara	29.46527	79.58499	1843
105	Nainital	Haringar	Haringar	Raikudi Naula	29.48121	79.59608	1669
106	Nainital	Haringar	Haringar	Raikudi Naula II Dhariram	29.48121	79.59608	1690
107	Nainital	Haringar	Haringar	Bich Ka Naula	29.47960	79.60171	1678
108	Nainital	Haringar	Haringar	Acharikhet Naula Buraspani	29.48013	79.59837	1685



S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
109	Nainital	Haringar	Haringar	Malla Naula Gairadi	29.47918	79.60156	1695
110	Nainital	Bhorsa	Bhorsa	Tuni Pani Dhara	29.27656	79.61831	932
111	Nainital	Bhorsa	Bhorsa	Bilora Dhara	29.27969	79.61497	797
112	Nainital	Jangliagaon	Jangliagaon	Loharpani Dhara	29.32983	79.61672	1684
113	Nainital	Jangliagaon	Jangliagaon	Dhorapani	29.32719	79.61333	1716
114	Nainital	Jangliagaon	Jangliagaon	Gajaar Dhara	29.32775	79.61658	1742
115	Nainital	Jangliagaon	Jangliagaon	Bagiyapani Dhara	29.32242	79.63164	1712
116	Nainital	Jangliagaon	Jangliagaon	Budadhura Dhara	29.32183	79.62506	1713
117	Nainital	Pinron	Pinron	Amlaani Dhaara	29.27611	79.64264	1341
118	Nainital	Pinron	Pinron	Ghatgaad Dhaara	29.28447	79.63367	1229
119	Nainital	Pastola	Pastola	Kwairala Dhara	29.25972	79.63639	814
120	Nainital	Pastola	Pastola	Kanaaligaad Dhara	29.26936	79.63331	852
121	Nainital	Pastola	Pastola	Kilwan Dhara	29.27611	79.62631	1123
122	Nainital	Ghuana	Ghuana	Malla Dhara	29.44471	79.47815	1107
123	Nainital	Ghuana	Ghuana	Naula	29.44390	79.47860	1131
124	Nainital	Paadli	Paadli	Paadli Naula	29.43358	79.48474	1358
125	Nainital	Paadli	Paadli	Paadli Dhara	29.43437	79.48572	1309
126	Nainital	Matela	Matela	Dhara	29.51380	79.55002	1697
127	Nainital	Chiyori	Chiyori	Dhara	29.52268	79.54273	1552
128	Nainital	Ata Khas	Ata Khas	Dhara	29.50505	79.57426	1406
129	Nainital	Pathri	Pathri	Naula	29.49149	79.51868	1318
130	Nainital	Gangori	Gangori	Handpump	29.54789	79.54528	1063
131	Nainital	Naya chorsa	Naya chorsa	Barka Pair Dhara	29.41023	79.46915	1663
132	Nainital	Bhawaligaon	Bhawaligaon	Bhowaligaon Gadhara	29.42778	79.48669	1430
133	Nainital	Bhawaligaon	Bhawaligaon	Bhowaligaon Gadhara	29.42431	79.48624	1531
134	Nainital	Bhawaligaon	Bhawaligaon	Bhowaligaon Gadhara	29.42221	79.48512	1618
135	Nainital	Banana	Banana	Gadhera	29.30489	79.61611	1080
136	Nainital	Pinsela	Pinsela	Handpump	29.30298	79.63937	1455
137	Nainital	Udunga	Udunga	Udunga Gadhara	29.25930	79.65569	1056
138	Nainital	Bhaurisa	Bhaurisa	Gathgarh Gadhara	29.28739	79.60786	781
139	Nainital	Bhaurisa	Bhaurisa	Handpump	29.28098	79.63009	1142
140	Nainital	Amiya	Amiya	Kawakan Gadhara	29.29869	79.58032	686
141	Nainital	Amiya	Amiya	Amiya Gadhara	29.29518	79.59593	693
142	Nainital	Dewli	Dewli	Dewali Gadhara	29.30286	79.81031	1656
143	Nainital	Putpuri	Putpuri	Putpuri Gadhara	29.32469	79.76127	1429
144	Nainital	Ramela	Ramela	Remaila Gadhara	29.33976	79.76298	1270
145	Nainital	jamrari	jamrari	Jamrari Gadhara	29.36043	79.74998	1404

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
146	Nainital	Raikuna	Raikuna	Raikuna Gadhara	29.36473	79.72936	1385
147	Nainital	Gajar	Gajar	Gajar Gadhara	29.42749	79.63241	2069
148	Nainital	Buribana	Buribana	Buribana Gadhara	29.44218	79.62114	1968
149	Nainital	Kokilbana	Kokilbana	Khopa Gadhara	29.45243	79.62302	1854
150	Nainital	Galla	Galla	Khapara Dhara	29.43057	79.59707	2303
151	Nainital	Lodh	Lodh	Lodh Gadhara	29.45404	79.60689	1906
152	Nainital	Darima Dubkhar	Darima Dubkhar	Dubkhar Dhara	29.45229	79.64389	1941
153	Nainital	Darima Kalunuma	Darima Kalunuma	Kalunuma Gadhara	29.46236	79.64343	1871
154	Nainital	Darima Colony	Darima Colony	Bhatt ji Ka Dhara	29.47191	79.64560	2187
155	Nainital	Myora	Myora	Handpump	29.47169	79.61156	1920
156	Nainital	Shimayal	Shimayal	Dhara	29.47690	79.61277	1727
157	Nainital	Shimayal	Shimayal	Dhara	29.47321	79.61978	1794
158	Nainital	Baret	Baret	Galkata Gadhara	29.48266	79.62754	1746
159	Nainital	Bhawaligaon	Bhawaligaon	Naula Bhawaligaon	29.41403	79.48519	1729
160	Nainital	Bhawaligaon	Bhawaligaon	Malligarh Pulya srot	29.41268	79.48129	1767
161	Nainital	Bhawaligaon	Chaurasa	Chak Basot I	29.43561	79.48703	1248
162	Nainital	Bhawaligaon	Chaurasa	Chak Basot II	29.43431	79.48567	1313
163	Nainital	Bhawaligaon	Chaurasa	Naula Chak Basot	29.43353	79.48476	1355
164	Nainital	Gargauli	Gargauli	Naulagair	29.46335	79.44997	1468
165	Nainital	Gargauli	Gargauli	Devi Mandir Source	29.46308	79.44894	1501
166	Nainital	Gargauli	Gargauli	Chhidagair Source	29.46429	79.44976	1483
167	Nainital	Gargauli	Gargauli	Bijoliya Source	29.46698	79.45358	1404
168	Nainital	Ghaghareti	Chandula	Chadula Dhara	29.21688	79.50437	424
169	Nainital	Ghuna	Ghuna	Neemasari Naula	29.44647	79.47864	1081
170	Nainital	Ghuna	Ghuna	Naula Word No V	29.44915	79.48040	1068
171	Nainital	Ghuna	Ghuna	Tusar Pani Naula	29.44382	79.47866	1132
172	Nainital	Ghuna	Ghuna	KoptaGadhera	29.44286	79.47796	1132
173	Nainital	Ghuna	Ghuna	MallaGadhera Source	29.44128	79.47755	1149
174	Nainital	Ghuna	Ghuna	TallaGadhera Naula	29.44251	79.47730	1123
175	Nainital	Ghuna	Ghuna	Water Source Ward No V	29.44196	79.48049	1220
176	Nainital	Ghuna	Ghuna	Karai Naula	29.44582	79.47920	1106
177	Nainital	Ghuna	Ghuna	Gajar source II	29.44448	79.47789	1105
178	Nainital	Ghuna	Ghuna	Gajar Naula	29.44463	79.47817	1106
179	Nainital	Halso	Halso	Talla Panera Source	29.53768	79.42676	1128
180	Nainital	Halso	Halso	DadoliGadhera	29.56376	79.40964	1359
181	Nainital	Halso	Halso	Pani Ka Naula	29.54389	79.42994	1352
182	Nainital	Halso	Halso	Saria Pani Source	29.54389	79.42949	1366

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
183	Nainital	Halso	Korad	Tana Panera Source	29.54359	79.41719	1100
184	Nainital	Jakh	Jakh	Birani Dhara	29.43106	79.46554	1262
185	Nainital	Jakh	Jakh	Dharapani Source	29.43105	79.46555	1262
186	Nainital	Jakh	Jakh	Deena Dhara	29.43106	79.46554	1262
187	Nainital	Khairali Bunga	Khairali	Khairali source	29.53433	79.40265	1101
188	Nainital	Majheda	Majheda	Majheda Dhara	29.49839	79.47220	1090
189	Nainital	Malla Kot	Malla Kot	Panorakote Source	29.49456	79.45137	1059
190	Nainital	Malla Kot	Malla Kot	Dadhiya Source	29.47685	79.44948	1313
191	Nainital	Malla Kot	Malla Kot	Bijar Source	29.48302	79.45259	1333
192	Nainital	Malla Kot	Malla Kot	Goludhar Source	29.45361	79.45165	1665
193	Nainital	Padhali	Padly	Padli I	29.43299	79.48417	1380
194	Nainital	Siltona	Siltona	Ghilauna II Source	29.47508	79.46355	1384
195	Nainital	Siltona	Siltona	Ghilauna I Source	29.47430	79.46414	1419
196	Nainital	Talla Kot	Talla Kot	Baisadhi	29.49578	79.44997	1016
197	Nainital	Talla Kot	Talla Kot	Dakbasti Panera	29.49659	79.45008	1008
198	Nainital	Banna	Banna	Chid KaGadhera I	29.30306	79.61299	1056
199	Nainital	Baret	Baret	Kimi Nauli	29.23016	79.63362	1214
200	Nainital	Baret	Baret	Katu Naula	29.23079	79.63465	1205
201	Nainital	Baret	Baret	Bajwani Spring	29.23220	79.64088	1285
202	Nainital	Baret	Baret	Dhara Spring	29.23254	79.63538	1184
203	Nainital	Baret	Baret	Kaflisari	29.23036	79.63764	1283
204	Nainital	Baret	Baret	Kanegad Spring I	29.23132	79.63319	1178
205	Nainital	Baret	Baret	Kanegad II	29.23100	79.63303	1187
206	Nainital	Baret	Baret	Sari Tok Spring	29.23017	79.63514	1235
207	Nainital	Baret	Baret	Ghar Tok Naula I	29.23175	79.63674	1233
208	Nainital	Baret	Baret	Jogithoi Spring	29.23626	79.63699	1087
209	Nainital	Baret	Baret	Salanidhar Spring	29.23470	79.63758	1121
210	Nainital	Baret	Baret	Khawegad Spring II	29.23360	79.63409	1135
211	Nainital	Baret	Baret	Khawegad Spring I	29.23251	79.63368	1151
212	Nainital	Baret	Baret	Haida Kanala Naula	29.23428	79.63816	1142
213	Nainital	Baret	Baret	Bhumka Dhara	29.23530	79.63486	1093
214	Nainital	Baret	Baret	Gulamadi Spring II	29.23559	79.63340	1097
215	Nainital	Baret	Baret	Gulamadi Spring I	29.23560	79.63335	1097
216	Nainital	Beluwa Khan	Beluwa Khan	Devaldhunga Spring	29.35645	79.47055	1396
217	Nainital	Beluwa Khan	Beluwa Khan	DiggiGadhera Nainagaon	29.35134	79.46352	1553
218	Nainital	Beluwa Khan	Beluwa Khan	NainagaonGadhera	29.35169	79.45898	1584
219	Nainital	Beluwa Khan	Beluwa Khan	Durgapur Spring	29.36538	79.47105	1458

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
220	Nainital	Bhorsa	Bhorsa	ParegarhGadhera	29.29136	79.61908	959
221	Nainital	Bhorsa	Bhorsa	Jamrani	29.28008	79.61520	806
222	Nainital	Chopra	Chopra	Chopra Naula	29.31909	79.49147	1300
223	Nainital	Chopra	Chopra	Dangad Naula	29.33053	79.48532	1254
224	Nainital	Chopra	Chopra	AdvandGadhera	29.32487	79.50817	862
225	Nainital	Chopra	Chopra	Riya spring	29.34075	79.47819	1295
226	Nainital	Chopra	Chopra	Bungaon Spring	29.33905	79.48107	1270
227	Nainital	Gaethiya	Gaethiya	Durgapur source	29.36511	79.46886	1509
228	Nainital	Gumal Gaon	Gumal Gaon	Baga Naula I	29.26005	79.59640	1046
229	Nainital	Gumal Gaon	Gumal Gaon	Talla Jawad Dhara	29.26693	79.60116	820
230	Nainital	Gumal Gaon	Gumal Gaon	Baga Naula III	29.26051	79.59624	1032
231	Nainital	Gumal Gaon	Gumal Gaon	Gajia Naula	29.26263	79.59567	960
232	Nainital	Gumal Gaon	Gumal Gaon	Hatya Pani	29.26219	79.59453	988
233	Nainital	Gumal Gaon	Gumal Gaon	Baga Naula II	29.26038	79.59628	1036
234	Nainital	Heriya Gaon	Hediyagaon	Goradhara Naula I	29.37211	79.55989	1481
235	Nainital	Heriya Gaon	Hediyagaon	Goradhara Naula II	29.37227	79.56002	1487
236	Nainital	Heriya Gaon	Hediyagaon	Hanuman Mandir Naula	29.37171	79.56077	1467
237	Nainital	Jyolikot	Jaeule	Kasani Spring	29.33649	79.50177	1019
238	Nainital	Jyolikot	Jaeule	KaneliGadhera	29.32289	79.50228	925
239	Nainital	Jyolikot	Sariyatal	Ranidhara Spring	29.34218	79.48952	1129
240	Nainital	Pasoli	Pasoli	Jalna	29.28025	79.58211	1025
241	Nainital	Pinraun	Pinraun	Songarh KaGadhera	29.28404	79.63352	1205
242	Nainital	Ranibag	Ranibag	Sisrana	29.28218	79.53799	706
243	Nainital	Rausil	Rausil	Nauda Naula	29.27800	79.58512	1038
244	Nainital	Udwa	Udwa	Bhorsiya Nala	29.25173	79.65906	798
245	Nainital	Babiyad	Babiyad	Badolpher	29.17440	79.41350	311
246	Nainital	Babiyad	Babiyad	Tanda	29.18040	79.41310	312
247	Nainital	Babiyad	Babiyad	Talli Sunptla Spring	29.18370	79.41240	316
248	Nainital	Babiyad	Babiyad	Sunpatla Chilapani	29.31158	79.68513	1676
249	Nainital	Babiyad	Babiyad	Nakana	29.17360	79.40440	302
250	Nainital	Babiyad	Kalagarhi	Malla Sunpatla	29.18260	79.41220	311
251	Nainital	Chaukhuta	Pokharad	Aratanda Spring	29.39853	79.63519	1688
252	Nainital	Chaukhuta	Pokharad	Naula	29.38597	79.49554	1901
253	Nainital	Chaukhuta	Pokharad	Dhari kaGadhera	29.39344	79.63394	1763
254	Nainital	Dudhali	Duduli	Kau kaGadhera	29.28717	79.66497	1009
255	Nainital	Guniya Lekh	Guniya Lekh	Bhugara	29.35036	79.63013	1433
256	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Rautora Naula	29.44509	79.71157	2187



S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
257	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Agira Naula	29.45237	79.72785	1931
258	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Kabhriya Spring	29.45375	79.72399	2033
259	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Kharu Spring	29.45128	79.71583	2081
260	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Kalukhan Naula	29.45374	79.71581	2107
261	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Simar Naula	29.45413	79.71659	2089
262	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Kapuwanauli Naula	29.44984	79.71438	2134
263	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Bhaisoda Naula	29.45542	79.72490	2102
264	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	MotiyapatharGadhera	29.45679	79.71977	2182
265	Nainital	Jalna Neel Pahari	Jalna Neel Pahari	Bhumka	29.46041	79.73325	2161
266	Nainital	Mahtoliya Gaon	Nadgal	JhabarGadhera	29.42172	79.71707	1869
267	Nainital	Panyali	Panyali	PanyaliGadhera	29.37644	79.60412	1712
268	Nainital	Parwada	Parwada	GijuwagadGadhera	29.42024	79.66883	2026
269	Nainital	Parwada	Parwada	Buda Banj	29.42294	79.65356	1976
270	Nainital	Parwada	Parwada	KathnaulaGadhera	29.41853	79.67205	2126
271	Nainital	Parwada	Parwada	Tiquanaula Spring	29.42152	79.65291	2001
272	Nainital	Parwada	Parwada	Tikhawa Naula	29.42157	79.65289	2002
273	Nainital	Sela Lekh	Silalekh	Kangari Naula	29.43367	79.71750	2072
274	Nainital	Sela Lekh	Silalekh	Lamejar Naula I	29.44346	79.71397	2099
275	Nainital	Sela Lekh	Silalekh	LamejarGadhera Spring	29.44275	79.71749	2008
276	Nainital	Sela Lekh	Silalekh	Lamejar Spring	29.44511	79.71510	2067
277	Nainital	Sela Lekh	Silalekh	Kurali Spring II	29.43630	79.71980	2014
278	Nainital	Sela Lekh	Silalekh	Kurali Spring I	29.44003	79.72338	1951
279	Nainital	Sela Lekh	Silalekh	Aanirigar Naula	29.43196	79.72102	1984
280	Nainital	Sela Lekh	Silalekh	Madeykhana Naula I	29.43295	79.71791	2068
281	Nainital	Sela Lekh	Silalekh	Madeykhana Naula II	29.43265	79.71800	2070
282	Nainital	Sela Lekh	Silalekh	Pokharkhet Naula	29.43519	79.71560	2123
283	Nainital	Sela Lekh	Silalekh	RaturaGadhera Naula	29.44519	79.71171	2187
284	Nainital	Amgadhi	Amgadhi	Banrava Patthar Srot	29.47880	79.24218	875
285	Nainital	Amgadhi	Amgadhi	Kagrad MallaGadhera	29.47524	79.25078	912
286	Nainital	Amgadhi	Amgadhi	Kagrad TallaGadhera	29.47533	79.25089	915
287	Nainital	Amtoli	Amtoli	Kaligarh	29.46964	79.28485	1204
288	Nainital	Amajhad	Amjhar	BasodGadhera	29.23237	79.89848	1178
289	Nainital	Amajhad	Amjhar	Bhalu Udiyar Spring	29.21675	79.92339	1573
290	Nainital	Amajhad	Amjhar	Padiyapani Spring	29.22137	79.92616	1570
291	Nainital	Amajhad	Amjhar	Pathharkhani Spring	29.23679	79.88160	1208
292	Nainital	Amajhad	Amjhar	Udisani Spring	29.23679	79.88160	1208
293	Nainital	Badoun	Badaun	Dal Spring	29.28209	79.71320	1543

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
294	Nainital	Bhanpokhara	Bhanpokhara	Sunaarpani	29.28695	79.81721	1747
295	Nainital	Bhanpokhara	Bhanpokhara	Silani	29.72401	79.81254	1440
296	Nainital	Dhena	Dhena	Bhadar Source	29.35731	79.85972	1464
297	Nainital	Galani	Galani	ChilkotaGadhera	29.26312	79.75410	1618
298	Nainital	Galani	Galani	Naval PaniGadhera	29.26054	79.75289	1747
299	Nainital	Galani	Galani	Sewani	29.29495	79.74818	1144
300	Nainital	Gargari Talli	Gargari Talli	Mavani Spring	29.28004	79.76774	1426
301	Nainital	Kaidagaon	Kaidagaon	Paninaula Spring	29.32598	79.85467	1209
302	Nainital	Kaidagaon	Kaidagaon	MurtipaniGadhera	29.32953	79.85279	1191
303	Nainital	Kaidagaon	Kaidagaon	BhagnaulaGadhera	29.35578	79.86665	1546
304	Nainital	Kaidagaon	Kaidagaon	Bhagnaula palaGadhera	29.35426	79.86555	1569
305	Nainital	Kanchal kot	Kachla Kot	Jamar ChudaGadhera	29.37902	79.81461	1323
306	Nainital	Kanchal kot	Kachla Kot	Kachlakot Dhara	29.36937	79.82848	1237
307	Nainital	Kanchal kot	Kachla Kot	Pinani Dhara	29.37353	79.82635	1304
308	Nainital	Katna	Katana	Aroli Simar Spring	29.41364	79.82673	1839
309	Nainital	Katna	Katana	KakadjaatGadhera	29.41106	79.82873	1731
310	Nainital	Katna	Katana	KogadiGadhera	29.41010	79.82851	1698
311	Nainital	Katna	Katana	Paypani	29.36527	79.36527	1045
312	Nainital	Katna	Kotla	DoveGadhera	29.96527	79.55123	1632
313	Nainital	Katna	Kotla	Malli MatiyalGadhera	29.43308	79.81092	1889
314	Nainital	Katna	Kotla	GadakhhetGadhera	29.43132	79.81848	2000
315	Nainital	Kaunta	Kaunta	BudhichhorGadhera	29.20984	79.67743	1124
316	Nainital	Kaunta	Kaunta	GanjaGadhera Source	29.20811	79.67583	1085
317	Nainital	Kaunta	Kaunta	Churani Spring	29.21431	79.67665	1190
318	Nainital	Kaunta	Kaunta	BajhpaniGadhera	29.21311	79.67582	1120
319	Nainital	Kaunta	Kaunta	KhaliGadhera	29.21543	79.66983	1132
320	Nainital	Kaunta	Kaunta	Malla KauntaGadhera	29.20320	79.67716	1240
321	Nainital	Kaunta	Kaunta	KakeraGadhera	29.20595	79.67758	1142
322	Nainital	Kaunta	Kaunta	Sivani Source	29.20942	79.67207	1011
323	Nainital	Kaunta	Kaunta	SimalkhetGadhera	29.21296	79.67027	1062
324	Nainital	Khansu	Khansu	FulbaghGadhera	29.29713	79.74577	1166
325	Nainital	Kukana	Kukana	Dhanuwagad	29.34530	79.83987	1129
326	Nainital	Kundal	Kundal	DhankholaGadhera	29.22706	79.83162	1071
327	Nainital	Kundal	Kundal	NutkaGadhera	29.23806	79.84146	879
328	Nainital	Paijana	Paijaina	Chapadsheel Naula	29.36039	79.86270	1668
329	Nainital	Paijana	Paijaina	Simidhaar Naula	29.36941	79.85900	1708
330	Nainital	Pashyan	Pashyan	ShalaGadhera	29.29888	79.77538	1172

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
331	Nainital	Pashyan	Pashyan	Bedukhet Silani Spring	29.29589	79.77519	1071
332	Nainital	Pashyan	Pashyan	Bedukhet Naula	29.29616	79.77499	1074
333	Nainital	Pashyan	Pashyan	Naula	29.29785	79.80350	1365
334	Nainital	Pashyan	Pashyan	JhaluwaGadhera	29.29658	79.78120	1125
335	Nainital	Pokhari	Pokhari	Aati Spring	29.33244	79.68727	1522
336	Nainital	Pokhari	Pokhari	Shiv Mandir Spring	29.32285	79.68704	1360
337	Nainital	Pokhari	Pokhari	DhantoliGadhera	29.32810	79.68317	1417
338	Nainital	Putpuri	Putpuri	KivaniGadhera	29.34216	79.77934	1619
339	Nainital	Putpuri	Putpuri	DhungigadGadhera	29.34146	79.78116	1661
340	Nainital	Putpuri	Putpuri	Dharegad Spring	29.34131	79.77162	1493
341	Nainital	Putpuri	Putpuri	Sailani Spring	29.33810	79.76117	1220
342	Nainital	Putpuri	Putpuri	TontigadGadhera	29.34813	79.76988	1527
343	Nainital	Putpuri	Putpuri	Khetala Selani Spring	29.34314	79.76437	1339
344	Nainital	Putpuri	Putpuri	PatalGadhera	29.34813	79.77466	1628
345	Nainital	Putpuri	Putpuri	DiggiGadhera	29.00755	79.40088	222
346	Nainital	Rekuna	Rekuna	PanigarhGadhera	29.36354	79.55118	1363
347	Nainital	Sal	Shal	AnarbanGadhera	29.26371	79.79881	1528
348	Nainital	Simal Kanya	Simkanya	TulaGadhera	29.39577	79.84555	1635
349	Nainital	Suni	Sooni	Jhalwari GairGadhera	29.41594	79.81614	1735
350	Nainital	Suni	Sooni	BedchulaGadhera	29.42641	79.81525	1924
351	Nainital	Suni	Sooni	Dholi Naula	29.40893	79.81991	1711
352	Nainital	Suni	Sooni	Nayal Talla	29.41375	79.81572	1689
353	Nainital	Suwakot Pokhari	Salakhwar	ThanaGadhera	29.22027	79.91668	1381
354	Nainital	Suwakot Pokhari	Suwakot Pokhari	Asar	29.20433	79.90899	1324
355	Nainital	Suwakot Pokhari	Suwakot Pokhari	Bhawan	29.20724	79.90799	1275
356	Nainital	Suwakot Pokhari	Suwakot Pokhari	Pokhari TalliGadhera	29.20721	79.90771	1263
357	Nainital	Thaladi	Thaladi	Gairadi Spring	29.22549	79.73227	1230
358	Nainital	Thaladi	Thaladi	Shivji Spring	29.38241	79.72398	1502
359	Nainital	Thaladi	Thaladi	Garampani Dhara	29.38198	79.71884	1559
360	Nainital	Chaphi	Chaphi	Belwalgaon I	29.37770	79.58223	1288
361	Nainital	Chaphi	Chaphi	Belwalgaon II	29.37762	79.58216	1288
362	Nainital	Chaphi	Chaphi	KalsikotGadhera	29.36818	79.57484	1307
363	Nainital	Chimi Matela	Chimi	Acharar Source	29.51203	79.55246	1511
364	Nainital	Chimi Matela	Chimi	Asurad	29.51203	79.55246	1511
365	Nainital	Chopra	Chopda	Talla Dhara	29.53871	79.58862	1279
366	Nainital	Chopra	Chopda	Chantarikhal Naula	29.53736	79.59523	1381
367	Nainital	Chopra	Chopda	Bhanguda Naula	29.53541	79.59645	1391

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
368	Nainital	Chopra	Chopda	Kankar Naula	29.54054	79.58944	1229
369	Nainital	Chopra	Mungro	Bakhali Ka Naula	29.53640	79.58931	1359
370	Nainital	Darima	Darima	Bachi Singh Ka Naula	29.45830	79.63152	1756
371	Nainital	Darima	Darima	Chorani Ka Naula II	29.45824	79.63142	1756
372	Nainital	Darima	Darima	Chorani Ka Naula I	29.45845	79.63144	1760
373	Nainital	Darima	Darima	Bakhli Ka Naula	29.46167	79.63244	1802
374	Nainital	Darima	Darima	Khet Ka Dhara	29.45756	79.63109	1749
375	Nainital	Darima	Darima	Kanala Naula	29.45747	79.63187	1753
376	Nainital	Darima	Darima	Raste Ka Naula	29.45854	79.62882	1750
377	Nainital	Darima	Darima	Shenhanga Naula I	29.46121	79.63067	1789
378	Nainital	Darima	Darima	Shenhanga Dhara	29.46132	79.63059	1786
379	Nainital	Darima	Darima	Shenhanga Naula II	29.46096	79.63013	1781
380	Nainital	Darima	Darima	Shenhanga Naula III	29.46095	79.63005	1780
381	Nainital	Darima	Darima	Belkiya Naula	29.45948	79.63065	1783
382	Nainital	Darima	Darima	Khet Ka Naula	29.45766	79.63050	1750
383	Nainital	Darima	Darima	Pani Nauli	29.44869	79.64176	2002
384	Nainital	Darima	Darima	Akhrani Spring	29.44927	79.64573	1989
385	Nainital	Darima	Darima	Gadhera Dhara II	29.45122	79.64107	1933
386	Nainital	Darima	Darima	Gadhera Dhara I	29.45112	79.64110	1936
387	Nainital	Darima	Darima	SavanyaGadhera	29.45611	79.63846	1811
388	Nainital	Darima	Darima	Gadhera Naula	29.45059	79.64132	1948
389	Nainital	Darima	Darima	Dubkher ka Naula	29.45218	79.64050	1914
390	Nainital	Gahana	Gahana	Sarna Naula	29.44261	79.66984	1887
391	Nainital	Gahana	Gahana	Gahana Talla Naula	29.44781	79.67377	1837
392	Nainital	Gahana	Gahana	Gajar ka Naula	29.43795	79.67033	1909
393	Nainital	Galla	Galla	Panera Dhara	29.43863	79.57371	1804
394	Nainital	Gangarkot	Gangori	Gangori Talla Naula	29.54708	79.54618	1098
395	Nainital	Gangarkot	Gangori	Gangori Malla Naula	29.54703	79.54598	1102
396	Nainital	Kafuda	Kafuda	Kumati Spring	29.52396	79.63170	1408
397	Nainital	Kamoli	Dhokane	Dhara Panera	29.52602	79.56679	1185
398	Nainital	Kamoli	Kamoli	Kunia Naula	29.53510	79.56277	1215
399	Nainital	Kamoli	Kamoli	Panuli Naula	29.53181	79.55879	1322
400	Nainital	Kamoli	Kamoli	Kamoli Panera	29.53220	79.56142	1320
401	Nainital	Killor	Killor	Nasari Naula	29.49414	79.59500	1435
402	Nainital	Kool	Birkhen	Malli Naula	29.51952	79.59569	1476
403	Nainital	Kool	Birkhen	Jhasyari Naula	29.51913	79.59539	1482
404	Nainital	Kool	Kool	Shaiger Naula	29.53194	79.59644	1470



S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
405	Nainital	Kool	Kool	Dena Naula	29.53559	79.59510	1420
406	Nainital	Kool	Kool	Naukuda Naula	29.52846	79.59566	1491
407	Nainital	Kool	Kool	Talli Naula	29.51999	79.59589	1477
408	Nainital	Kool	Kool	Sheena Naula	29.52696	79.59838	1417
409	Nainital	Kool	Kool	Devki Devi Naula	29.52846	79.59566	1491
410	Nainital	Lodh	Lodh	Bagerkhan	29.45267	79.60400	2000
411	Nainital	Lodh	Lodh	Pattigarh Spring	29.45382	79.60939	1839
412	Nainital	Loshayani	Loshayani	Kala Pahar Dhara	29.47518	79.55723	2207
413	Nainital	Loshayani	Loshayani	Nurssary Naula II	29.47110	79.56856	2048
414	Nainital	Loshayani	Loshayani	Nurssary Naula I	29.47108	79.56858	2050
415	Nainital	Lweshal	Lweshal	Devi Naula	29.50230	79.67136	1550
416	Nainital	Manarsa	Manarsa	Sakradi Dhari	29.54202	79.53522	1058
417	Nainital	Manarsa	Manarsa	Sana Dhara	29.54515	79.53857	1047
418	Nainital	Manarsa	Manarsa	Kulu Dhara	29.54561	79.53823	1033
419	Nainital	Nathuwakhan	Nathuwakhan	Banola Naula	29.46942	79.60834	1855
420	Nainital	Nathuwakhan	Nathuwakhan	Dhara Banola	29.46951	79.60868	1873
421	Nainital	Nathuwakhan	Nathuwakhan	Teela Naula	29.46932	79.60613	1804
422	Nainital	Nathuwakhan	Nathuwakhan	Gaon Naula	29.48033	79.59827	1679
423	Nainital	Nathuwakhan	Nathuwakhan	Seth ji Naula	29.46931	79.60543	1796
424	Nainital	Nathuwakhan	Nathuwakhan	Lamakhan Naula	29.47119	79.60328	1792
425	Nainital	Nathuwakhan	Nathuwakhan	Bagicha Naula	29.47015	79.60137	1797
426	Nainital	Nathuwakhan	Nathuwakhan	Talla Tanda Naula	29.46458	79.61191	1744
427	Nainital	Nathuwakhan	Nathuwakhan	Malla Tanda Naula	29.46558	79.61184	1766
428	Nainital	Nathuwakhan	Nathuwakhan	Naward Dhara	29.47147	79.59995	1826
429	Nainital	Pokhari	Pokhari	Kheemda ka Naula	29.45941	79.67829	1794
430	Nainital	Pura	Pura	Dhara Ka Naula I	29.51689	79.62509	1502
431	Nainital	Pura	Pura	Raja Ka Naula	29.51770	79.62464	1499
432	Nainital	Pura	Pura	Dhara Ka Naula II	29.51689	79.62509	1501
433	Nainital	Pura	Pura	Ghar Ka Naula	29.51767	79.62435	1509
434	Nainital	Sund	Nigrad	Nigrad Dhara	29.51451	79.60642	1558
435	Nainital	Sund	Nigrad	Dhare ka naula	29.51447	79.60648	1560
436	Nainital	Sund	Sura	soon ka Dhara	29.51589	79.60470	1473
437	Nainital	Sund	Sura	Khool Ka Naula	29.51285	79.60029	1506
438	Nainital	Bhalon	Bhalon	Khaluwe Gadh	29.47813	79.25716	1077
439	Nainital	Bhalon	Bhalon	Kakran	29.47578	79.25206	918
440	Nainital	Bhalon	Bhalon	Dandiya source	29.47618	79.25175	927
441	Nainital	Bhalon	Shimli	SimliGadhera	29.96288	79.26225	1854

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
442	Nainital	Chukam	Mohan	Panaali	29.55341	79.10929	536
443	Nainital	Chukam	Mohan	Limvadi	29.55448	79.11142	547
444	Nainital	Patkot	Patkot	Pirmuli	29.47313	79.27430	1185
445	Nainital	Patkot	Patkot	Bhawirgied	29.47040	79.28537	1226
446	Nainital	Patkot	Patkot	Bhida Pani	29.43523	79.25698	691
447	Nainital	Teda	Teda	Tilmath MandirGadhera	29.41364	79.13720	376
448	Nainital	Teda	Teda	Teda ChaufalaGadhera	29.42227	79.16024	436
449	Nainital	Teda	Teda	Diggi RolaGadhera	29.41433	79.13910	376
450	Almora	Doba	Doba	Shiv Mandir Naula	29.55540	79.59136	1262
451	Almora	Nau gaon	Nau gaon	Inara Gadhara	29.58198	79.50234	1151
452	Almora	Doba	Doba	Handpump Naula	29.55310	79.59452	1505
453	Almora	Beena	Beena	Jolasling	29.53858	79.38669	1639
454	Almora	Lohana	Lohana	Jogyadi	29.73728	79.70856	1451
455	Almora	Dotiyal gaon	Patyudi	Shak	29.73467	79.67475	1739
456	Almora	Mechaud	Mechaud	Shiv	29.72783	79.75986	1734
457	Almora	Gadholi	Gadholi	Gadholi	29.66161	79.69092	1388
458	Almora	Dotiyal gaon	Dotiyal gaon	Buadhandeo	29.65503	79.66497	1454
459	Almora	Dotiyal gaon	Dotiyal gaon	Kunyadi	29.71583	79.69858	1635
460	Almora	Dotiyal Gaon	Dotiyal Gaon	Peepal	29.72523	79.69774	1644
461	Almora	Panergaon	Panergaon	Simarpakha	29.74553	79.70586	1618
462	Almora	Lohana	Lohana	Rupeen Gadhera	29.73283	79.67103	1535
463	Almora	Beena	Beena	Saimegair Gadhera	29.73233	79.71178	1491
464	Almora	Katura	Dandeda	Pokharthal Dhara	29.66553	79.68764	1369
465	Almora	Katura	Matoi	Kaukanala Dhara	29.66614	79.68706	1584
466	Almora	Katura'	Dhanna	Dhanna	29.66800	79.67903	1566
467	Almora	Pilkha	Pilkha	Pilkha Dhara	29.66447	79.67389	1759
468	Almora	Dotiyalgaon	Dotiyalgaon	Beru Gadhara	29.72539	79.70341	1364
469	Almora	Gadholi	Gadholi	Kolura Gadhara	29.65577	79.66662	1503
470	Almora	Patiya	Patiya	Patiya Gadhara	29.68121	79.68529	1353
471	Almora	Pilkha	Pilkha	School	29.68572	79.66898	1285
472	Almora	Lwali	Lwali	Ghatgar Gadhera	29.48971	79.80990	2146
473	Almora	Naya	Sangroli	Khetigar Gadhera	29.49534	79.82107	1676
474	Almora	Silpad	Jwaranari()	Kalapatal	29.44247	79.76950	1500
475	Almora	Talla Bhatura	Malla Bhatura	Dhara Gadhera	29.47356	79.81573	1523
476	Almora	Talla Bhatura	Talla Bhatura()	Khetigad	29.47936	79.82351	1450
477	Almora	Talla Bhatura	(Atkadiya)	Bangi Gadhera	29.46825	79.81981	1233
478	Almora	Malla Binaula	Malla Binaula	Khetigad Gadhera	29.48949	79.81931	1761

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
479	Almora	Chaukuna	Chaukuna	Burigad(Naigad)	29.47921	79.86254	1731
480	Almora	Darimi	Darimi	Paijana Gadhera	29.45158	79.80874	1181
481	Almora	kaladungra	kaladungra	khankar Gadhera	29.46066	79.79137	1339
482	Almora	Kumalsu	Khadiya Nouli	Patna Dhara	29.50193	79.86079	1488
483	Almora	Kumalsu	Kumalsu	Sir Naula Dhara	29.49550	79.84986	1362
484	Almora	Sainoli	Sainoli	Bangi Gadhera	29.46901	79.82075	1535
485	Almora	Chaukuna	Baram	Nimani Gadhera	29.48934	79.85519	1425
486	Almora	Islana-Khari	Islana	GariKafal Naula	29.72944	79.68183	1632
487	Almora	Mechaud	Mechaud	Navada Dhara	29.72983	79.68239	1603
488	Almora	Lodh	Lodh	Simadi Seem	29.78911	79.52383	1612
489	Almora	Lodh	Lodh	Buntarani	29.78636	79.52549	1621
490	Almora	Lodh	Lodh	Naudhara	29.78480	79.52602	1575
491	Almora	Lodh	Lodh	Shankar Joshi	29.78322	79.52944	1642
492	Almora	Lodh	Lodh	Bheda Pandit	29.78242	79.52883	1664
493	Almora	Lodh	Lodh	Bheda SC	29.78233	79.52891	1683
494	Almora	Lodh	Lodh	Bheda tok	29.78556	79.53056	1657
495	Almora	Chanoli	Chanoli	Hema Ka Naula	29.78525	79.56291	1503
496	Almora	Chanoli	Chanoli	Simkholi	29.78730	79.56433	1538
497	Almora	Chanoli	Chanoli	Chanoli SC	29.78005	79.56130	1533
498	Almora	Chanoli	Chanoli	Shishu Mandir Naula	29.78631	79.56419	1495
499	Almora	Chanoli	Chanoli	Chanoli Pradhan	29.78047	79.56308	1535
500	Almora	Chanoli	Chanoli	Falta Chanoli	29.78155	79.56563	1500
501	Almora	Uttroda	Uttroda	Uttroda Pandit	29.78853	79.53422	1577
502	Almora	Uttroda	Uttroda	Uttroda SC	29.78847	79.53444	1577
503	Almora	Mauwe	Mauwe	Haldor Naula	29.79531	79.53322	1610
504	Almora	Mauwe	Mauwe	Ojha Naula	29.79600	79.53289	1626
505	Almora	Ramela Dungri	Ramela Dungri	Shivji Ka Dhara	29.78786	79.53997	1534
506	Almora	Ramela Dungri	Ramela Dungri	Shiv Mandi Naula	29.78461	79.54008	1531
507	Almora	Ramela Dungri	Ramela Dungri	Tulsi Devi Naula	29.78681	79.54247	1545
508	Almora	Ramela Dungri	Ramela Dungri	Talbakhai Naula	29.78733	79.54217	1541
509	Almora	Ramela Dungri	Ramela Dungri	Sheriban Naula	29.78725	79.54550	1521
510	Almora	Badgaun	Badgaun	Naukuda Naula	29.78553	79.54783	1520
511	Almora	Badgaun	Badgaun	Balota Naula	29.78669	79.54453	1569
512	Almora	Badgaun	Badgaun	Malbakhai Naula	29.78386	79.54906	1542
513	Almora	Badgaun	Badgaun	Shera Naula	29.78575	79.54978	1480
514	Almora	Chota Chin	Chota Chin	Chota Chin	29.77808	79.55386	1551
515	Almora	Pantgaun	Pantgaun	Nageshwar Naula	29.78094	79.55164	1519

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
516	Almora	Pantgaun	Pantgaun	Pant Naula	29.78142	79.55411	1520
517	Almora	Balai	Balai	Sukrad	29.78997	79.54422	1526
518	Almora	Balai	Balai	Baudh Ka Chanola	29.79717	79.53947	1573
519	Almora	Balai	Balai	Naukuda Naula	29.79294	79.54853	1578
520	Almora	Balai	Balai	Balai SC	29.79217	79.54878	1557
521	Almora	Balai	Balai	Balai Dhara	29.62631	79.55147	1570
522	Almora	Balai	Balai	Joshi Khola Naula	29.79317	79.55261	1531
523	Almora	Nag Kaurali	Nag Kaurali	Nagjoshi Naula	29.78964	79.55389	1532
524	Almora	Nag Kaurali	Nag Kaurali	Nag Dhara (twin)	29.78936	79.55692	1526
525	Almora	Nag Kaurali	Nag Kaurali	Malli Naula	29.75556	79.55733	1560
526	Almora	Nag Kaurali	Nag Kaurali	Shiv Dhara	29.78894	79.55956	1553
527	Almora	Nag Kaurali	Nag Kaurali	Talli Naula	29.78933	79.55958	1565
528	Almora	Nag Kaurali	Nag Kaurali	Tamta Naula	29.78717	79.55889	1483
529	Almora	Maloj	Maloj	Bhairon Mandir Naula	29.78387	79.55672	1487
530	Almora	Maloj	Maloj	Shiv Mandir Dhara	29.78102	79.55167	1546
531	Almora	Naikana	Naikana	Shera Naikana	29.78233	79.55836	1493
532	Almora	Naikana	Naikana	Hatoudu Naula	29.78033	79.55897	1531
533	Almora	Naikana	Naikana	Kanya Naula	29.77961	79.55697	1589
534	Almora	Naikana	Naikana	Sita Ka Naula	29.77942	79.55589	1565
535	Almora	Naikana	Naikana	Naugad Naula	29.77800	79.55906	1590
536	Almora	Naikana	Naikana	Malbakhai Naula	29.77961	79.55908	1553
537	Almora	Naikana	Naikana	Malli Naikana Pradhan	29.78000	79.55944	1536
538	Bageshwar	Agar	Devldhar	Devaldhar Dhara	29.78097	79.74856	1545
539	Bageshwar	Baja Nadila	Baja Nadila	Nadila Dhara	29.78653	79.77131	1403
540	Bageshwar	Bhanartoli	Bhanartoli	Klotadhara	29.78753	79.77750	1498
541	Bageshwar	Bhanartoli	Bhanartoli - II	Namdar Naula	29.77281	79.77725	1381
542	Bageshwar	Bhatkhola	Bhatkola -I	Kaligar Dhara	29.76681	79.77425	1507
543	Bageshwar	Bhatkhola	Bhatkhola - II	Kaligar Naula	29.76994	79.77456	1430
544	Bageshwar	Bhatkhola	Bhatkhola - III	Almor Naula	29.76753	79.77811	1458
545	Bageshwar	Khakhar	Khakhar	Khankar Naula	29.77758	79.77275	1445
546	Bageshwar	Kabhra	Kabhra	Malla Naula	29.75829	79.79644	1391
547	Bageshwar	Nayal	Ariyagar	Damua Dhunga Noul	29.75822	79.78111	1339
548	Bageshwar	Bholanagar	Bholanagar	Kotigar Dhara	29.75129	79.77085	1331
549	Bageshwar	Behar Gaon	Behar Gaon	Behargoun Dhara	29.78274	79.80248	1148
550	Bageshwar	Nayal	Sutargaon	Sutargoun Dhara	29.76833	79.80136	1256
551	Bageshwar	Nayal	Nayal	Thanda Pani Dhara	29.75875	79.78117	1385
552	Bageshwar	Bholanagar	Bholana -II	Bholana Dhara	29.75025	79.77200	1365



S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
553	Bageshwar	Pagana	Pagana	Malla tej Dhara	29.77972	79.81233	1047
554	Bageshwar	Bhatgair	Bhatgair	Gadhera Dhara	29.77767	79.80653	1089
555	Bageshwar	Behargaon	Behargaon	Bakarmuna	29.78908	79.80125	1020
556	Bageshwar	Patli	Rainkholi Pouri	Talla	29.79136	79.77844	1325
557	Bageshwar	Siya	Siya	Khata	29.73550	79.79644	1304
558	Bageshwar	Rakholi	Rakholi	Dhargara	29.74578	79.80542	1575
559	Bageshwar	Bohala	Bohala	Seem	29.75011	79.80931	1357
560	Bageshwar	Rakhil	Naghar	Naula	29.78019	79.77744	1837
561	Bageshwar	Rakholi	Bouri	Napatal	29.74453	79.80750	1566
562	Bageshwar	Chuna	Chuna	Loorigaon	29.76967	79.73367	1432
563	Bageshwar	Kisroli	Kisroli	Talla	29.72944	79.84283	1275
564	Bageshwar	Panna	Panna	Dhara	29.73667	79.83908	1162
565	Bageshwar	Gathgarh	Gathgarh	Palla	29.76539	79.80842	1066
566	Bageshwar	Bohala	Bohala	Dol	29.75664	79.80358	1244
567	Bageshwar	Siya	Siya	Katha	29.73478	79.79986	1295
568	Bageshwar	Gathgarh	Gathgarh	Talla	29.76083	79.80928	1290
569	Bageshwar	Nandigaon	Nandigaon	Jhulapani	29.74619	79.80831	1479
570	Bageshwar	Chhauna	Chhauna	Banigar	29.77325	79.73811	1370
571	Bageshwar	Billori	Billori	Billori	29.76552	79.73836	1380
572	Bageshwar	Siya	Siya	Sainbagdia	29.73056	79.80539	1174
573	Bageshwar	Garikhet	Binsar	Pirna	29.77384	79.76040	1575
574	Bageshwar	Garikhet	Garikhet	Simar	29.77136	79.76566	1538
575	Bageshwar	Garikhet	Awligad	Kaligad	29.76884	79.76662	1548
576	Bageshwar	Behergaon	Behergaon	Behergaon Dhara	29.78264	79.80250	1150
577	Bageshwar	Bholna	Bholna	Bholna Gadhera	29.74870	79.79570	1761
578	Bageshwar	Billori	Billori	Billori spring	29.76364	79.74327	1430
579	Bageshwar	Chourshoo	Chourshoo	Chourshoo spring	29.94110	79.64400	1283
580	Bageshwar	Jouna	Jouna	Jouna Gadher	29.96450	79.56130	1414
581	Bageshwar	Nari	Nari	Nari Gadhera	29.87900	79.90850	1211
582	Bageshwar	Borgaon	Borgaon	Borgaon Naula	29.79456	79.75881	1310
583	Bageshwar	Borgaon	Borgaon	Gopiyagaad Dhara	29.79275	79.76153	1343
584	Bageshwar	Paatli	Paatli	Paatli Dhara	29.79333	79.76414	1319
585	Bageshwar	Baja Nadila	Nadila	Nadila Dhara Gair	29.79258	79.76636	1313
586	Bageshwar	Patli	Rakholi	Dhara Mausami	29.79350	79.77933	1217
587	Bageshwar	Patli	Rakholi	Dhara Sadabahaar	29.79350	79.77931	1262
588	Bageshwar	Khakhar	Khakar	Dhaar Naan Dhara	29.77358	79.77372	1391
589	Bageshwar	Bhatkhola	Bhatkhola	Naula (Walnut Tree)	29.76989	79.77450	1431

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
590	Bageshwar	Nayalmafi	Nayal	Naayalmafi Dhara II	29.75814	79.77983	1400
591	Bageshwar	Bhergaon	Bhergaon	Khola Naula	29.78900	79.80117	969
592	Bageshwar	Bourai	Bourai	Badkua Naula	29.74242	79.80497	1694
593	Bageshwar	Watcham	Kharkiyani	Bangabhara	30.08506	79.92633	2540
594	Bageshwar	Watcham	Kharkiyani	Bangpani	30.08508	79.91964	2483
595	Bageshwar	Watcham	Umla	Umla Gadhera	30.09578	79.92372	2272
596	Bageshwar	Watcham	Dhur	Basiya Khareek	30.07731	79.91167	2595
597	Bageshwar	Watcham	Dhur	Khalu	30.07967	79.90875	2538
598	Bageshwar	Watcham	Majua	Mujua	30.10706	79.91636	2200
599	Bageshwar	Watcham	Bhatang	Patal Pikhuni	30.11717	79.91681	2473
600	Bageshwar	Watcham	Panwarkhet	Tall Patal Pikhuni	30.11758	79.91894	2402
601	Bageshwar	Watcham	Jatuli	Sirpadi Nala	30.14886	79.92353	2540
602	Bageshwar	Watcham	Ritang	Jagae	30.12133	79.92489	2134
603	Bageshwar	Watcham	Paputi	Dharpani	30.10886	79.91561	2356
604	Bageshwar	Watcham	Malla Gaun	Gadbidhar	30.10944	79.90483	2619
605	Chamoli	Devaldhar	Karaki	Gada Dhara	30.43707	79.30579	1595
606	Chamoli	Devaldhar	Karaki	Karaki Dhara	30.43684	79.30600	1541
607	Chamoli	Devaldhar	Malagaon	Phakuna Dhara	30.43608	79.29913	1632
608	Chamoli	Devaldhar	Malagaon	Dathi Dhara	30.43621	79.29777	1640
609	Chamoli	Devaldhar	Malagaon	Lagdi Dhara	30.43796	79.29337	1571
610	Chamoli	Devaldhar	Romadi	Tapar Dhara	30.43223	79.30034	1593
611	Chamoli	Devaldhar	Romadi	Talla Dhara	30.43211	79.29928	1573
612	Chamoli	Devaldhar	PoulDhar	Poul Dhara	30.43351	79.30403	1594
613	Chamoli	Devaldhar	PoulDhar	Siya Dhjara	30.42850	79.30508	1548
614	Chamoli	Baragaina	Baragaina	Road Dhara	30.44342	79.28563	1432
615	Chamoli	Baragaina	Kunkuni	Kunkuni Spring	30.45412	79.29001	1845
616	Chamoli	Siroli	Siroli	Kularkudi Dhara	30.46725	79.28146	1595
617	Chamoli	Siroli	Siroli	Bhagial Dhara	30.46577	79.28009	1596
618	Chamoli	Khalla	Khalla	Khalla Magara	30.47550	79.27465	1536
619	Chamoli	Khalla	Khalla	Simar Magara	30.44975	79.27251	1588
620	Chamoli	Bandwara	Bandwara	Bandwara Magara	30.43658	79.28480	1428
621	Dehradun	Masrad	Lalau	Lalau Khad	30.58205	77.92452	1660
622	Dehradun	Joshi Gothan	Hamrau	Mulawana Khad	30.57852	77.90277	1546
623	Dehradun	Joshi Gothan	Joshi Gothan	Nuwada Khad	30.57933	77.89868	1498
624	Dehradun	Khatar	Bukhtar	Jawae Gadhera	30.57685	77.88677	1191
625	Dehradun	Badnu	Badnu	Bai Ka Khad	30.59090	77.89325	1382
626	Dehradun	Badnu	Datnu	Datnu Khad	30.59157	77.89345	1317

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
627	Dehradun	Badnu	Maletha	Rudi Khad	30.59755	77.88650	1361
628	Dehradun	Samalta	Barar	Barar Khad	30.60378	77.88748	1364
629	Dehradun	Basaya	Basaya	Basaya Khad	30.58910	77.92282	1591
630	Dehradun	Masrad	Masrad	Churai Khad	30.59503	77.92422	1702
631	Dehradun	Basaya	Gadetha	Masrad Khad	30.59137	77.91983	1567
632	Dehradun	Panuwa	Panuwa	Pokhri Danda	30.59937	77.89748	1706
633	Dehradun	Panuwa	Panuwa	Pokhri Talab	30.60018	77.89748	1681
634	Dehradun	Panuwa	Panuwa	Nag Dhara	30.59882	77.89640	1693
635	Dehradun	Panuwa	Panuwa	Kua	30.59708	77.89505	1589
636	Dehradun	Jhuso Bhakhrao	Damta	Gad Dhara	30.60340	77.90435	1631
637	Dehradun	Jhuso Bhakhrao	Jhuso Bhakhrao	Bai Khad	30.61707	77.91053	1550
638	Dehradun	Bamrar	Bamrar	Bamrar Khad	30.61942	77.91138	1538
639	Dehradun	Uproli	Uproli	Nigae Khad	30.63663	77.90488	1834
640	Dehradun	Utpalta	Utpalta	Surka Paus	30.63478	77.90392	1814
641	Dehradun	Kurauli	Kurauli	Kurauli Naula	30.61633	77.88932	1535
642	Dehradun	Nevi	Nevi	Narani Naula	30.61647	77.88348	1454
643	Dehradun	Makhti	Makhti	Makhti Khad	30.62730	77.92070	1796
644	Dehradun	Fatehu	Fatehu	Fathehu Kua	30.62603	77.90905	1615
645	Dehradun	Samalta	Dadoli	Dadoli Spring	30.61952	77.90452	1362
646	Dehradun	Chutou	Chutou	Karsawa	29.98278	79.58944	1905
647	Dehradun	Birmou	Birmou	Bimou Dhara	30.64589	77.89828	1659
648	Dehradun	Rani	Binou	Binou dhara	30.63917	77.88694	1433
649	Dehradun	Rani	Bantou	Suriyana Source	30.64270	77.88580	1402
650	Dehradun	Nagou	Kyawa	Devata dhara	30.63927	77.91288	1696
651	Dehradun	Nagou	Nagou	Sayani khadd	30.63723	77.91928	1550
652	Dehradun	Nagou	Nagou	Parsai Dhara	30.65242	77.92503	1658
653	Dehradun	Danda	Danda	Naawkhad Danda	30.57982	77.80071	1500
654	Dehradun	Danda	Danda	Naawkhad Danda	30.57969	77.80138	1493
655	Dehradun	Siradi	Siradi	Kolpaani	30.57282	77.80228	1277
656	Dehradun	Danda	Danda	Paani Ka Thaat	30.58295	77.81371	1621
657	Dehradun	Mashak	Mashak	Dudura	30.76636	77.81644	2430
658	Dehradun	Mashak	Mashak	Aasmad	30.77180	77.81432	2344
659	Dehradun	Mashak	Mashak	Laabhlighe	30.78227	77.80978	2252
660	Dehradun	South Vinhar	South Vinhar	Kundiyo Nala	30.46467	77.88997	740
661	Pauri	Juyalgaun	Juyalgaun	Musadhud	29.92803	78.55900	1558
662	Pauri	Juyalgaun	Juyalgaun	Dhannapani	29.92600	78.55886	1482
663	Pauri	Dikhet	Dikhet	Nauli Dhara	29.91903	78.55647	1481

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
664	Pauri	Dikhet	Dikhet	Hisoli Dhara	29.91447	78.55550	1483
665	Pauri	Diobari	Diobari	Diobari Dhara	29.91722	78.56294	1297
666	Pauri	Diobari	Diobari	Talla Dhara	29.91578	78.56267	1237
667	Pauri	Judh	Judh	Mudi Pani	29.91911	78.56417	1303
668	Pauri	Judh	Judh	Malla Dhara	29.91933	78.56417	1310
669	Pauri	Judh	Judh	Dhandi Dhara	29.92067	78.56356	1320
670	Pauri	Judh	Judh	Dhandi Naula	29.92072	78.56336	1321
671	Pauri	Dhonri	Dhonri	Pal Pani	29.90081	78.55731	1372
672	Pauri	Dhonri	Dhonri	Andruwani	29.90150	78.56178	1308
673	Pauri	Dhonri	Dhonri	Magra Dhara	29.90164	78.56172	1302
674	Pauri	Pabekh	Pabekh	Dalae Dhara	29.91411	78.56086	1284
675	Pauri	Simalya	Simalya	Tilau Dhara	29.92486	78.58911	1296
676	Pauri	Simalya	Simalya	Konkadi Dhara	29.92597	78.58850	1320
677	Pauri	Mathra	Mathra	Peer Ka Pani	29.90172	78.57886	1217
678	Pauri	Mathara	Mathara	Nau Pani	29.90122	78.57886	1230
679	Pauri	Mathara	Mathara	Rau Dhara	29.90097	78.57956	1247
680	Pauri	Saurkhet	Saurkhet	Kandi Dhara	29.90975	78.58519	1185
681	Pauri	Dobar	Dobar	Kawae Ka Pani	29.91917	78.57592	1330
682	Pauri	Dhutfud	Dhutfud	Aam Naula	29.90983	78.57689	1241
683	Pauri	Dhutfud	Dhutfud	School Dhara	29.90961	78.57694	1241
684	Pauri	Hilogi	Hilogi	Dhara	29.90808	78.57597	1135
685	Pauri	Bijoli	Bijoli	Mudi Pani	29.90989	78.57789	1272
686	Pauri	Silogi	Silogi	Silogi Dhara	29.96592	78.55947	1695
687	Pauri	Karthi	Karthi	Karthi Dhara	29.98769	78.56533	1480
688	Pauri	Karthi	Karthi	Karthi Par	29.98803	78.55983	1495
689	Pauri	Jali	Jali	Jalli Khora	29.98450	78.54650	1372
690	Pauri	Jalli	Jalli	Jalli Kua	29.98667	78.55053	1427
691	Pauri	Ghansali	Ghansali	Ghansali Dhara	29.97867	78.54372	1353
692	Pauri	Gadkot	Gadkot	Gadkot Dhara	29.97022	78.53778	1164
693	Pauri	Gadkot	Gadkot	Mwari Dhara	29.97372	78.53464	1237
694	Pauri	Dabda	Dabda	Dabda Dhara	29.97711	78.55386	1371
695	Pauri	Parsuli	Parsuli	Parsuli Gadhera	29.97997	78.58978	1519
696	Pauri	Parsuli	Parsuli	Parsuli Dhara	29.98047	78.58819	1545
697	Pauri	Parsuli	Parsuli	Parsuli Dhara	29.98069	78.58836	1545
698	Pauri	Parsuli	Parsuli	School Dhara	29.97317	78.56292	1600
699	Pauri	Thapla	Thapla	Thapla Dhara	29.96961	78.55447	1433
700	Pauri	Kothar	Kothar	Kothar Palli Dhara	29.96453	78.56186	1200



S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
701	Pauri	Kothar	Kothar	Kothar Dhara	29.96489	78.56269	1200
702	Pauri	Mall	Mall	Mall Dhara	29.96586	78.56075	1525
703	Pauri	Must	Must	Must Gadhera	29.96461	78.58897	1457
704	Pauri	Must	Must	Must Gadhera	29.96428	78.58864	1430
705	Pauri	Pali	Pali	Pali Dhara	29.95878	78.58883	1353
706	Pauri	Bamoli	Bamoli	Dangdyar	29.94931	78.56956	1433
707	Pauri	Bamoli	Bamoli	Dangdyar Talla	29.94944	78.57025	1376
708	Pauri	Dashmeri	Dashmeri	Kasti Gadera Malla	29.95169	78.58419	1530
709	Pauri	Dashmeri	Dashmeri	Nauli Gadera	29.95250	78.58156	1448
710	Pauri	Dashmeri	Dashmeri	Bichola Pani	29.95253	78.58094	1423
711	Pauri	Dashmeri	Dashmeri	Jethuna Tok	29.95247	78.58069	1412
712	Pauri	Kyar	Kyar	Gangpali	29.95397	78.59353	1540
713	Pauri	Kyar	Kyar	Podino	29.96158	78.59492	1588
714	Pauri	Bhimlee malli	Bhimlee malli	Tok Jamrkholi	30.10046	78.93477	1598
715	Pauri	Dungri	Dungri	Naula	30.06883	78.93222	1381
716	Pauri	Gahed Paidelsu	Gahed Paidelsu	Godu Paani	30.10124	78.79311	1693
717	Pauri	Gahed Paidelsu	Gahed Paidelsu	Sim tok	30.10064	78.73156	1715
718	Pauri	Kaphol	Kaphol	Kilani	30.12389	78.79578	1653
719	Pauri	Payal	Payal	Padhera Tok	30.11706	78.73050	1077
720	Pauri	Sirala	Sirala	Padhera Tok	30.11706	78.76760	1077
721	Pauri	Saud	Saud	Pani Chabutara	30.11913	78.61893	1485
722	Pithoragarh	Kulurgarh	Kulurgarh	Kulurgarh Gadhera	29.71731	79.98331	1506
723	Pithoragarh	Chaoli	Sonkihaat	Sonkihaat Naula	29.65833	80.10419	1339
724	Pithoragarh	Chaoli	Chaoli	Chaoli	29.65955	80.10527	1350
725	Pithoragarh	Khulet	Khulet	Khulet	29.65558	80.11625	1267
726	Pithoragarh	pokhari	sinyadi	Sinyadi	29.65435	80.10257	1259
727	Pithoragarh	Chaoli	Lavecural Joshi	Brisim	29.66348	80.11003	1449
728	Pithoragarh	Chaoli	Mallagarkha	Mallagarkha	29.66581	80.10556	1506
729	Pithoragarh	Bayalkatiya	Bayalkatiya	Gotadi Naula	29.65384	80.12188	1227
730	Pithoragarh	Virgoli	Virgoli	Malla Panyar	29.66355	80.12123	1373
731	Pithoragarh	Bayalkatiya	Garali	Garali Dhara	29.65729	80.13458	987
732	Pithoragarh	Bayalkatiya	Nargwadi	Nargwadi Dhara	29.66343	80.14007	876
733	Pithoragarh	Bayalkatiya	Bahilkot	Bahilkot Dhara	29.65989	80.13631	937
734	Pithoragarh	Jamadkot	Kamadkot	Chaukodi Naula	29.64987	80.07442	1088
735	Pithoragarh	Jamadkot	Tunad	Bhumka Spring	29.65679	80.05629	1287
736	Pithoragarh	Jadkathera	Beluri	Dhami Spring	29.65594	80.06199	1219
737	Pithoragarh	Jamadkot	Hardiya	Hardiya Spirng	29.65589	80.06738	1151

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
738	Pithoragarh	Jamadkot	Guligaon	Kasna Naula	29.65808	80.06911	1299
739	Pithoragarh	Pali	Salikhet	Salikhet Dhara	29.65700	80.07924	1194
740	Pithoragarh	Jajoot	Piplet	Piplet Dhara	29.67435	80.05571	1440
741	Pithoragarh	Uprada	Gothani	Gothani Dhara	29.66931	80.04197	1562
742	Pithoragarh	Chaoli	Bayal	Kimani Khola	29.65650	80.11246	1255
743	Pithoragarh	Khulet	Sakar & Suval	Kanigad	29.65299	80.10888	1135
744	Pithoragarh	Chaoli	Songaon	Songaon	29.65837	80.11343	1328
745	Pithoragarh	Devrala	Devrala	Baichuliya	29.65222	79.98327	948
746	Pithoragarh	Devrala	Rangal	Rangal	29.64983	79.98959	966
747	Pithoragarh	Bhandarigaon	Khetigaon	Talla Naula	29.63258	80.07825	1473
748	Pithoragarh	Kothera	Kothera	Kotera Naula	29.64153	80.06175	1493
749	Pithoragarh	Balakuchera	Balakuchera	Balakucha Gadhera	29.64409	80.04877	1732
750	Pithoragarh	Rithaya	Rithaya	Banapani	29.69111	79.97734	1322
751	Pithoragarh	Nakuna	Nakuna	Malla Dhara	29.68744	79.97625	1366
752	Pithoragarh	Nakot	Nakot	Kuwanger	29.68419	79.96881	1407
753	Pithoragarh	Jamadlekh	Jamadlekh	Jamadlekh Dhara	29.70278	79.97800	1295
754	Pithoragarh	Pilkhi	Pilkhi	kanaghar Naula	29.70016	79.94856	1378
755	Pithoragarh	Jwal	Jwal	Jwal Dhara	29.68575	80.00326	1374
756	Pithoragarh	Khetigaon	Khetigaon	Khetigaon	29.68840	79.99872	1340
757	Pithoragarh	Itna	Itna	Itna Naula	29.67774	80.00297	1378
758	Pithoragarh	Dobhalkhet	Dobhalkhet	Bhumiya Dhara	29.68199	80.01550	1227
759	Pithoragarh	Tundachora	Tundachora	Tunda Naula	29.61244	80.00125	1456
760	Pithoragarh	Oligaon	Oligaon	Nanidhara	29.61244	80.07025	1562
761	Pithoragarh	Bhuligaon	Bhuligaon	Nagugad Naula	29.61664	80.07225	1384
762	Pithoragarh	Futsil	Futsil	Betal	29.90167	80.16111	1672
763	Pithoragarh	Jaguda	Jaguda	Jaguda Naula	29.73806	80.10833	1696
764	Pithoragarh	Agron	Agron	Dumdhara	29.81944	80.13667	1361
765	Pithoragarh	Pali	Pali	Chuwa Naula	29.80000	80.14111	1264
766	Pithoragarh	Pali	Pali	Bistoda Dhara	29.79000	80.12944	1305
767	Pithoragarh	Pokhari	Pokhari	Nakuda	29.76500	80.28444	1314
768	Pithoragarh	Chitgal	Chitgal	Chana Naula	29.73167	80.19694	1628
769	Pithoragarh	Jajoot	Jajoot	Jabrani dhara	29.83194	80.12167	1472
770	Pithoragarh	Jajoot	Jajoot	Devi Naula	29.80111	80.08639	1506
771	Pithoragarh	Uprada	Uprada	Uprada Naula	29.75389	80.29056	1570
772	Pithoragarh	Uprada	Malla basai	Basai Naula	29.90806	80.07361	1706
773	Pithoragarh	Uprada	Talli Basai	Talli Basai Naula	29.92917	80.03500	1632
774	Pithoragarh	Bhandarigaon	Bhandarigaon	Bhamdari gaon panyar	29.61622	80.07333	1450

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
775	Pithoragarh	Tundachora	Kandara	Mallakhola Naula	29.68131	79.99827	1432
776	Pithoragarh	Agar	Dungai Kanyuri	Dungai Panyar	29.67946	79.99578	1474
777	Pithoragarh	Agar	Agar	Agar Panyar	29.67838	79.99541	1516
778	Pithoragarh	Agar	Baruda	Badichena	29.68057	79.99477	1429
779	Pithoragarh	Agar	Sanyuda	Talla Naula	29.69428	80.01099	1580
780	Pithoragarh	Sanyuda	Sailani	Gadera Naula	29.69159	79.97133	1482
781	Pithoragarh	Nakot	Nainoli	Nanoli Naula	29.69484	79.96087	1498
782	Pithoragarh	Nainoli	Gwansilkot	Panyar	29.70358	79.94320	1328
783	Pithoragarh	Gwansilkot	Dhrarikund	Dhrarekund	29.63526	79.99655	1020
784	Pithoragarh	Dhrarikund	Balatadi	Agyun Dhara	29.67592	80.02694	1541
785	Pithoragarh	Balatandi	Siroli	Gada Dhara	29.67500	80.02086	1384
786	Pithoragarh	Balatandi	Sutargaon	Churmali Naula	29.66728	80.01972	1340
787	Pithoragarh	Balatandi	Rankad	Rankad Dhara	29.66794	80.01522	1170
788	Pithoragarh	Balatandi	Kasedi	Kasedi	29.67444	80.01864	1350
789	Pithoragarh	Balatandi	Gopil	Dharapani	29.65246	80.02004	1661
790	Pithoragarh	HaneraLagaroll	Bagar	Bagar	29.65197	80.01847	1650
791	Pithoragarh	HaneraLagaroll	Sintoliya	Gunagad	29.64019	80.05146	1613
792	Pithoragarh	Rankot	Simalkhet	Gunagad	80.05146	80.05142	1612
793	Pithoragarh	Simalkhet	Rankot	Dubegad	29.64431	80.05028	1593
794	Pithoragarh	Rankot	Susan	Nemanyagad	29.64453	80.05986	1478
795	Pithoragarh	Rankot	Kwinad	Kwinad Panyar	29.63683	80.09056	937
796	Pithoragarh	Jarmalgaon	Kanaragunth	Panyar	29.62659	80.09974	950
797	Pithoragarh	Jarmalgaon	Pabhein	Khawa Naula	29.60258	80.06594	1872
798	Pithoragarh	Batkatoli	Koti	Koti Dhara	29.60561	80.07622	1438
799	Pithoragarh	Bokta	Bokta	Gada Dhara	29.60669	80.08081	1216
800	Pithoragarh	Matoli	Matoli	Matoli	29.69957	79.98469	1499
801	Pithoragarh	Jarmalgaon	Jarmalgaon	Malla Naula	29.62597	80.08381	1474
802	Pithoragarh	Kanda	Upnamaafi	Upnamaafi Panyar	29.59381	80.08139	1237
803	Pithoragarh	Madaknali	Madaknali	Madaknali Naula	29.64581	80.03728	1836
804	Pithoragarh	Jakhni upreti	Jakhni	Bhumka Naula	29.62403	80.05475	1907
805	Pithoragarh	Bhama	Bhama	Kathotala Naula	29.61386	80.05889	1964
806	Pithoragarh	Bhama	Dantoli	Nyalmuda Naula	29.61764	80.05444	2046
807	Pithoragarh	Sanyuda	Lavisar	Lavisar	29.69353	80.02053	1446
808	Pithoragarh	Brusambadi	Brusambadi	Malla Panyar	29.61417	80.09342	777
809	Pithoragarh	Bokta	Tadaga	Tadaga	29.59333	80.08475	996
810	Pithoragarh	Damde	Damde	Damde Panyar	29.59181	80.09128	946
811	Pithoragarh	Damde	Tudi	Tudi Naula	29.58742	80.09731	768

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
812	Pithoragarh	Duni	Duni	Duni Naula	29.57378	80.06061	1253
813	Pithoragarh	Duni	Khet	Duni	29.57842	80.06878	1115
814	Pithoragarh	Naini	Naini	Talla Panyar	29.71033	79.93758	1035
815	Pithoragarh	Sunkhola	Sunkhola	Jahajarwa Naula	29.59867	80.02311	1353
816	Pithoragarh	Chahaj	Khailadi	Sarkande Naula	29.59919	80.03472	1288
817	Pithoragarh	Chahaj	Kaltir	Kaltir Naula	29.59569	80.04500	1209
818	Pithoragarh	Khatigaon	Khatigaon	Khatigaon	29.59992	29.59992	1279
819	Pithoragarh	Chahaj	Sarkande	Kafal pani	29.59081	80.06005	1627
820	Pithoragarh	Chahaj	Kalipatal	Bhaniya panyar	29.58842	80.05906	1603
821	Pithoragarh	Pipalinigalti	Pipalinigalti	Gad Naula	29.58071	80.04006	1371
822	Pithoragarh	Dyulhadakot	Dyulhadakot	Malla Naula	29.57729	80.04426	1463
823	Pithoragarh	Chahaj	Chahaj	Chanali Naula	29.58310	80.05537	1532
824	Pithoragarh	Rauteda	Rauteda	Kamadiya Naula	29.55803	80.05033	1226
825	Pithoragarh	Rauteda	Tulkhand	Kimgad Naula	29.55914	80.05269	1323
826	Pithoragarh	Pipalinigalti	Naani	Malla Naula	29.56528	80.03942	1104
827	Pithoragarh	Jeeba	Jeeba	Ghanela Naula	29.67649	80.08633	1861
828	Pithoragarh	Palipalyal	Palipalyal	Palyal Naula	29.59531	80.01144	1240
829	Pithoragarh	Surkhal pathak	Sugadi	Panera Naula	29.60933	80.04131	1441
830	Pithoragarh	Timtachamdungra	Virtola	Churgaon Dhara	29.52303	80.08086	533
831	Pithoragarh	Timtachamdungra	Jadtola	Jadtola Naula	29.53736	80.09811	777
832	Pithoragarh	Timtachamdungra	Timta	Kunda Naula	29.53881	80.09000	982
833	Pithoragarh	Timtachamdungra	Timtachamdungra	Timta Naula	29.53950	80.08669	1020
834	Pithoragarh	Bhama	Jarajakhni	Timul Dhara	29.62056	80.05958	1843
835	Pithoragarh	Nanolikaina	Nanolikaina	Toiyan Dhara	29.62436	80.00067	891
836	Pithoragarh	Nanolikaina	Nanolikaina	Naani Naula	29.62403	80.00800	1096
837	Pithoragarh	Kuntola	Kuntola	Sargada Dhara	29.63873	79.98789	1006
838	Pithoragarh	Kuntola	Sargada	Sargada Dhara	29.63873	79.98764	1001
839	Pithoragarh	Surkhal Pathak	Dodari	Malli Naula	29.61603	80.05053	1876
840	Pithoragarh	Surkhal Pathak	Surkhal	Dhar Naula	29.61508	80.04811	1715
841	Pithoragarh	Banelagaon	Banelagaon	Ridigad	29.61822	80.04007	1864
842	Pithoragarh	Banelagaon	Chamlekh	Chamlekh Naula	29.62100	80.02797	1574
843	Pithoragarh	Uprada	Dhuroli	Dhuroli Dhara	29.67736	80.04572	1573
844	Pithoragarh	Badena	Kund	Kund Naula	29.58544	80.02564	1046
845	Pithoragarh	Badena	Badena	Malli Naula	29.57103	80.03053	1110
846	Pithoragarh	Askoda	Mankhola	Kharkoli Naula	29.54231	80.07541	913
847	Pithoragarh	Askoda	Askoda	Kingad Naula	29.55331	80.06417	1133
848	Pithoragarh	Sukna	Bandani	Koti Gad	29.73577	80.02213	1913



S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
849	Pithoragarh	Sukna	Pyantoli	Salyad Gad	29.73667	80.02017	1872
850	Pithoragarh	Sukna	Dharmoli	Dunga dhara	29.73961	80.01728	1781
851	Pithoragarh	Sukna	Sukna	Mungron Gad	29.73961	80.01558	1781
852	Pithoragarh	Sukna	Dhunkholi	Bisa Paani	29.73908	80.01994	1805
853	Pithoragarh	Sukna	Ghangal	Ghangal Naula	29.73919	80.01921	1810
854	Pithoragarh	Chauna	Kanara	Bhikudi Gadhera	29.71708	80.00847	1795
855	Pithoragarh	Chak	Chak	Lyunkhuri	29.73067	80.02064	1937
856	Pithoragarh	Thyantoli	Bhakani paani	Bhakani Paani	29.71920	80.01680	1959
857	Pithoragarh	Chauna	Dyotari	Bahkani	29.71920	80.01680	1962
858	Pithoragarh	Nayal	Kakda	Talla Panyar	29.72547	79.91758	1181
859	Pithoragarh	Nayal	Nayal	Malli Panyar	29.72489	79.90964	1151
860	Pithoragarh	Fadiyali	Fadiyali	Dharaghar	29.72594	79.91019	1124
861	Pithoragarh	Lakhtoli	Lakhtoli	Giwa Naula	29.73969	79.90397	1192
862	Pithoragarh	Fadiyali	Bhatgada	Bhatgada Dhara	29.73036	79.91861	1016
863	Pithoragarh	Agron	Agron	Gorkhali Dhara	29.66642	80.08658	1524
864	Pithoragarh	Chauda	Chauda	Malla Chauda Naula	29.74453	79.98283	1292
865	Pithoragarh	Chauda	Golthi	Bhida pani	29.74586	79.98739	1255
866	Pithoragarh	Pabhya	Pabhya	Basani Dhara	29.71508	79.91731	1120
867	Pithoragarh	Chauda	Siradi	Siradi Dhara	29.74156	80.00578	1777
868	Pithoragarh	Bungli	Bungli	Nha Naula	29.58678	80.00967	1263
869	Pithoragarh	Raitola	Nagdhura	Nagdhura Naula	29.62086	79.98989	868
870	Pithoragarh	Ganura	Anargaon	Anargaon Naula	29.62628	80.01994	1315
871	Pithoragarh	Paltodi	Jatadi	Jatadi Naula	29.75617	79.86289	1358
872	Pithoragarh	Paltodi	Paltodi	Paltodi Dhara	29.75718	79.86406	1347
873	Pithoragarh	Bankot	Bankot	Maukhala Naula	29.75742	79.87819	1403
874	Pithoragarh	Bankot	Sunyadi	Sunyadi Dhara	29.76158	79.88033	1394
875	Pithoragarh	Bans Patan	Simsimani	Simsimani Dhara	29.76097	79.99967	1200
876	Pithoragarh	Bans Patan	Bans	Timlani Naula	29.75472	79.99386	1131
877	Pithoragarh	Bans Patan	Bhyun	Bhyun Naula	29.76078	79.98572	1096
878	Pithoragarh	Sarmoli	Sarmoli	Sarmoli Dhara	30.07892	80.23417	2216
879	Pithoragarh	Nanasem	Nanasem	Dhedi Talla	30.07658	80.23828	2085
880	Pithoragarh	Nanasem	Nanasem	Nanasem Dhara	30.07581	80.23917	2071
881	Pithoragarh	Nanasem	Nanasem	Tamba Dhara	30.07761	80.23964	2042
882	Pithoragarh	Nanasem	Nanasem	Dhedi Dhara	30.07675	80.23742	2108
883	Pithoragarh	Shantikunj	Shantikunj	Shantikunj Dhara	30.07694	80.24011	2031
884	Pithoragarh	Shankhdhura	Shankhdhura	Talla Dhara	30.08389	80.23997	2050
885	Pithoragarh	Suring	Suring	Pani Dhara	30.09475	80.24303	1995

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
886	Pithoragarh	Suring	Suring	Dyothan Dhara	30.09622	80.24244	1962
887	Pithoragarh	Jatath	Jatath	Nau Ki Dhara	30.09644	80.24394	1917
888	Pithoragarh	Jatath	Jatath	Chalidhara	30.09619	80.24461	1917
889	Pithoragarh	Darkot	Darkot	Jaldevi Ka Dhara	30.09886	80.24811	1780
890	Pithoragarh	Ranti	Ranti	Ranti Ka Dhara	30.08978	80.24517	1804
891	Pithoragarh	Ranti	Ranti	Sau Dhara	30.09147	80.24694	1782
892	Pithoragarh	Daranti	Daranti	War Dhara	30.09247	80.25067	1651
893	Pithoragarh	Daranti	Daranti	Par Dhara	30.09294	80.25083	1643
894	Pithoragarh	Charkham	Charkham	Charkham Dhara	30.09375	80.24842	1737
895	Pithoragarh	Namjala	Namjala	Nau Dhara	30.08656	80.24647	1760
896	Pithoragarh	Jainti Talla	Jainti Talla	Jaldevi Dhara	30.08308	80.24797	1767
897	Pithoragarh	Jainti	Jainti	Minal Dhara	30.08153	80.24314	1865
898	Pithoragarh	Devibagarh	Devibagarh	Garam Pani	30.05008	80.30122	1191
899	Pithoragarh	Danda Beesa	Danda Beesa	Gunj Dhara	30.08661	80.26167	1457
900	Pithoragarh	Senvila	Senvila	Senvila Dhara	30.08281	80.26556	1498
901	Pithoragarh	Shera Surai Dhar	Shera Surai Dhar	Naula	30.08806	80.26011	1472
902	Pithoragarh	Bachchepur	Bachchepur	Bachchepur Dhara	30.09136	80.26269	1340
903	Pithoragarh	Mappalpara	Mappalpara	Malla Dhara	30.09311	80.25386	1587
904	Pithoragarh	Mappalpara	Mappalpara	Talla Dhara	30.09319	80.25419	1580
905	Pithoragarh	Khasyabara	Khasyabara	Brahambara Dhara	30.09167	80.25533	1556
906	Pithoragarh	Khasyabara	Khasyabara	Brahambara Mandir	30.09103	80.25483	1557
907	Pithoragarh	Beesa	Beesa	Dinyani Dhara	30.09292	80.25847	1478
908	Pithoragarh	Beesa	Beesa	Bhoniya Dhara	30.09050	80.25564	1521
909	Pithoragarh	Talla Dummar	Talla Dummar	Mandir Dhara	30.10656	80.25050	1501
910	Pithoragarh	Talla Dummar	Talla Dummar	Palla Dhara	30.10572	80.25111	1518
911	Pithoragarh	Talla Dummar	Talla Dummar	Timoor Dhara	30.10511	80.25128	1520
912	Pithoragarh	Talla Dummar	Talla Dummar	Shiv Dhara	30.10331	80.25122	1522
913	Pithoragarh	Malla Dummar	Malla Dummar	Mahila Dhara	30.10367	80.26589	1588
914	Pithoragarh	Malla Dummar	Malla Dummar	Talla Mahila	30.10394	80.26481	1583
915	Pithoragarh	Malla Dummar	Malla Dummar	Harijan Dhara	30.10403	80.26578	1591
916	Pithoragarh	Malla Dummar	Malla Dummar	Bhaledhar	30.10522	80.26461	1608
917	Pithoragarh	Paikhuti	Paikhuti	Paikhuti Malla Dhara	30.08000	80.26356	1565
918	Pithoragarh	Paikhuti	Paikhuti	Paikhuti Talla Dhara	30.07997	80.26367	1560
919	Pithoragarh	Paikhuti	Paikhuti	Pani Dhara	30.07683	80.26875	1556
920	Pithoragarh	Papdi	Papdi	Papdi Dhara	30.07153	80.26394	1779
921	Pithoragarh	Baniya Gaun	Baniya Gaun	Dhara	30.07544	80.25056	1891
922	Pithoragarh	Talla Ghorpatta	Talla Ghorpatta	Kholi Dhara	30.07142	80.24867	1932

S.No.	District	Gram Panchayat	Village	Spring Name	Latitude	Longitude	Altitude (m)
923	Pithoragarh	Talla Ghorpatta	Talla Ghorpatta	Pani Dhara	30.07433	80.24497	1963
924	Pithoragarh	Malla Ghorpatta	Malla Ghorpatta	Nitwal Dhara	30.06858	80.24492	2013
925	Pithoragarh	Malla Ghorpatta	Malla Ghorpatta	Martoliya Dhara	30.06989	80.24586	1979
926	Pithoragarh	Bunga	Bunga	Bunga Dhara	30.07258	80.24031	2057
927	Pithoragarh	Cheti Chimala Dhar	Cheti Chimala Dhar	Cheti Naula	30.08500	80.25786	1586
928	Pithoragarh	Kawwa Dhar	Kawwa Dhar	Shera Dhara	30.08178	80.25858	1613
929	Pithoragarh	Kawwa Dhar	Kawwa Dhar	Kawwa Dhar Talla	30.08172	80.25781	1619
930	Pithoragarh	Kawwa Dhar	Kawwa Dhar	Kawwa Dhar Malla	30.08161	80.25783	1624
931	Pithoragarh	Dhamikuda	Dhamikuda	Nag Dhara	30.08139	80.25697	1651
932	Pithoragarh	Dhamikuda	Dhamikuda	Pani Dhara	30.07764	80.25589	1705
933	Pithoragarh	Shela	Shela	Shela Dhara	30.07956	80.25303	1756
934	Pithoragarh	Shela	Shela	Jal Devi Dhara	30.07775	80.25331	1760
935	Pithoragarh	Shela	Shela	Jal Devi Malla Dhara	30.07739	80.25306	1780
936	Tehri-Garhwal	Almas	Almas	Bansi	30.47890	78.18603	1547
937	Tehri-Garhwal	Rautu	Rautu	Ganjra	30.45699	78.18720	2090
938	Tehri-Garhwal	Kinsu	Kinsu	Kinsu	30.53407	78.19330	2022
939	Tehri-Garhwal	Thikk	Thikk udarsu	Thik udarsu	30.53637	78.18576	1999
940	Tehri-Garhwal	Kudiyalgaon	Kudiyalgaon	Jangru	30.35912	78.34888	1440
941	Tehri-Garhwal	Kudiyalgaon	Kemari Gaon	Selwani	30.35398	78.35304	1351
942	Tehri-Garhwal	Nakot	Arogi & Nakote	Selwani	30.36249	78.36991	1487
943	Tehri-Garhwal	Saud	Saud	Ludru ka pani	30.41609	78.32685	2268
944	Tehri-Garhwal	Mathamali	Mathamali	Mathamali Dhara	30.50000	78.16000	1250
945	Tehri-Garhwal	Kitth	Kitth	Kith	30.30205	78.35687	1320
946	Tehri-Garhwal	Dangla	Dangla	Dangla Spring	30.46855	78.22840	1371
947	Tehri-Garhwal	Bhaim	Bhaim	Chida Khala	30.46908	78.22214	1519
948	Tehri-Garhwal	Syalsi	Syalsi	Bil syalsi Pani	30.47922	78.21681	1419







## Central Himalayan Rural Action Group

### CONTRIBUTING PARTNERS

