Involuntary Resettlement and Indigenous People Due Diligence Report

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NEP: Urban Water Supply and Sanitation (Sector) Project – Deurali Hupsekot Water Supply and Sanitation Project, Nawalpur

Prepared by Ministry of Water Supply, Government of Nepal as per the requirement of the Asian Development Bank.

CURRENCY EQUIVALENTS

(as of 05 May 2020)

Currency unit	–	Nepalese rupee (NRs)
NRs1.00	=	$0.0085
$1.00	=	NRs117.15

ABBREVIATIONS

ADB	–	Asian Development Bank
DDR	–	Due Diligence Report
DWSSM	–	Department of Water Supply and Sewerage Management
DAM	–	District Metered Area
GESI	–	Gender Equality and Social Inclusion
MOWS	–	Ministry of Water Supply
OBA	–	Output Based Aid
PMO	–	Project Management Office
PMQAC	–	Project Management and Quality Assurance Consultant
RDSMC	–	Regional Design, Supervision and Management Consultant
RPMO	–	Regional Project Management Office
RCC	–	Reinforced Cement Concrete
RVT	–	Reservoir Tank
SPS	–	Safeguard Policy Statement
TOR	–	terms of reference
UWSSP	–	Urban Water Supply and Sanitation (Sector) Project
WUSC	–	Water Users and Sanitation Committee

WEIGHTS AND MEASURES

cum	–	cubic meter
km	–	kilometer
lps	–	liter per second
mm	–	millimeter
mg/l	–	milligram per liter
m^2	–	square meter

NOTE

In this report, "$" refers to United States dollars.

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I. INTRODUCTION

A. Project Background

1. The Urban Water Supply and Sanitation (Sector) Project (UWSSP) will support the Government of Nepal expand access to community managed water supply and sanitation (WSS) in 20 project municipalities by drawing on experiences and lessons from three earlier projects funded by the Asian Development Bank (ADB).[1] The project will fund climate-resilient and inclusive WSS infrastructure in project municipalities and strengthen institutional and community capacity, sustainable service delivery, and project development. Subprojects will be demand driven by Water Users Associations (WUAs) and project municipalities and selected based on transparent criteria[2] including population growth, poverty index, existing WSS infrastructure, community willingness for cost sharing, and long-term operation and maintenance (O&M) contract.[3]

2. The project will build upon the on-going efforts of the Government of Nepal in providing water supply and sanitation (WSS) services in urban areas of Nepal. It will help the country to meet Sustainable Development Goal (SDG)-6 to ensure availability and sustainable management of water and sanitation for all by 2030 and it is aligned with sector objectives laid out by the government's Fourteenth Plan, National Urban Development Strategy, and updated 15-year Development Plan for WSS in urban Towns, which is to improve water supply and sanitation service delivery in urban areas across Nepal.

3. The project will have the following impact: quality of life for urban population, including the poor and marginalized, through provision of improved sustainable WSS services.[4] The project will have the following outcome: Inclusive and sustainable access to water supply and sanitation services in project municipalities improved. The project will have two outputs: (i) water supply and sanitation infrastructure in project municipalities improved; and (ii) institutional and community capacities strengthened.

4. The Ministry of Water Supply (MOWS) is responsible for planning, implementation, regulation, and monitoring of WSS. The Department of Water Supply and Sewerage Management (DWSSM) under the MOWS supports the provision of WSS facilities in municipalities where large utilities do not exist, and these are operated by WUSCs[5] or municipalities.[6] Shortage of investment funds, skilled personnel, and inadequate operation and maintenance (O&M) budgets, hinders municipalities from providing adequate, cost-effective services. The Local Governance Operation Act, 2017, established municipalities as autonomous government institution with responsibility for WSS services. While municipalities' capacity is being built, the government and residents have been receptive to the decentralized, participatory, and cost-sharing service provision model by Water Users Associations (WUAs). Development support for municipal WSS has been channeled

[1] ADB Nepal: Small Towns Water Supply and Sanitation Sector Project (2000); Nepal: Second Small Towns Water Supply and Sanitation Sector Project (2009); and Nepal: Third Small Towns Water Supply and Sanitation Sector Project (2014).

[2] Subproject selection criteria are detailed in the PAM. Selection of future investments to be designed under the project will follow same criteria, with preference for investments located in Kathmandu Valley, provincial headquarters, and strategic border municipalities.

[3] Procurement can only commence after DWSS and municipality sign management agreement with WUSC for 20 years O&M service. The municipality will own the system and the WUSC will be the operator.

[4] Government of Nepal. 2009. *Urban Water Supply and Sanitation Policy*. Kathmandu

[5] The WUSCs, formed under the Nepal Water Resource Act, 1992, are the elected executive bodies of the Water Users Association.

[6] The DWSSM assists in preparation of investment plans, project design, and establishing sustainable service delivery.

through a combination of (i) government grants through DWSS, (ii) loans by the Town Development Fund (TDF),[7] and (iii) contributions from municipalities and beneficiaries.[8] The TDF also supports WUAs in institutional and financial management including the introduction of tariffs.

5. The project will be implemented over a five-year period (indicative implementation period is 2018 to 2023) and will be supported through ADB financing using a sector lending approach. The MOWS is the executing agency and DWSSM the implementing agency. The project management office (PMO) established under ongoing Third Small Towns Water Supply and Sanitation Sector Project (footnote 1) will be responsible for the overall management, implementation and monitoring of the project. There will be regional PMOs (RPMOs) to manage day-to-day project implementation at the subproject/municipality level. After construction including a one-year O&M period by the contractor, subprojects will be operated by the WUSC or municipality.

6. In terms of financing, 70 percent of the cost will be contributed by GON. In regard to cash contribution to be made by WUSC, the initial cash contribution of WUSC should be minimum 5 percent of the civil works contract in the form of upfront cash contribution. The remaining 25 percent to be borrowed from the TDF as a loan at an interest rate not exceeding 5 percent per annum with a maturity of 25 years including a grace period of five years. The project ensures full participation of Water Users and Sanitation Committee in the formulation, implementation and operation and maintenance of water supply and sanitation.

7. The proposed UWSSP is not anticipated to involve any significant resettlement impacts and is classified as category B. The Resettlement Framework provides guidance for the assessment of involuntary resettlement impacts and for the preparation of resettlement plans/land acquisition and involuntary resettlement due diligence reports for components that are identified or subprojects that are assessed or any changes in design after Board approval. Any proposed future subproject involving significant impacts will not be allowed.

B. Scope of the Report

8. This draft due diligence report (DDR) on Land Acquisition, Involuntary Resettlement and Indigenous People's is prepared for the proposed Deurali Hupsekot Urban Water Supply Project. A due diligence process was conducted to examine land acquisition and resettlement issues in detail, in line with ADB Safeguard Policy Statement (SPS) 2009. This report describes the findings and provides copies of available land-related documents, no objection letter, recommendation letter from concern authority and photographs. This DDR was prepared based on the Resettlement Framework for UWSSP. It presents evidence and justification of the assessment of no involuntary resettlement impacts for the concerned subproject.

9. Upon project implementation, the Social Safeguards Officer at PMO will be responsible for undertaking a review of this due diligence, prepare a confirmation letter or report documenting any modifications for the subproject and submit to ADB; and receive a 'no objection' confirmation from ADB prior to start of construction in the subproject.

10. The Urban Water Supply and Sanitation (Sector) Project (UWSSP) is designed with the principle of community management, making it demand-responsive, and adopting a participatory

[7] The TDF is a government-owned entity established under the Town Development Fund Act, 1997. Loans from the government to WUAs or municipalities are generally on-lent by TDF under a subproject financing agreement.

[8] WUAs contribute 30% of project costs for water supply subprojects (25% from TDF loan and 5% from users' upfront cash contribution) and 15% for sanitation subprojects (subsidy from municipalities).

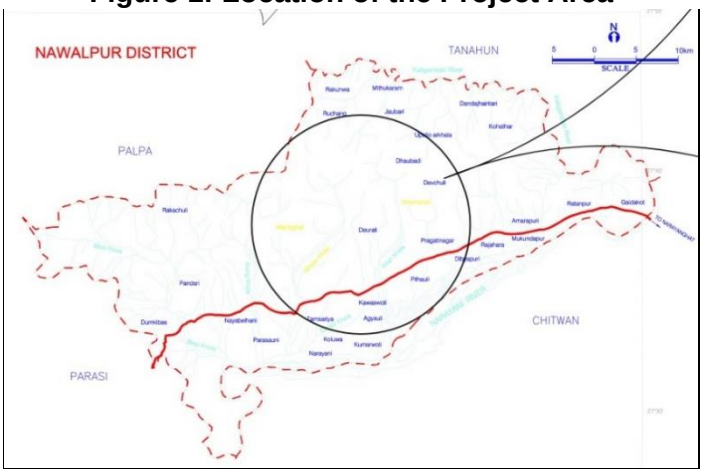
approach. The participatory approach aims for greater community participation in planning, implementation along with their operation and maintenance activities. Demand responsiveness is demonstrated by willingness to pay for improved service delivery and ultimately aims at 30% cost recovery. Community management is essential for making community empowerment so that the community can take full responsibility on financial, technical and managerial aspects of operation and maintenance activities.

II. SUBPROJECT DESCRIPTION

A. Location and Accessibility

11. The proposed Deurali Hupsekot UWSSP lies in Hupsekot Rural Municipality of Nawalpur District in Province 4 of Nepal. The project area lies its geographical coordinates about 27º74'N Latitude and 83º98'E Longitude. The town is located about 8 km away from Danda bazaar (near Kawasoti) east-west highway. The distance from Kathmandu to Kawasoti is 178 km. The project area can be accessed through black topped, gravel and earthen roads. The location of the project area is shown in Figure 1.

Figure 1: Location of the Project Area

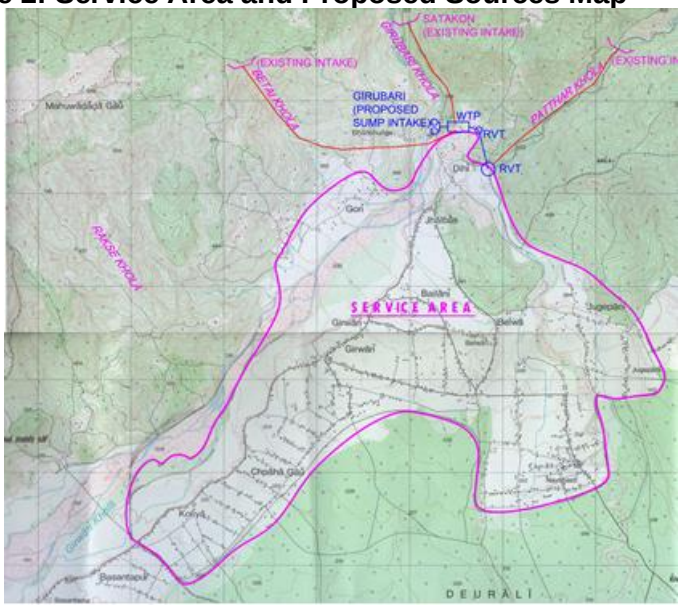


B. Socio Economic Profile of Project Area

1. Service Area, Households and Population

12. The project area has been delineated in consultation with WUSC, the local community, Chairman of Hupsekot Rural Municipality. The service area covers all areas of ward 1 (Beluwa and Jukepani settlement) and 3 (Girubari and Belhani settlement), about 80% of the area of ward 2 (Koliya and Guheri settlement) and about 60% of ward 4 (Jhyalbas and Tallo Dihi settlement). The service area comprises merging former wards of Hupsekot VDC, Deurali VDC and Dhaubadi VDC. The service area and proposed sources are shown in Figure 2.

Figure 2: Service Area and Proposed Sources Map



13. As per the social survey conducted in 2018, total households in the project area are 3,652 with an average family size of 5.3. Total population is 21,601 (permanent 19,347 and rental 2,254). The population growth rate of the project area is determined based on census data of 2001 and 2011. The population growth of Nawalparasi district is 1.35% between 2001 and 2011.The growth rate of the service area range from 1.2% to 1.93%. Based on these figures, the average growth rate of the service area is taken as 2.0%. The forecasted populations of the town are 22,786 and 32,168 in 2021 and 2040 respectively with a growth rate of 2.00 % in permanent population. The rental population has been kept flat throughout the project period and is included in the above figures. The core bazaar area which is in ward 4 called as Jhyalbas is dense and thickly populated. Similarly, the settlement pattern of the other wards is scattered type due to semi-urban and rural in character. The settlement pattern is gradually changing, and rural clusters are developing as a market. The rate of migration into the service area from the surrounding villages and from other districts is increasing during the last few years. The population and growth rate of Nawalparasi District and Hupsekot Rural Municipality are shown in Table 1 and Table 2.

Table 1: Population and Growth Rate of Nawalparasi District

SN	District	2011		2001		Growth Rate
		Population	Households	Population	Households	
1	Nawalparasi	643508	128793	562870	98340	1.35

Table 2: Population and Growth Rate of Hupsekot Rural Municipality

SN	New ward	Combined VDC/ municipality (new)	2011		2001		Growth Rate
			Population	Households	Population	Households	
1	1	Deurali (5)	2099	493	1734	323	1.93
2		Dhaubadi (2)	1944	374	1661	304	1.59
3	2	Deurali (1, 2, 9)	4392	828	3805	646	1.45
4	3	Deurali (3, 4)	4721	937	3903	675	1.92
5	4	Deurali (6, 7)	3092	542	2798	385	1
6		Dhaubadi (7)	2514	447	2177	323	1.45
TOTAL			**25065**	**4588**	**22378**	**3513**	**1.14**

2. Population by Ethnic Composition:

14. The project service area comprises multi caste/ethnic groups. Each caste and ethnicity is characterized by its own customs, traditions, culture, and nature of occupation with which they are associated. The survey revealed that Janajati/ethnic (Tamang, Kumal, Magar, Newar etc.) are a major group comprising of 64.3% (2346) households in the service area. Similarly, Brahmin/Chhetri is the second largest group comprising of 19% (695) of the total household whereas, Dalit and other communities (Muslim, Madhesi) comprising 16.3% (595) and 0.4% (16) respectively. Detailed information are presented in Table 3.

Table 3: Distribution of households and population by ethnic composition

Caste/Ethnic composition	Ward					%
	1	2	3	4	Grand Total	
Brahmin/Chhetri	124	91	439	41	695	19.0
Janajati	902	206	932	306	2346	64.2
Dalit	185	131	259	20	595	16.3
Others (Muslim, Madhesi)	4	4	7	1	16	0.4
Grand Total	1215	432	1637	368	3652	100.0

Source: Socio-economic Survey 2018.

3. Existing Drinking Water Situation

3.1. Source to House Connections

15. Initially, two water supply systems were there, namely Deurali and Soti Khola. After joining together, the WUSC was named as Deurali Soti Khola WUSC and later on, became Deurali Hupsekot Water Supply and Sanitation Project. There are several sources used in the service area. The system was implemented on 2040 B.S. and completed on 2047 B.S. with 21 numbers of public tap stands. The system was handed over to WUSC on 2055 B.S. The WUSC had received NRs 25,000.00 during endowment of the project from GON. The system has been expanded several times depending on the budget available at each time from GON / or other various agencies. The system is a gravity water supply system from intake/ source to WTP/ RVT and distribution system.

16. Because of the fund availability, there are several pipes laid parallel from each source to the reservoirs. The water treatment plants (sedimentation, 11.25m x 4.25m x 2.16m), roughening (12.60m x 7.0m x 1.32m) and slow sand filter (11.80m x 10.52 X 2.8m)) are constructed recently at two locations (one for Soti Khola system at Shivalaya and another for Deurali system, Dihidanda) which can be used in the new system with some repair works has to be carried out. One chamber of slow sand filter of Soti Khola system has leakage needs to be repaired. The valves have to be replaced and filter material to be washed and placed again. But the sizes are inadequate for the new system. The size for the new system has to be determined and deficit size has been included in the new system.

17. The private tap distribution has been started on 2060 B.S. At present, there are 2,337 private taps in the service area. Galvanized Iron pipes and household water meters are used in the house service connection. The system supplies water for 24hours from reservoir but each house will get water only 1-2 hour in a day. The upstream household closes the tap and downstream house will fetch water though the system supplies 24 hours in a day through service reservoir. This is mainly due to less discharge from sources, less capacity of storage reservoir

and small sizes of pipes are used in the distribution system without any design consideration.

18. The WUSC has 10 regular staff to regulate the system. They are satisfied with provident fund, medical facilities, overtime payment, Dashain allowance, gratuity, payment against balance leave etc. The WUSC has implemented progress water tariff. Minimum water tariff for the consumption of first 10 cum is NRs 150, then after 10-20 cum consumption apply NRs 17 per cum, 20-30 cum consumption apply NRs 20 per cum and more than 30 cum consumption apply NRs 28 per cum. They have implemented computerised billing system for 5-6 years. Currently, WUSC has about NRs. 423 lakhs in their bank account. That amount is deposited in Muktinath Bank, NCC Bank, Prabhu Bank and Rastriya Banijya Bank. Currently, WUSC shall collect monthly about NRs 5-6 lakhs from water tariff bill.

4. Currently used source not used in new system

(i) **Rohini Khola/ Rohini Ghari Water Supply System:** It is located in ward no 4. The length of the pipe is about 2.5 km from intake to WTP/ RVT. 90 mm pipe has been used. It is reported that the water has lime content and source will dry up during summer. Hence, this source is not used for the new system.

(ii) **Soti Khola Water Supply System:** It is located in ward no 4. The length of pipe is about 3.0 km from intake to WTP/ RVT. 75 mm and 32 mm pipes have been used. The source is said to dry up during summer. Hence, this source is not used for the new system.

(iii) **Ramkot Kholsi Water Supply System:** It is located in ward no. 4. The length of pipe is about 3.0 km from intake to WTP/ RVT. Two parallel pipes of 75 mm diameter have been laid. The water has lime content and the source is reported to dry up during summer. Hence, this source is not used for the new system.

(iv) **Badahare Kholsi Water Supply System:** It is located in ward no 4. The length of pipe is about 1.50 km from intake to WTP/ RVT. 40 mm diameter pipe have been laid. The water has lime content and the source is said to dry up during summer. Hence, this source is not used for the new system.

(v) **Chepari Gaira Kholsi Water Supply System:** It is located in ward no 4. The length of pipe is about 1.50 km from intake to WTP/ RVT. 40 mm diameter pipe have been laid. The source is said to dry up during summer. Hence, this source is not used for the new system.

5. Existing sources used in the new system:

(i) Girubari Khola Water Supply System
(ii) Pathar Khola Water Supply System
(iii) Betai Khola Water Supply System

6. Water Use Right and Downstream Users

19. During the social survey, detail information of existing water supply facilities of the project area has been collected. The survey revealed that the largest numbers of households about 81.4% (3277) and 12.4% (500) among 3652 total households are fetching water from private tap and public tap by existing water supply system respectively whereas, the least numbers of households rely on well/spring/stream/rain water harvesting etc. As per the study, the existing water supply system has been using the same sources including Girubari Khola, Pathare Khola

& Betahi Khola and all these sources have been proposed for the proposed system. Hence, there is no chance of conflict regarding the water use right for the proposed system.

20. During the field study, details on the downstream users have also been collected. As per the study, there exists irrigation canal 200 m downstream of the proposed Girubari Sump well site. This canal is used by the users of the proposed service area. However, from the technical point of view, no impact on the downstream users has been assessed as the existing supply system has been using the same source since years and no impact on the downstream users has been experienced and recorded. Pathar Khola and Betai Khola are tributaries of Girubari Khola (River). Water from these two tributaries are not used for other purposes before meeting Girubari Khola.

C. Design Concept and Project Components

1. Proposed Subproject Component

21. The major water supply components of the project with their characteristic features are described in the sections below:

1.1. Sources/Intakes

22. As per discussion with WUSC members, local bodies, the concerned beneficiaries and key personnel of the project area, four reliable sources have been proposed for the project.

23. The three gravity sources Girubari Khola, Betai Khola and Pathar Khola with sufficient flow is proposed for the project. As per our study, Girubari Khola, Betai Khola and Pathar Khola has more than 40 lps, 12 lps and 10 lps flow respectively. As per the design report, the quantity of water to be tapped from the proposed sources is 26 lps from Girubari Khola, 5 lps from Betai Khola and 8 lps from Pathar Khola. Hence, the combined tapped discharge of these three rivers is 39 lps. Similarly, there is also a proposed pumping system for which 11 lps will be extracted from a slump well at Girubari Khola. The designed discharge is brought to the proposed WTP site – Dihidanda and the existing WTP site- Dihidanda and Shivalaya from which the treated water is conveyed to RVTs Dihidanda and Shivalaya and water from each RVT is supplied to the distribution system by gravity.

(i) **Intake 1: Girubari Khola (Stream/ Gravity).** This intake is an existing intake located in ward no 5, Satakon. But the intake has two collection chambers, as shown in schematic layout. The low height dam (about 2 m height) having gabion and RCC cutoff wall constructed across the river to divert the water into collection chamber. 4 pipes of each 110 mm dia HDPE perforated at upper half are laid to receive the water from filter/ gravel and allow into collection chamber. The collection chamber has 140 mm dia 2 nos. HDPE pipes. One pipe is used and another pipe is kept spare. The transmission pipe has 90 mm dia and has leakage at several locations and pipe is sliding at Kholsi crossing. The pipes are very old and exposed on the ground. Currently, it is supplying about 4-5 lps water. This can be increased with proper construction of intake, addition of collection chamber and resizing the transmission pipe. The source has more than 40 lps discharge. About 26 lps will be withdrawn from the source in new system.

(ii) **Intake 2: Pathar Khola (Stream/ Gravity):** It is located in ward no. 4. The length of pipe is about 2.50 km from intake to WTP/ RVT (Shivalaya). The low height dam

(about 2 m height) having gabion and RCC wall constructed across the river to divert the water into collection chamber. 3 pipes of each 140 mm dia HDPE perforated at upper half are laid to receive the water from filter and allow into collection chamber. The collection chamber has 140 mm diameter HDPE pipes and breakdown into 90 mm- 63 mm diameter pipes to reach water into WTP/ RVT. Currently, the perforated pipe is clogged, and water is directly supplied into collection chamber. The transmission pipe has leakage at several locations. The pipes are very old and exposed on the ground. The source has more than 12 lps discharge. About 8 lps will be withdrawn from the source in new system with proper rehabilitation of intake and replacement of pipe in the transmission main. The transmission pipe will be replaced by new pipes to cater the design discharge.

(iii) **Intake 3: Betai Khola (Stream/ Gravity):** It is located in ward no. 2. The length of pipe is about 2.50 km from intake to WTP/ RVT (Dihidanda). The intake is safe and need RCC cutoff wall, some gabion works for side protection. 3 pipes of each 63mm, 63mm and 75mm pipes are laid parallel in transmission main. The pipes are exposed above ground and crossing from suspension bridge of Girubari Khola to reach water into WTP/ RVT. The transmission pipe has leakage at several locations. The pipes are very old and exposed on the ground. The source has more about 10 lps discharge. About 5lps is withdrawn from the source in new system with reconstruction of intake and replacement of pipe in the transmission main.

(iv) **Intake 4: Proposed Girubari Khola Sump well (Pumping System):** Girubari Khola sump well site is located at about 4 km downstream of Girubari Khola intake site in ward no 4. The infiltrated water of about 11 lps will be pumped to reservoir located above. There is provision of extracting river water if infiltrated water in sump well (infiltration well) will not be enough.

24. The three stream sources Girubari Khola 26 lps, Betai Khola 5 lps and Pathar Khola 8 lps will have combined tapped discharge of 39 lps and Girubari Khola sump well will have 11 lps tapped discharge and the total discharge will be 50 lps for the new system.

Table 4: Source and taping design discharge

S. No.	Sources	Proposed to Tap (lps)			Remarks
		Gravity scheme	Pumping scheme	Total (lps)	
1	Gravity sources Girubari Khola	26		26	The approval Received from Rural Municipality **Annex-1e**
2	Gravity sources Betai Khola	5		5	
3	Gravity sources Pathar Khola	8		8	
4	Pumping system from Girubari Khola		11	11	
Total		39	11	50	

Source: DEDR.

D. Water Treatment Plant

25. Based upon the water quality, secondary data available and discussion with community in the surrounding of the service area, the system is designed with provision of water treatment process comprising rapid mixture, flocculator, sedimentation tank, roughening filter, slow sand filter and disinfection.

26. There are existing treatment plants that have been constructed at two locations (Dihidanda and Shivalaya) for each Girubari, Betai and Pathar Khola sources. Each of these treatment plants are of 5 lps capacity. This is also proposed to be used for the proposed project with necessary rehabilitation works followed by washing and placing of filter media by adding deficit filter media. In addition, two other components that includes Rapid Mixture and Flocculator have been added in the existing treatment plant. For the remaining discharge 40 lps, new treatment plant has been designed.

27. New small rapid flash mixture one unit of size 2.0 m x 2.0 m x 2.0 m at each Dihidanda and New Shivalaya Baffle wall flocculator 2 unit of each 8.50 m x 3.00 m x 1.20m at Dihidanda and one unit of 3.0 m x 1.00 m x 1.20 m at Shivalaya are designed to be constructed for the proposed project.

28. Sedimentation tank with 4 units of each 13.75 m x 4.75 m x 3.00 m is designed taking surface loading 600 ltr/hr/m^2. Roughening filter 4 units of each 7.10 m x 1.60 m x 1.5 m is designed taking rate of filtration 2700 ltr/m^2/hr. Slow sand filter 6 units of each 17.80 m x 7.20 m x 2.90 m designed taking rate of filtration 190 ltr/m^2/hr. This filter rate is taken as quite high due to limitation of the land provided by the WUSC and would be enough for the tested water quality. The scrapping/ replacement of sand from slow sand filter is increased, if the quality of water is worse than the treated quality. All new treatment plants are designed to be constructed at Dihidanda besides the existing treatment plant.

E. Transmission Mains & Pumping

29. Transmission line is the pipeline length from various intakes to reservoirs. The transmission line passes via road, barren land and public land. The site for intakes and transmission route seems stable. As per WUSC, the transmission route of Girubari Khola (gravity) may experience occasional landslide events at some locations. Hence, to overcome this problem, the Girubari sump well has been provisioned though the Girubari intake site has enough discharge. Single stage pumping is designed for Girubari sump well.

30. The total estimated transmission pipeline length from Girubari Khola, Betai Khola, Pathar Khola and Girubari sump well at Dihidanda and Shivalaya WTP/ RVT site is about 13,453 m. Separate transmission line is provisioned for each source due to their location, elevation and topography. The transmission main of Betai has to cross Girubari Khola. Existing suspension bridge will be used for pipe crossing which is used now also.

31. The total estimated transmission pipeline length from Girubari Khola, Betai Khola, Pathar Khola and Girubari pumping to WTP/ RVT sites is about 13,453 m. Due to the elevation of the intake and its location, a separate transmission line is provisioned for each source (i.e. for four sources). Girubari gravity system has only one intake having two collection chambers to receive the water in the transmission main.

F. Distribution Mains & District Metered Area

32. All distribution lines pass along the road network and on public land. The distribution line on both sides has been proposed in core bazaar area, black topped road and the graveled road that will be black topped in the near future, DMA boundary while, pipeline along the single line has been designed in the remaining areas. Due to undulated/ irregular topography, two pipes are designed along one road, among which one pipe will supply water at the highest level without distributing water to the household and other pipe will distribute water to the households up to

bottom from next pipe laid together. The distribution pipe for DMA-1 must cross Girubari Khola. The existing suspension bridge is proposed to be used for pipe crossing.

33. The pipeline is designed by adding 10% extra length over and above the actual length. The estimated distribution pipe is taken as 10% more than the actual length for PE pipe up to 90mm dia and 5% more than the actual length for remaining all pipes. The length of pipe is 149,964.00 m.

34. The PE-100 pipes of outer dia. 50 mm to 200 mm and DI 150 mm to 300 mm dia have been used in the design. The minimum pipe size used in the design is PE100- 50mm, which governs the velocity. PE100 pipe above 4 kg/cm² pressure are proposed in the distribution network design as per technical requirement. But, PE100 PN 6 pipe of 50 mm and 63 mm pipes are not used in the design due to technical difficulties to join the pipe with electrofusion technology. Instead of these, PN10 pipes are used. All PE pipes are joined using electrofusion technology. The washout and air valve have been arranged in the distribution system in control valve/ pipe valve chamber, wherever possible. In some nodes, the residual head is considered high to maintain the residual head in the downstream node.

35. The distribution system is designed in consideration with District Metering Area (DMA). Each DMA has one bulk meter to determine and control the flow into respective service area. There are 7 DMAs in total service area to supply water from each service reservoir. DMA boundary has been fixed depending upon the elevation difference, location and easy for operation and maintenance.

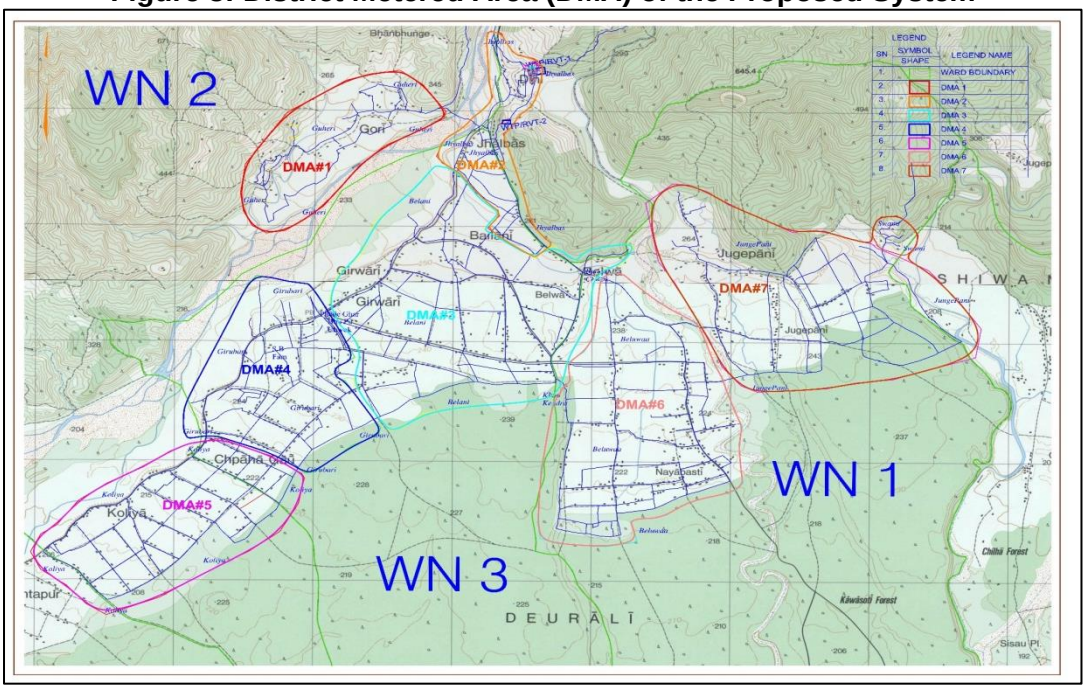
36. Minimum size of pipe to be laid is 50 mm and maximum 300 mm. Maximum one-meter wide space will be needed for excavation and pipe laying work. Pipes will be laid within existing earthen Government roads of minimum 13 ft. wide. There are no any encumbrance in the Right of the Way of roads. Hence, no Involuntary Resettlement impact is anticipated. Pipe diameters; and width and depth of excavation is presented inTable-4a. Figure-3 shows the DMA of the project area.

Table 4a: Pipeline Trench Details

Pipeline Trench Details	Pipe Diameter-ø (mm)	Width (mm)	Depth (mm)
For PE & GI	Up to 50mm	450	900
For PE & GI	63 to 1125	600	900
For PE & GI	140 to 160	Higher of 600 of 3ø	1000
For PE & DI	150 to 250	Higher of 600 of 3ø	1000
For PE & DI	150 & larger	3ø	1000

Source: DEDR.

Figure 3: District Metered Area (DMA) of the Proposed System



G. Service Reservoir

37. The entire system is divided into seven DMAs. The system is designed by using multi reservoir concept. The capacities of reservoirs are RVT1 – 2 nos. each 400 cum at Dihidanda, RVT 2-400 cum 1 no. at Shivalaya for Jhyalbas area. But the service area has been separated due to topography of the town. There are existing reservoirs at each location with capacity of 250 cum and 150 cum respectively. These reservoirs are very old age and not considered in the new system. In RVT-1 location, the first RVT of 400 cum is proposed to be constructed that supplies water to the existing system. Then, only another RVT of 400 cum is constructed. The total storage requirement for the system at the end of the design period is about 1200 m^3. This capacity is split and constructed at various locations.

H. House Connection

38. The households connect tap to their respective households directly from the main distribution pipe. There is provision of average 15 m length of 20 mm dia. PE 100-PN16 pipe with ferrule, compression joint, joined with GI fittings and valves up to meter for each household connection. There are 3,664 connections including individual and institutional connections during base year. The meter is kept near and adjoining the compound of the houses. Each household can extend the pipe themselves as they desire. The necessary fittings have also been designed. Electrofusion saddle has been proposed to join the household connection at main pipe to connect ferrule in the saddle. Likewise, Galvanized Iron (GI) and Ductile cast Iron (DI) saddle clamp are proposed to join the HH connection at main pipe to connect the ferrule for Galvanized iron (GI) or Ductile cast Iron (DI) pipes.

39. Two types of tap stands have been designed for the project. At the end of the design period, it is anticipated that about 89.80% of the total 3652 households is fully plumbed and 10.20% of the total households is served through yard connection. The poor households connect taps free of cost through OBA. There are total 3,280 fully plumbed connections and 372-yard tap

connections. In total, there are 3664 tap connections including 12 institutional connections during design year.

1. Appurtenances

40. **Bulk Water Meter:** The bulk water meter is designed at various locations in the transmission and distribution system to ascertain flow and leakage in the system. The bulk meter is designed at each intake outlet, at the outlet of service reservoirs, DMA outlets. Each bulk meter provides the quantity of water supplied in the particular area, water consumed by the consumers and leakage in that area can be determined calculating the difference of HH consumption water volume and bulk meter water supplied water volume. Accordingly, the repair and maintenance works can be carried out, if the leakages more than the permissible range in such areas.

41. **Types of Connections:** Consumers have been classified into three categories depending on their income level. The consumers having high level of income requiring more consumption of water are placed in fully plumbed category, consumers having medium income at medium consumption level and consumers of low-income group and who cannot afford tariff of fully plumb connections and use less water through tap connection at their household are benefitted through yard connections. The poor households will get individual tap free of cost under the OBA program. However, WUSC has to reconfirm the status of poor households during implementation of the scheme.

42. The cost estimate of the taps for all households and institutions has been included in project cost estimate. During execution of the project, the poor households receive connections under OBA, based on the recommendation of WUSC.

43. **Wash out Valve:** The washout valves have been arranged at transmission, distribution and every water retaining structures to remove the slush/ debris. Washout valves have been provided at depressions points in the pipeline and dead ends, where necessary. The purpose of the valve is to clean the debris collected in the pipeline. Sometimes the valve can also be used for the maintenance of the pipeline without closing the whole distribution system. There are 26 washout valves provided in the whole system.

44. **Air Valve:** The air valves are provided in intake outlet, transmission and distribution mains. Air valves have been designed to release the air accumulated in the pipes. The water flowing through pipes always contain some air. This air tries to accumulate at the highest points and may interfere in the flow by narrowing pipe opening area. Air relief valve is provided in the distribution pipe near the outlet of service reservoir to provide the exit for such accumulated air. Also, the automatic air release valve is provided in distribution system at several locations. There are 20 air valves provided in the whole system.

45. **Control Valve:** The valves are placed in required location of the structures, transmission main and distribution main. The purpose of the control valve is to regulate the required flow at each distribution main from the junction/ node. Sometimes, it can be used for the maintenance of distribution system in particular area without closing whole distribution system. A control valve is provided in the system where there are more than two branches from one junction or where it is necessary. Control valves have been designed in suitable distribution junctions having more than two mains and in required places to regulate the design flow in the main. The design flow in each pipeline is based on design population, non-domestic demand and system wastage and leakage. The future demand in the main may fluctuate and the control valve/ regulating valve is useful to deliver the required flow in pipeline. In total, there are 129 gate valves. 62 nos. pipe valve box

and 45 nos. washout/ air release/ control valve chambers are designed in the distribution system.

46. **Pressure Relief Valve:** The pressure relief valve is a safety valve that keeps the pressure within safety limits to prevent equipment failure, mishaps, or other undesirable outcomes. Pressure relief valves are designed with controls to increase or decrease the level of pressure in a pressure vessel. This type of valve is installed at each pumping stage.

47. **SCADA Valve:** This type of valve is operated by SCADA (Supervisory Control and Data Acquisition) system. This SCADA system is a control system that uses computers, networked data communications and graphical user interfaces for high-level process supervisory management but uses other peripheral devices such as Programmable Logic Controller (PLC) and Discrete PID controllers to interface with the process plan or machinery.

48. A collection of equipment that provides an operator at remote location with enough information to determine the status of a particular piece of a equipment or entire substation and cause actions to take place regarding the equipment or network.

49. Supervisory Control and Data Acquisition (SCADA) achieves this requirement collecting reliable field data through remote terminal units (RTUs), Intelligent Electric Devices (IEDs) and presenting them to user requirement. The user interface or the man machine interface (MMI) provides various options of data presentation according to specific application and user needs. There are many parts of a working SCADA system. A SCADA system usually includes signal hardware (input and output), controllers, networks, user interface (HMI), communications equipment and software. The term SCADA refers to the entire central system. The central system usually monitors data from various sensors that are either in close proximity or on-site.

50. Basic SCADA is proposed/ designed for Deurali Hupsekot town. The outlet management system (OMS) from sump well outlet and reservoirs outlets and each gravity intake outlets, Reservoir management system (RMS) at each inlet of reservoirs. SCADA control valves are also provisioned at the outlet of each DMA to monitor and control the designed flow. The Outlet Management System(OMS) is to provide uniform distribution of water to the reservoirs irrespective of its location and distance from the source of supply, to avoid the overflow of Reservoirs, to measure, monitor and control the flow delivered to the RVT without any external Electric Energy and no high recovery cost for Energy/Communication Cost such as GSM/GPRS/RADIO etc.

51. The automation to link all the components through SCADA (Hydraulically Supervised Control and Data Acquisition) and all the mentioned components which is capable to control and monitor the parameters from SCADA room/ master control center for submersible pumps of all for main and one small stages, Water level sensors for all RVTs , Online Chlorine Monitors, AMS, RMS, WMD, and zonal PFCMDS etc. are provided. The Reservoir Management System (RMS) enable to avoid the overflow of reservoirs and pressure controlling system.

52. Likewise, provision of one-year operation and maintenance for SCADA is also made for water supply system operation and maintenance. The proposed system works under Wi-Fi coverage area, on the GPRS network or on a given radio frequency. The radio frequency is a free of cost communication media, but the limitations it has are, eye visibility of two connecting devices and the distance between them. Similarly, it is difficult to reach all equipment within Wi-Fi coverage also. The other way out is the GPRS which shall work with the 3g and above cell phone network area. The services of the network providers having a full network in the given area can be used.

53. **Valve Chambers:** Two types of Chambers have been proposed in the project to control or regulate the flow of the proposed water supply system. The chambers constructed by brick masonry have been provided in non-vehicular areas and rural area. In other vehicular carriageway and city area, the chambers constructed with RCC have been provided.

54. The chambers serve as housing, protection and convenient access to these pipe appurtenances. Inside the concrete chambers, the necessary supports has been provided for pipes and valves at appropriate locations. Access to the valve chamber is given via lockable cast iron covers with frames. Manhole covers of the heavy-duty type have been recommended in RCC chambers. The covers for manholes in paths may be proposed of medium duty type.

55. In total, there are 62 no. pipe valve boxes and 45 washout/ air release/ control valve chambers designed in the distribution system.

56. **Fire Hydrants**: Fire hydrants are provided at major road junctions. These fire hydrants are proposed to be used for flushing of the system as required. Fire hydrants, namely, stand post type, conforming to IS908, are recommended.

I. Generator House:

57. A Generator house is designed of size 11 m×7.3 m at Girubari sump well site. The generator supplies power mainly for the pump installed at sump well, when there is no regular power from Nepal Electricity Authority. The generator of 50 kVA (rated power) is used to pump the water during power failure at the town.

J. Laboratory Building cum WUSC Office Building, Guard House and Dosing House:

58. A two storied laboratory building cum WUSC office building has been designed and proposed to be built in Jhyalbas Bazaar. WUSC provide the land required for the construction of office. The Guard house type -2 is to be constructed at WTP/ RVT-1 and 2 sites while Guard house type- 1 is constructed at sump well site. The preliminary water quality test kits are arranged for regular water quality monitoring. It is included in the project components of the system.

K. Boundary Wall and Retaining Wall

59. The retaining wall has been proposed at new WTP site at various location. In some cases, boundary wall is constructed above the retaining wall while in some cases, the boundary wall is built from the foundation. The metal post with chain-link fencing above brick masonry wall has been proposed to protect the structures such as sump well/ intake, office building, reservoir sites, generator house, WTPs etc. as necessary.

L. Sanitation Components:

(i) **Proposed Public toilet in two locations:** Two gender friendly public toilets have been proposed in Project municipality one in Chautari near to local bus park ward no 4 Jhyalbas bazar and second in Stadium Chock ward no 2. Both of these entities will be gender-friendly with separate rooms. There is also provision for all all-gender / persons with disability toilets at both locations.

(ii) **Individual Household Toilet Improvement:** The sanitation improvement basically includes the individual household toilet improvement. The low-income

group will be encouraged to construct toilet providing OBA grant. For the improvement and construction of household toilet the house owners will provide the land. Therefore, land acquisition is not required for household toilet. As per the OBA demand form, WUSC and DSMC will select the OBA households on the basis of demand. Actual number of households will be identifying after the joint field verification by Water User and Sanitation Committee, integrated core group and design supervision and management consultant. OBA grant will be provided to those households who are selected for OBA grant on the basis of living below poverty line (NPR 13,500/month based on the Nepal Living Standards Survey 2010/2011 updated in 2020 by the project) and other criteria. For the implementation of OBA program, GESI expert and social mobilizer of design supervision and management consultant team will be mobilized. Approved poverty calculation sheet for OBA implementation is attached in Appendix 5. The Table 5 below describes the different components of the proposed subproject.

Table 5: Project Components Details

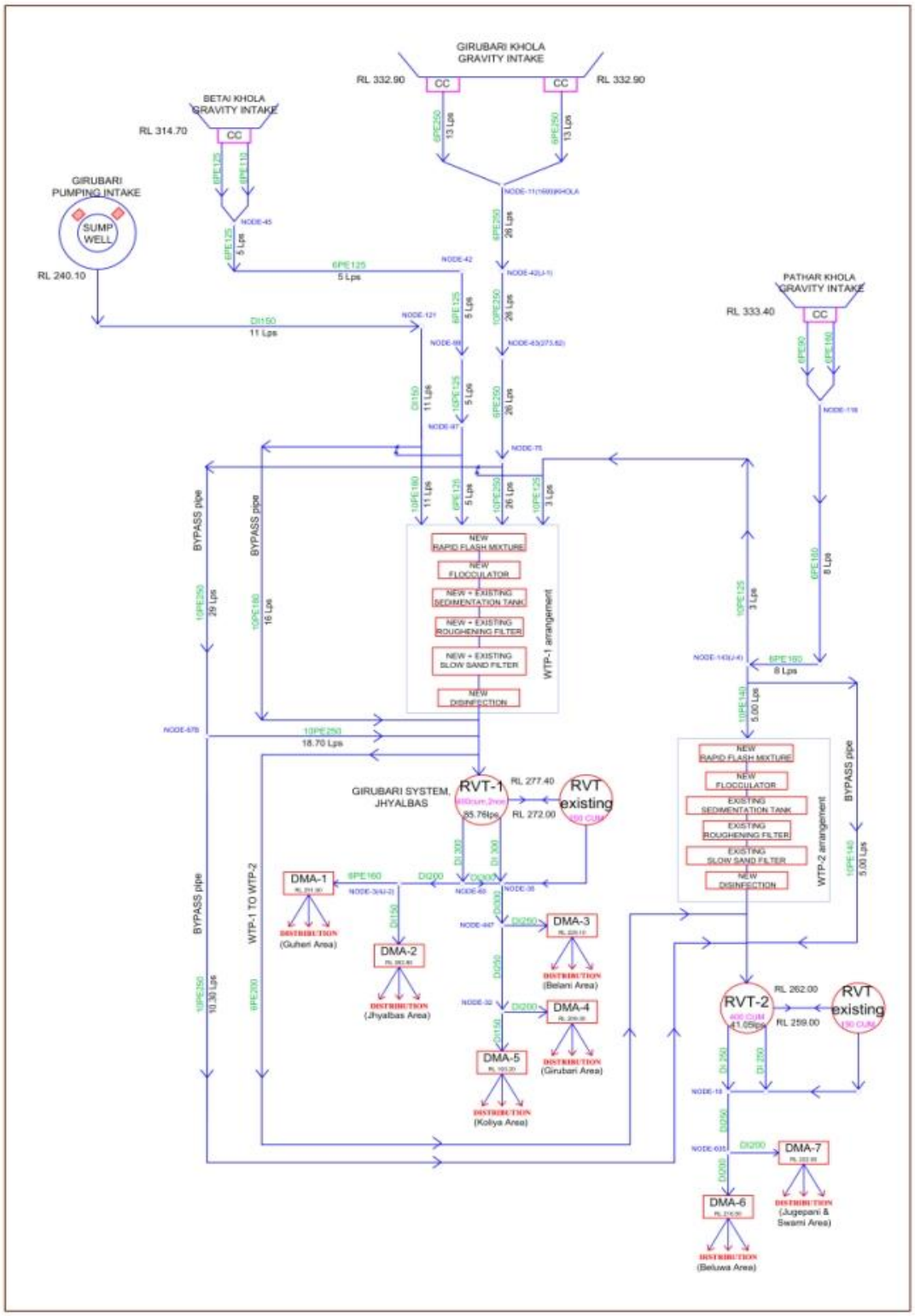
SN	Items	Description
1	Name of Project	Deurali Hupsekot Water Supply and Sanitation Project
2	Type	Both gravity and pumping system (use of 3 existing gravity sources and one new pumping source and gravity water supply in distribution system)
3	Study Level	Detailed Engineering Design Final Report
4	Location Area	
	Region/ Province	Province-4
	Zone	Lumbini
	District	Nawalpur
	VDC/Municipality	Hupsekot Rural Municipality
	Service Area Ward and settlement	**Hupsekot Rural Municipality:** Ward no. 1: Beluwa and Jukepani Ward no. 2: Koliya and Guheri (water to be supplied from RVT without pumping) Ward no. 3: Girubari and Belhani Ward no. 4: Jhyalbas and Tallo Dihi
5	Available Facilities	
	Road	Kathmandu to Kawasoti is 178km, Kawasoti to Danda Bazaar (bifurcating junction called Sahid Chowk) is 3km and Sahid Chowk to WUSC office/ Jhyalbas is 8km.
	Supply Water System	Limited supply for few hours operated by WUSC
	Electricity	Available
	Communication	Available
	Health Services	Available
	Banking Facilities	Available
6	Social Status	
	Present HHs Numbers (2018)	3,652
	Present Population (2018)	21,601 (incl rental 2,254)
	Base Year Population (2021)	22,786 (rental population kept constant)
	Design Year Population (2040)	32,168 (rental population kept constant)
	Average HHS size	5.3
	Growth Rate % (WGR)	2%
	Projected HHs in Design Year	5,647

SN	Items	Description
	(based on GR)	
7	Water Demand (MLD)	
	Base Year (2021)	2.88 (2,882,429 ltr per day)
	Design Year (2040)	4.07 (4,069,252 ltr per day)
8	Source Characteristics	
	Source Name	Girubari Khola at 2 locations(one gravity, other pumping), Pathar Khola and Betai Khola
	Source Type	Stream
	Source Location	Hupsekot (Ward 5 Girubari gravity atSatakon), Ward 4 Girubari pumping), Pathar Khola Ward 4, Betai Khola Ward 2
	Source discharge (lps)	Plenty (more than required) Girubeni 40 lps, Betai 10 lps Pather khola 12 lps & Sumpwell (seepage of Girubeni khola, plenty)
	Tapped discharge (lps)	**50 lps** (Girubari gravity 26lps, Girubari pumping-20hr a day 11lps, Patharkhola 8lps, Betai khola 5lps)
9	Type of Structures	
	Proposed intakes	Stream Intake - 1 (Girubari existing rehab) Stream/ seepage water - 1 (Girubari khola; sumpwell well) Stream intake - 1 (Pathar khola, existing rehab.) Stream intake - 1 (Betai khola, existing rehab)
	Water treatment plant	Rapid mixture - Floculator-Sedimentation-Roughening - Slow sand filter-Desinfection Rapid mixture - 2 location (Dihidanda & Shivalaya) Floculator- 2 locations (Dihidanda & Shivalaya) Sedimentation tank - 1 location (Dihidanda) + existing 2 location (rehab) Roughening filter - 1 location (Dihidanda) + existing 2 location (rehab) Slow sand filter - 1 location (Dihidanda) + existing 2 location (rehab) Disinfection - 2 locations
	Pumping Details	Single stage 25HP submersible pump to pump 11 lps from Girubari Sumpwell/ intake. Transformer 50KVA and generator-50KVA
	Ground Reservoir (No and Capacity in CUM)	RVT1: 400cum – 2 nos. (Dihidanda) RVT 2: 400cum – 1 no. (Shivalaya) (Total capacity 1,200 cum)
	Valve Chamber (Bricks/ RCC)	45 Nos
	Pipe valve box	62 Nos
	Office Cum GH (O1) /Small Guard House (G1) / Guard House cum Store (G2) / Dosing House (DH), Generator House (GH), Boundary wall (BW)	WUSC office-1 no (bazaar area land to be provided by WUSC) Guard house (GH1) – 1 no (at sumpwell site) Guard house with store room (GH2) – 2 nos (RVT-1 Dihi danda and RVT-2 site Shivalaya) Dosing station- 2 nos (RVT-1 and RVT-2 site) Generator house - 1 no. (sumpwell site) Boundary wall – 4 locations
	Household Connection (no)	3,652
	Connection for institutions(no)	12
	Fire Hydrant (no)	5
	River crossing	16
	Length of pipe in transmission	13,453.00

SN	Items	Description
	main (from various intake to WTP/ RVT), (m)	
	Length of pipe in Distribution system (m)	149,964.00
	Total pipe length (m)	163,417
	Number of DMAs	7 nos
10	**Total Cost of WS Component (Inclusive of all) NRs.**	**889,958,368.07**
11	Cost Sharing Arrangement (NRs)	
	GON Component (70 %)	622,970,857.65
	TDF Loan (25 %)	222,489,592.02
12	WUSC's upfront (Cash contribution 5%)	44,497,918.40
13	Tariff	
	Up to 6 cum/monthly (NRs)	35
	7 to 10 cum/monthly (NRs)	45
	11 to 20 cum/monthly (NRs)	55
	21 to 30 cum/monthly (NRs)	65
	>30cum	75
	Institutional cum/month (NRs/ cum)	75
	Weighted av. Tariff (NRs./HH/month)	989 (NRs. 60.93/cum)
14	Financial Indicators	
	EIRR (Base case), %	23.50
	FIRR(Base case), %	21.50
	AIFC (Base case), NRs per cum	21.11
	AIEC (Base case), NRs per cum	28.25
15	Environment	
	ADB Category	B, Only IEE necessary
	IEE finding	No significant adverse impact.
16	Per Capita Cost for W/S component	
	Per Capita Cost (for base year pop.), NRs	39,057.24
	Per Capita Cost (for design year pop.), NRs	27,665.95
17	Total cost of Sanitation Component (including all), NRs	**12,255,156.81**
	GoN Component (85%)	10,416,883.29
	Local Authority (15%)	1,838,273.52
18	**Total cost of Water Supply and Sanitation Component, NRs**	**902,213,524.88**

Source: DEDR.

Figure 4: Schematic Diagram



III. FIELD WORK: SURVEYS AND PUBLIC CONSULTATION

60. Outline of Field Work On 30 October 2018, field inspection of proposed subproject facility locations and pipeline alignments was conducted. These included field visits to the identified sites, alignments and stakeholder consultations. Field visits to all proposed sites, RVTs, WTP locations, transmission main alignments, distribution pipeline alignment and consultations with stakeholders were conducted to confirm land ownership and use, the need for surveys and further consultations. Available no objection letter or land-related documents for land use from the municipality were also collected during fieldwork.

61. On 21 July 2019, field visit and meeting with a local resident, ward chairpersons of ward no. 4, 3 and 2 and elected Rural Municipality Chairman was carried out for finalization of land area and its use. During the field visit main WTP/ RVT-1 400 cum location at ward no. 4 near to Jhyalbas area, Dihidanda, RVT-2 Shivalaya, BPT at different locations especially, sump well location Chaparigaira, existing intake of Girubari Khola, Satakon, Pathar Khola and Betahi Khola has been visited. Transect walk along the main transmission pipeline alignments, together with WUSC chairman, members, local government representatives, community forest user group committee member and official-in-charge of municipal water supply branch of Hupsekot Rural Municipality has been carried out. Land location and document of land and using scenarios were verified.

62. Proposed Sump well station area lies on the riverbank of Girubari Khola, the barren land of ward no 4 of Hupsekot Rural Municipality. All major structure existing RVT -1, RVT-2 and proposed RVT-1 and RVT-2 are located at ward no. 4 of the same Rural municipality.

A. Public Consultation and Information Disclosure

63. Numbers of consultation meetings were undertaken with key stakeholders in line with ADB's requirements pertaining to the environment and social considerations during the planning phase and feasibility study phase. Tools used for consultation were stakeholder meetings and interviews. During project preparation, more than four formal stakeholder meetings were held with 157 persons in Deurali Hupsekot subproject (Mayor/Deputy Mayor, executive officer of Municipality and WUSC chairman, representative of main WUSC body and women groups). Similarly, discussions, interaction and interviews of local users were carried out within proposed project sites of Deurali Hupsekot UWSSP to understand their key concerns related to the project. The inclusion of the poor in the drinking water scheme was also discussed. Required modality, role, and responsibility of stakeholders, approach, and requirement of the project including land to construct various structures were disseminated and well informed for effective implementation of the program. Likewise, modality of financial arrangement (upfront cash contribution 5% by WUSC/users, 25% loan by Town Development Fund (TDF) and 70% grant by the government for the urban town's project was disseminated.

64. Reconnaissance surveys conducted along proposed/accessible pipeline alignments to identify the need for surveys and inventories; however, no structures were found and it was assessed based on field visits that temporary impacts could be easily avoided. Project social safeguards policy and possible issues were discussed. These consultations helped identify the needs/concerns of the communities related to the project and priorities of relevant stakeholders.

65. On 22 June 2019, Interaction with Rural Municipality chairman of Hupsekot Rural Municipality visited the WTP, RVT and BPT locations and provided consensus letter. In ward number 4 chairperson of ward number 4 visited the RVT location with the safeguard team and

helped to clear the land boundary. During the same day, he had arranged the small interaction program in his office and brief about the project and land requirement with his working team.

Table 6: Public Consultation

SN	Meeting Date	Facilitator	Venue & Participa-tion	The topic of Dissemination/ Discussion	Concerns/ Issues Raised	Recommended Measures
1.	June 21, 2019	Rural Municipality Chairman, Project Director and Deputy Director Design engineer and Safeguard specialist	Mayur Community forest meeting hall Male: 124 Female: 10	The estimated budget for the project, 5% Upfront cash collection from local user and overall project modality.	Cost-sharing from local and project implementation	All are positive toward the project. **Annex-2a**
2.	June 22,2019	Rural Municipality Chairman,WUSC Chairman,Ward Chairman ,Safeguard Specialist	Municipality office Male :4 Female:1	Discussion on the requirements for acquiring land for project no objection letter from ward office, land in an appropriate location for public toilet no objection letter.	Land acquisition for different components of the project. General discution for 5% upfront cahs collection and loan fromTown development fund(TDF).	Ward chairman of different wards and municipality recommened that required consent letters will be arranged. Attendence sheet only **Annex- 2b**
3.	Novemb er 1, 2018	Rural Municipality Chairman, Deputy Chairman, WUSC Chairman, ,Safeguard Specialist and WUSC members	WUSC office Male:5 Female:4	Interaction with WUSC and Municipality member	Project modality, Land rquirement for project, upfront 5% cash collection and household survey in service area etc.	WUSC committed to support for the survey Attendence sheet only. **Annex- 2d**
4.	October 30, 2018	Social safeguard Specialist	Ward no. 4 office, Ward chairman of 4, 5 and 3 WUSC chairman, local and existing water supply staff. Male: 9 all-male Female: 0	Discussion about the required land for the project and its approval no objection letter from ward office, public land in busy places and its approval site verification government/ municipality land and no objection letter.	Municipality and ward office is the permission granter?	Ward chairman of different ward and municipality has been recommended that all responsibility/guarante e permission letter provides by Municipality. **Annex-2c**

IV. LAND AVAILABILITY, INVOLUNTARY RESETTLEMENT AND INDIGENOUS PEOPLE IMPACTS

A. Findings

66. Deurali Hupsekot Urban Water Supply and Sanitation Project have been conceptualized as a piped water supply system using river water lifting as well as gravity sources. One stage lifting system is proposed for the project. This section deals with the land requirements and availability for different components of the proposed town project and resettlement impacts. Consent letters and approval letters required from Hupsekot Rural Municipality and Community Forest Users for the use of land to construct project components are attached in Annex 1. Photographs of the proposed sites for construction of water supply facilities are annexed to this due diligence report in Annex-3.

67. Land at 10 different locations is required for construction of project components such as a sump well, RVTs, treatment units, an office building, a guard house and a public toilet. All structures are in WUSC own land and government land. Municipality and community forest group have given consent letters for the use of land to Deurali Hupsekot Urban Water Supply and Sanitation user committee.

68. All other water supply components such as transmission mains and distribution network are proposed on government land and public road right-of-way. No involuntary resettlement and indigenous people's impacts are anticipated due to use of right of the way of Government roads.

69. Field observation reveals that three i existing intakes under WUSC which are being used/functional for 20 years will be used for the projectThe consent letter by Hupsekot Rural Municipality to tap water and use the required land for construction of structures is attached in annex 1e.

70. The WUSC identified nearly 1017.47 sq. m (2 Ropani) land at the riverbank of Girubari Khola, ward no 4, Chaparigaira, in Hupsekot Rural Municipality for construction of a slump well, a guard house (GH1) and a generator house. The land is vacant Government land. There are no squatter's settlement, no crops; no any temporary or permanent structures exist. Hence, no involuntary resettlement and indigenous impacts is anticipated. A consent letter by Hupsekot Rural Municipality is attached in annex 1e.

71. RVT-1 of 400 cum has been proposed at Shivalaya area within the Musedanda Community forest. Musedanda community forest user committee has granted the letter of permission to WUSC which is attached in annex 1c.

72. Two RVTs of 400 cum each and a filter unit are proposed at Dihidanda ward-4 in Hupsekot Rural Municipality and the Municipality has provided consent letter for the same which is attached in annex 1b. All these lands are WUSC owned and public/ government land. The land ownership certificate of WUSC owned land is attached in annex 1a. Field observation reveals that lands in all sites are barren without any public or private structures and free of encroacher / squatter settlement/informal users. No Involuntary Resettlement and Indigenous People impacts is anticipated due to land use.

73. Two gender friendly public toilet has been proposed in Project municipality. One of the

public toilet is proposed at a Chautari near local bus park in ward number 4, Jhyalbas bazar. The land is vacant Government land of 338.7 m2 area, parcel number 752.The consent letter by Hupsekot Rural Municipality is attached in annex 1f. The second public toilet is proposed in vacant Government land at Stadium Chock, ward number 2. The ward office has granted the letter of permission to WUSC which is attached in Annex-h. The toilets will have 6 urinal channel, 2 pans, 2 washbasins and 1 shower for male users; and 2 pans separate units, 2 washbasins and 1 shower for female users. One unit for differently abled person is also proposed at the same site.WUSC identified the land in Jhyalbas Bazar in ward number 4 with land parcel number 752 and public land in ward number 2.

Table 7: Proposed Water Sources

SN	Ward Number	Location	Minimum Land Required m^2	Capacity	Status	Service area	Land Ownership	Land Available	Involuntary Resettlement and Indigenous Peoples Impact	Compensation/ Mitigation Measures	Document Details
1	4	Stream intake: Girubari Khola (Gravity)	508.74	26 lps	Existing	Entire project area	Government land/ Hupsekot Rural Municipality	River Bank, barren land plot not available	Public land left bank of stream Girubari Khola Vacant barren land. No involuntary resettlement impacts anticipated	Not required. Existing intake will be used with some rehabilitation work.	Approval Letter Received from Rural Municipality **Annex 1e.**
	2	Stream intake: Betai Khola	254.37	5 lps	Existing		Government land/ Hupsekot Rural Municipality	River Bank, barren land plot not available	Public land left bank of stream Vacant barren land. No involuntary resettlement impacts anticipated	Not required. Existing intake will be used with some rehabilitation work.	Approval Letter Received from Rural Municipality **Annex 1e.**
	4	Stream intake: Pathar Khola	254.37	8 lps	Existing		Government land/ Hupsekot Rural Municipality	River Bank, barren land plot not available	The public land river bank of stream Vacant barren land. No involuntary resettlement impacts anticipated	Not required. Existing intake will be used with some rehabilitation work.	Approval Letter Received from Rural Municipality **Annex 1e.**

SN	Ward Number	Location	Minimum Land Required m^2	Capacity	Status	Service area	Land Ownership	Land Available	Involuntary Resettlement and Indigenous Peoples Impact	Compensation/ Mitigation Measures	Document Details
	4	Stream intake: Girubari Khola sump well (Pump)	508.74	11 lps	New	Entire project area	Government land/ Hupsekot Rural Municipality	1017 m^2 (2 Ropani).	Governement The land at the left bank of stream. Vacant/barren GOvernment land. No involuntary resettlement impacts anticipated	Not required. It is vacant Government land at the River bank Municipality,	Approval Letter Received from Rural Municipality **Annex 1e.**

Table 8: Existing and Proposed Water Treatment Plants and Reservoir Tank

SN	Component	Capacity	Status	Service area	Land Ownership	Minimum Land Required m^2	Land Available m^2	Involuntary Resettlement and Indigenous Peoples Impact	Location of Major Components	
									Ward	Document details
1	**WTP-1/ RVT-1 site consists of:**	WTP –Total 45lps, Old WTP 5lps and new WTP 40 lps								
	Flocculator -1 set,	2 unit of each 8.50m x3.00m x 1.20m	New	Entire project area, DMA 1,2,3,4 and 5	WUSC ownedland of plot no 1967 and 1968 in ward no. 4 (former	5598.14	5627.79	Existing WTP is in WUSC owned land, No involuntary resettlement Impact anticipated. Vacant barren land. No non-title users and squatters. No	.4, Dihidanda	Not required, Land owners hip certificate with parcel number
	Sedimentation tank-1set,	1set4 units of each 13.75m x 4.75m x 3.00m	New							
	Roughening filter-1set, ,	4 units of each 7.10m x 1.60m x 1.5m	New							

SN	Component	Capacity	Status	Service area	Land Ownership	Minimum Land Required m^2	Land Available m^2	Involuntary Resettlement and Indigenous Peoples Impact	Location of Major Components	
									Ward	Document details
	Slow sand filter-1set,	, 6 units of each 17.80m x 7.20m x 2.90m	New		VDC ward no. 9)			involuntary resettlement impacts anticipated. "No objection letter" received from Rural Municipality.		1967 and 1968 is attached in annex 1a . Consent letter by Hupsekot Rural Municipality to use vacant Government land with parcel no 696 is attached in annex **A1b**
	RVT1- 400 cum - 2nos	400 cum	New							
	RVT-Existing	Existing - 150cum	Existing							
	Disinfection -1,	one unit of size 2.0m x 2.0m x 2.0m	New							
	Guardhouse with storeroom (GH2)- 1nos	5.05mx 5.8m)	New							
2	**WTP-2/ RVT-2site consists of:**	WTP -5 lps	Existing	DMA 6&7	Government land / Rural Municipality	1017.47	As required by the project	The land is being used by WUSC for existing WTP and RVT. Proposed site is under community forest. A small piece of land for construction of project components will be used It does not affect the community forest users' mobility/access and livelihood. Community will continue to have access to remaining forest land. No objection letter provided by the community forest users	4	The Musedanda Community forest User committee has given approval letter. **Annex 1c.** The map of Community forest with specific area for water supply component **, Annex-1d**
	RVT -2, 400 cum	400 cum,	New							
	Flocculator -1,	one unit of 3.0m x1.00m x 1.20m	New							
	Sedimentation tank-1	, 4 units of each 13.75m x 4.75m x 3.00m	New							
	Roughening filter-1,	4 units of each 7.10m x 1.60m x 1.5m	New							
	Slow sand filter-1,	6 units of each 17.80m x 7.20m x 2.90m	New							
	RVT- 2 and	400cum	New							

SN	Component	Capacity	Status	Service area	Land Ownership	Minimum Land Required m^2	Land Available m^2	Involuntary Resettlement and Indigenous Peoples Impact	Location of Major Components	
									Ward	Document details
	RVT- Existing	150cum	Existing -					committee. There are no non- titled users, squatter settlement. .		
	Disinfection -1	one unit of size 2.0m x 2.0m x 2.0m	New							
	Guardhouse with storeroom (GH2)-2nos	5.05mx 5.8m)	New							
3	Sump well	9m×4m	New	Entire project area	Public land/ Now under Rural Municipality	1017.47		The proposed site is river bank of Girubari Khola, Vacant barren land. No non-title users and squatter's settlement . No involuntary resttlement impacts anticipated. "No objection letter" received from Rural Municipality. One sump well, guardhouse and one generator house will be built.	4	Approval letter received from Municipality, **Annex -1i &1e**. The parcel number is not available and will be attached in updated report.
	Generator House and pump control room	11m×7.3m	New							
	Guard House (GH1), small	4.5m×3m	New							
4	Transmission main from intake to WTP and WTP to RVT-1=13,453.0 m	Outer Dia PE100 -(90-250 mm), DI-150 mm DI	New	Entire project area	Public road ROW			Public/Government land and right of the way of Government roads		
5	Distribution line from RVT to household connection point149,964.00m	Outer Dia(mm) PE100 (50-200 mm), DI (150-300 mm)	New	Entire project area				The road, barren land, road and foot trail will be used		

Table 9: Construction of Public Toilet

SN	Rural Municipality	Ward	Location	Minimum Land Required(m^2)	Status	Service area	Land Ownership	Land Available (m^2)	Involuntary, Indigenous Peoples and Resettlement Impact	Compensation/ Mitigation Measures
1	Hupsekot	4	Public toilet, Jhyalbas Bazaar, Chautari, local bus park	104	New	Entire project area	Public land Plot no. parcel no. 752	338.7	Vacant unused government land; no non-titled users. No involuntary resttlement and indigenous peoples Impact anticipated	None, WUSC has been received consent from Rural Municipality, **Annex,1f**
2	Hupsekot	2	Public toilet, ward no 2, Stadium Chowk	104	New		Nepal Governmen t/ Plot no. 8 (Vacant Governmen t land)	338.7	Vacant unused government land; no non-titled users. No involuntary resettlement and indigenous peoples Impact anticipated	None, WUSC has been received consensus from the ward office. **Annex, 1h**

Table 10: Valve Chamber and Fire Hydrant

SN	Item	Quantity	Location/Service	Involuntary Resettlement Impact
1	Valve Chamber		Alignment	These components will be constructed within the ROW of existing Government roads. Access to shops and residences will be ensured by the contractor and temporary economic impacts avoided. Traffic disruptions will be managed through a proper traffic management plan. No involuntary resettlement impact anticipated.
	RCC	45		
	Brick			
2	Pipe valve box	62		
3	Fire Hydrant	5	Main Junction of road	

Table 11: Construction of Project Facilities

SN	Item	Number	Location	Minimum Land Required (m^2)	Owners hip of Land	Involuntary Resettlement Impacts	Compensation/ Mitigation Measures
1	Office (O1)	1	Beluwa ward no. 3	190	693.35 m^2 of Public land/ Government/ Hupsekot Rural Municipality.	Vacant government land has been proposed for the construction of a new office building. No non-titleholders are present within the compound. No involuntary resettlement and indigenous people's impact anticipated.	None. WUSC has received consent letter from Hupsekot Rural Municipality **to use the land which is attached in Annex,1j**
	Guard House (GH1), small	1	Within the compound of WUSC office and Sump well site			None. Proposed in vacant WUSC land within the Compound.	

B. Mitigation Measures

74. Temporary impacts of transmission and distribution network laying and house connections will be limited to temporary disturbance in access to shops and residences. The contractor will be required to provide signs at appropriate locations indicating available alternate access routes for movement. The contractor will have to ensure access to shops and residences using simple wooden walkways where required and limit the excavation to 200 m at a time to minimize disruption. No road closures are anticipated during construction; contractor to undertake construction on one side of the road first and on completion of the same start work on the other side to minimize the impact on traffic. Provision of house connections may cause temporary disruptions in access to residences during construction. The contractor will be required to maintain access. Construction contracts will include the above provisions.

75. The IEE report explicitly states no trees will be cut. However, for any unanticipated cutting of trees during the implementation phase, ensure that PMO/RPMO obtain appropriate clearance (forest clearance or tree cutting clearance). No civil works will commence unless forest clearance or tree cutting clearance, if required, is obtained. PMO to report status in the Social Safeguard Semiannual Monitoring Repot (SSMR).

C. Involuntary Resettlement

76. As mentioned in ADB's Safeguard Policy, the involuntary resettlement safeguards basically covers physical displacement (relocation, loss of residential land, or loss of shelter) and economic displacement (loss of land, assets, access to assets, income sources, or means of livelihoods) as a result of (i) involuntary acquisition of land, or (ii) involuntary restrictions on land use or on access to legally designated parks and protected areas.

77. Nearly 9160 sq. m of land for the construction of different project components are required, which has been identified and obtained by WUSC at different sites as required. Most of the land sites are Public / Government land. For the public land use, WUSC has received consent from the Municipality and concerned Community Forest Users Committees. No settlement will be adversely affected and no need of physical displacement of people. Adverse impact due to the project is not anticipated and no need of compensation. The details of the land requirement, involuntary resettlement and indigenous people impacts are discussed Table 7-11.

D. Indigenous Peoples

78. According to the ADB's Safeguard policy, the Indigenous Peoples safeguards are activated if a project directly or indirectly affects the dignity, human rights, livelihood systems, or culture of Indigenous Peoples or affects the territories or natural or cultural resources that Indigenous Peoples own, use, occupy, or claim as an ancestral domain or asset. The term Indigenous Peoples is used in a generic sense to refer to a distinct, vulnerable, social and cultural group possessing the characteristics such as self-identification as members of a distinct indigenous cultural group; geographically distinct habitats or ancestral territories; distinct customary cultural, economic, social, or political institutions; and a distinct language.

79. The field observation reveals that all the settlements/clusters in the service area are heterogeneous in terms of caste/ethnicity and no specific territory of indigenous people has been observed. Furthermore, in the context of a service area, belonging to the indigenous group does not necessarily mean that they are underprivileged. In the service, area is mostly dense by indigenous people. The WUSC policy and rules reflect that all are treated equally and there is no

discrimination on receiving water supply service based on ethnicity and caste. Within the service area, universal coverage (100%) is applied. Most of the indigenous people are highly benefited by the project rather than an adverse impact. It is the basic norms of the UWSSP. The Chairman of WUSC represents from an indigenous community called Magar.

V. CONCLUSIONS

A. Summary and Conclusion

80. All locations of intakes, water treatment plant and storage reservoirs have been identified. The water supply components are proposed to be constructed in the land owned by WUSC and GON land/Hupsekot Rural Municipality. Field visits and observations have been made and documents ensures that there is no procurement of private or institutional land. The distribution network will be on government land (ROW of the road). The proposed water supply scheme of the municipality will not have any significant impact on private or institutional land and structures. The subproject will not have any impact on land and livelihood of poor and vulnerable people.

81. The impacts of project construction activities will be minimal and no need of physical displacement (relocation, loss of residential land, or loss of shelter) and no economic displacement (loss of assets, access to assets, income sources, or means of livelihoods). Nearly 9160 square meters of land is required at 10 sites for construction of project structures such as Intakes, Office building, Sump Well, Guard houses, RVTs, Treatment Units and Public Toilets. There are no permanent involuntary and indigenous people's impacts due to construction works.

82. The composition of the community by caste/ethnic is heterogeneous in nature. So, diversity of culture, custom, tradition, norms, and values are existing in the project area. The household survey of the subproject area has also reflected the cross-section of major ethnic groups of the country. Mainly Magar, Kumal and Darai indigenous people groups are the main indigenous people of the service area. The Chairman of the WUSC is from the indigenous people's community.

83. The WUSC policy and rules reflect that all are treated equally and there is no discrimination on receiving water supply service based on ethnicity and caste. The project's framework for the inclusion of poor and vulnerable households in project benefits will ensure that all indigenous people's households are included in project benefits. The project ensured 100% household water connections (including to IP households) will be applied. Furthermore, there is a provision of **Output-Based Aid** program which addresses poor indigenous people's households for tap connection and toilet construction, who do not have household toilets.

84. Based on the socio-economic profile of Deurali Hupsekot,165 of households are fall under poor category as they earn less than NRs 13500 per month.[9] During the project implementation period the WUSC will publish the notice in local language in local newspaper/FM radio for selection of OBA recipients among the low income group households. The team of stakeholder (representatives of the Rural Municipality, Water user and sanitation committee, and Design Supervision Monitoring Consultant) will verify the collected form; field observation will be made, whereas, feel unfairness, then finalized the final nominee. The final name list of OBA recipients will be annexed in reports during the monitoring period.

85. There will be no adverse Involuntary Resettlement and Indigenous Peoples impact due to the construction of the water supply components, Sanitation component (public toilet), distribution

[9] As per approved "Below Poverty Line Calculations" for the UWSSP.

lines, valve chambers and treatment facilities. All the proposed locations and alignments are located in WUSC land, Government land and along the right of way of roads.

B. Next Step

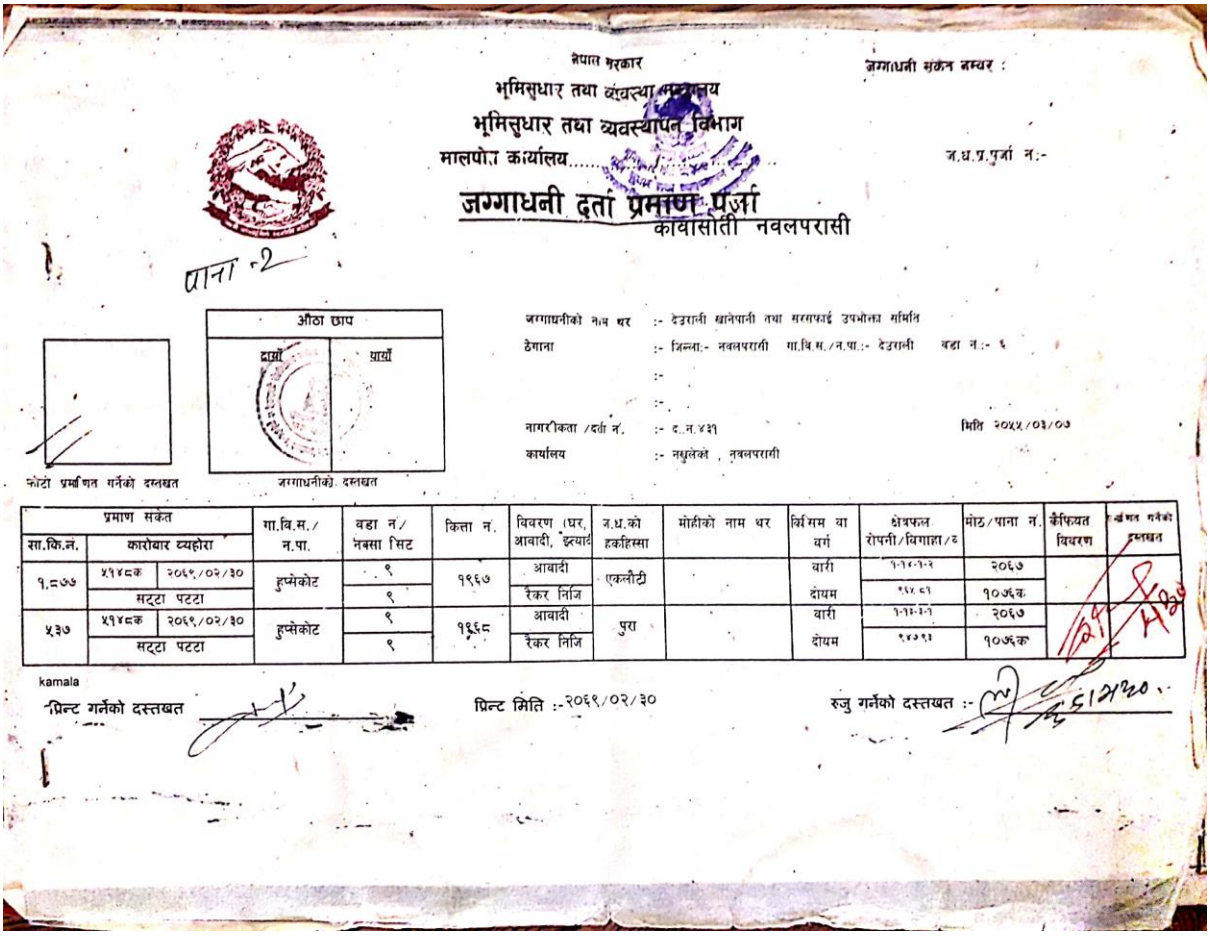
86. Following items will be incorporated in updated DDR.

(i) Consultation meetings with the communities and stakeholders in intake locations will be held before start of construction and minutes of meetings will be incorporated in updated DDR.
(ii) Records of land ownership along with parcel number and a map from land reform and management office will be provided by the Municipality/ward chairman before start of construction.
(iii) Transmission line transverse through Government land/Right of The Way of Government roads and requires consent letter to use for the same before construction works start

87. Any significant unidentified Involuntary Resettlement impacts found during project implementation shall be addressed as per the agreed entitlement matrix in the Resettlement Framework. The draft DDR will be updated and ADB's No Objection sought, prior to start of construction.

Annex-1: Certificates, Consent letters from Municipality and Community Forest Users Committee

a. Land ownership certificate of WUSC owned land



नेपाल सरकार
भूमिसुधार तथा व्यवस्था मन्त्रालय
भूमिसुधार तथा व्यवस्थापन विभाग
मालपोत कार्यालय.....

जग्गाधनी संकेत नम्बर :

ज.ध.प्र.पुर्जा नं.:-

जग्गाधनी दर्ता प्रमाण पुर्जा

कावासोती नवलपरासी

पाना -2

औठा छाप	
दायाँ	बायाँ

फोटो प्रमाणित गर्नेको दस्तखत

जग्गाधनीको दस्तखत

जग्गाधनीको नाम थर :- देउराली खानेपानी तथा सरसफाई उपभोक्ता समिति

ठेगाना :- जिल्ला:- नवलपरासी गा.वि.स./न.पा.:- देउराली वडा नं.:- ६

:-

:-

नागरीकता /दर्ता नं. :- द..न.४३१ मिति २०५५/०३/०७

कार्यालय :- नयुलेको , नवलपरासी

प्रमाण संकेत			गा.वि.स./ न.पा.	वडा नं/ मेवसा सिट	किता नं.	विवरण (घर, आवादी, इत्यादि)	ज.ध.को हकहिस्सा	मोहीको नाम थर	विगम वा वर्ग	क्षेत्रफल रोपनी/विगाहा/ढ	मोठ/पाना नं.	कैफियत विवरण	[illegible] गर्नेको दस्तखत
सा.कि.नं.	कारोबार व्यहोरा												
१,८७७	५१४८क	२०६९/०२/३०	हुप्सेकोट	९	१९६७	आवादी	एकलौटी		वारी	१-१४-१-२	२०६७		
	सट्टा पटटा			९		रैकर निजि			दोयम	९५.८१	१०७६क		
५३७	५१४८क	२०६९/०२/३०	हुप्सेकोट	९	१९६८	आवादी	पुरा		वारी	१-१३-३-१	२०६७		
	सट्टा पटटा			९		रैकर निजि			दोयम	९४७९	१०७६क		

kamala

प्रिन्ट गर्नेको दस्तखत

प्रिन्ट मिति :-२०६९/०२/३०

रजु गर्नेको दस्तखत :- 5/12/20

Lan owner certificate

Photo Signing officer

Finger print / Stamp

Deurali Water Supply and Sanitation Committee.
Address: Deurali VDC ward no. 6
Date: June 21, 1998
Registration no. (Da. Nam):431
Office: Un Identified Nawalparasi

Signage	Description of Business	Municipality / VDC	Ward Number	Sheet number	Plot number	Particular, home, Abadi, etc.	Land Rights	Tenant Name	Type of land	Area/Ropani /Anna/Paisa	Moth theli no	Remarks	Signature of Authorized
1877	5148ka	Hupsekot	9		1967	Aabadi	single		Bari	1-14-1-2	2067		
			9			private			Doyam	96581	1076 Ka		
537	5148ka	Hupsekot	9		1968	Aabadi	whole		Bari	1-13-3-1	2067		
			9			private			Doyam	94793	1076 Ka		
	Printing person Signature	Date: June 12, 2012	9			Checked by: Signature							

Note: "Aabadi" means land suitable for human settlement, "Bari" is the poorest land for agriculture, "Doyam" is 2nd highest category in land quality classification. The land area is 3-11-4-3(Ropani- anna-Paisa-Dam).

b. Letter from Hupsekot Village Development Committee for Dihidanda WTP-1 location.

Hupsekot Village Development Committee
Jhyalbas, Nawalparasi

Reference Number: 226

Date: September 17, 2019

Subject: In regard to Ownership

To,

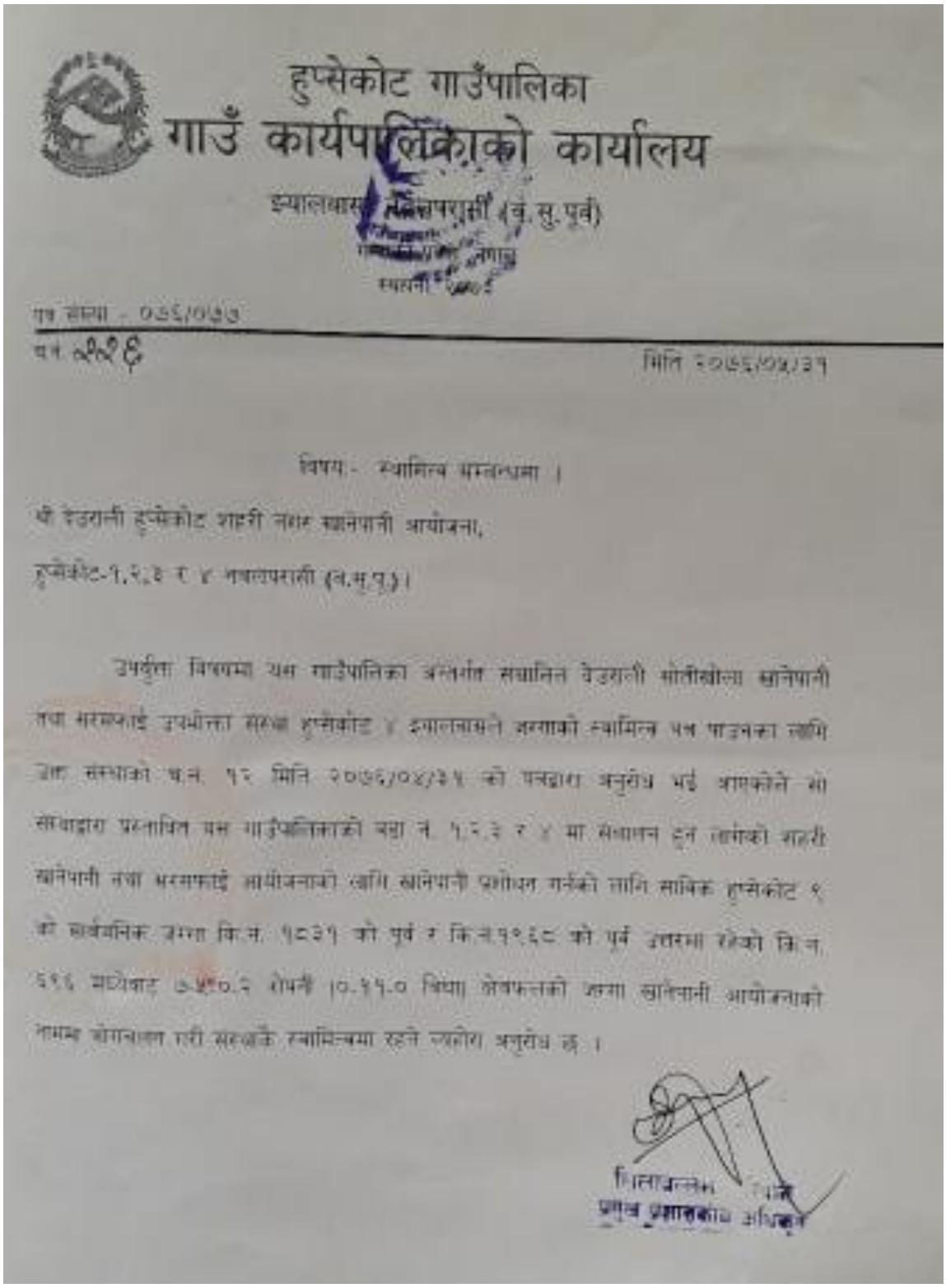
Deurali Hupsekot Water Supply & Sanitation Project,

Hupsekot 1,2, 3 & 4, Nawalparasi

In regard to the above mentioned subject, as per the request letter with reference number 12 dated 16th August, 2019 to provide the consent letter to use the land being used by Deurali Soti Khola WUSC, Hupsekot -4, Jhyalbas, this is to inform that WUSC will have jurisdiction to access and use the land area of 7-5-0-2 Ropani (0-11-0 Bigha) public/Government land located at former ward no. 9 of Hupsekot and parcel no. 696 facing North, with parcel no. 1831 in the East and parcel no. 1968 in the North that is required for the construction of water treatment plant for the Urban Water Supply & Sanitation Project proposed by WUSC that is going to be implemented for the wards 1, 2, 3 & 4 of Hupsekot Rural Municipality and it will be under the ownership of WUSC.

Lila Ballav Neupane

Officer Chief Executive



हुप्सेकोट गाउँपालिका

गाउँ कार्यपालिकाको कार्यालय

ज्यालखास, नवलपरासी (व.सु.पूर्व)

पत्र संख्या - ०७६/०७७

च.नं. ८२९

मिति २०७६/०४/३१

विषय:- स्वामित्व घोषणा ।

श्री देउराली हुप्सेकोट शहरी नल्ल खानेपानी आयोजना,

हुप्सेकोट-१,२,३ र ४ नवलपरासी (व.सु.पू.)।

उपर्युक्त विषयमा यस गाउँपालिका अन्तर्गत सञ्चालित देउराली मोतीखोला खानेपानी तथा सरसफाई उपभोक्ता समूह हुप्सेकोट ४ ज्यालखासले आफ्नो स्वामित्व यस पालिकामा रहेमा जोड संस्थाको च.नं. १२ मिति २०७६/०४/३१ को पत्रद्वारा अनुरोध भई आएकोले यो संस्थाद्वारा प्रस्तावित यस गाउँपालिकाको वडा नं. १,२,३ र ४ मा सञ्चालन हुने खानेपानी शहरी खानेपानी तथा सरसफाई आयोजनाको लागि खानेपानी प्रशोधन गर्नेको लागि साबिक हुप्सेकोट ९ को सार्वजनिक जग्गा कि.नं. १८३१ को पूर्व र कि.नं.१९६८ को पूर्व उत्तरमा रहेको कि.नं. ६९६ मध्येबाट ७.५०.२ रोपनी (०.११.० विघा) क्षेत्रफलको जग्गा खानेपानी आयोजनाको नामबाट योगबाला गरी सरक्षकै स्वामित्वमा रहने व्यहोरा अनुरोध छ ।

शिवप्रसाद [illegible]

प्रमुख प्रशासकीय अधिकृत

c. Letter from Musedanda Community Forest Committee for WTP-2 structures at Shivalaya.

Registration number 26, 8 November, 2019(2076-7-22)

Musedanda Community Forest User Committee

Hupsekot 3&4 ,Nawalpur

Letter no: 76-77 Date: 8 November, 2019(2076-7-22)

Reference no.35

Subject: Regarding the Recommendation

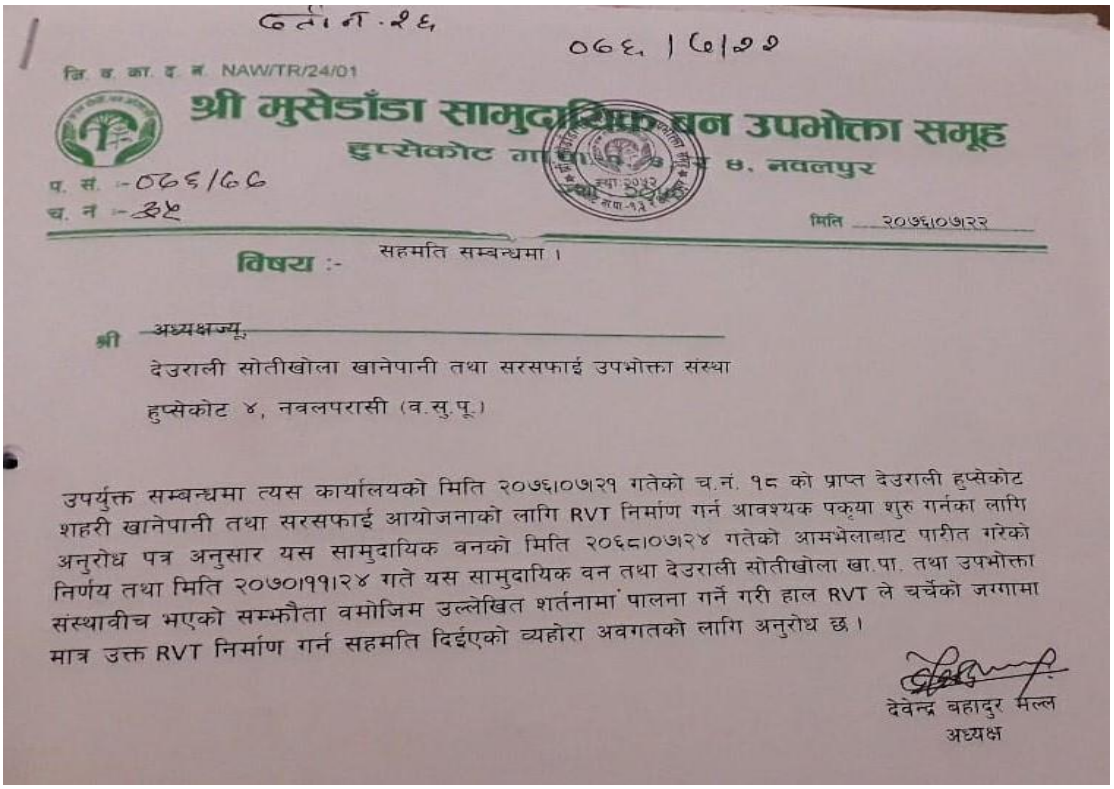
To, Chairman
Deurali Soti Kola Drinking Water Supply and Sanitation User Association
Hupsekot-4, Nawalpur

In reference to the above subject, the requested letter received from the Deurali Hupsekot Soti Khola water User and Sanitation Committee date 7 November 2019 with Reference no.18 to start the necessary process for RVT construction. As per decision made by general assembly of Forest User Committee dated 24 October, 2011 and agreement between Forest Users Committee and Deurali Soti Khola Water Users and Sanitation Association dated 8 March, 2014, Musedanda Forest User Committee has given the consent to construct the RVT within the land area occupied by existing RVT following the conditions pertaining to the agreement.

Devendra Bahadur Malla

Chairman

Note: Land is public barren land the parcel number is not available, WUSC have the permission for land using as per need. (Occupied means WUSC Compound)



दफा नं.२६

०७६।७।२२

जि. ड. का. द. नं. NAW/TR/24/01

श्री मुसेडाँडा सामुदायिक वन उपभोक्ता समूह

हुप्सेकोट गा.पा. वडा नं. ७, नवलपुर

प. सं. -०७६/७७

च. नं. -३५

मिति २०७६।०७।२२

विषय :- सहमति सम्बन्धमा ।

श्री अध्यक्षज्यू,

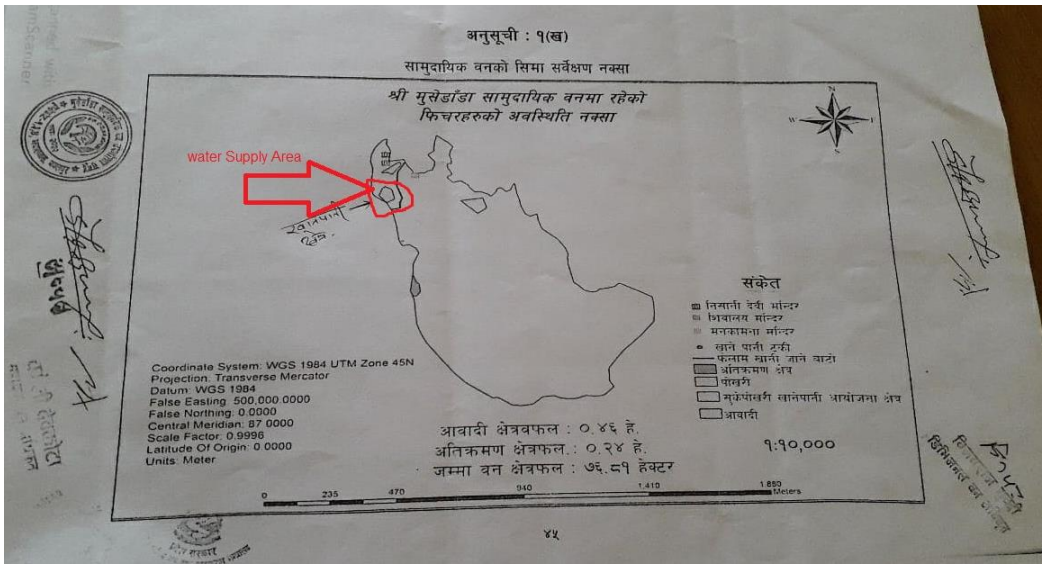
देउराली सोतीखोला खानेपानी तथा सरसफाई उपभोक्ता संस्था

हुप्सेकोट ४, नवलपरासी (व.सु.पू.)

उपर्युक्त सम्बन्धमा त्यस कार्यालयको मिति २०७६।०७।२१ गतेको च.नं. १८ को प्राप्त देउराली हुप्सेकोट शहरी खानेपानी तथा सरसफाई आयोजनाको लागि RVT निर्माण गर्न आवश्यक पर्ने शुरु गर्नका लागि अनुरोध पत्र अनुसार यस सामुदायिक वनको मिति २०६८।०७।२४ गतेको आमभेलाबाट पारीत गरेको निर्णय तथा मिति २०७०।११।२४ गते यस सामुदायिक वन तथा देउराली सोतीखोला खा.पा. तथा उपभोक्ता संस्थाबीच भएको सम्झौता बमोजिम उल्लेखित शर्तनामा पालना गर्ने गरी हाल RVT ले चर्चेको जग्गामा मात्र उक्त RVT निर्माण गर्न सहमति दिईएको व्यहोरा अवगतको लागि अनुरोध छ ।

देवेन्द्र बहादुर मल्ल
अध्यक्ष

d. Map of land area within Community Forest Shivalaya WTP-2 location.



e. Recommendation letter by Hupsekot Rural Municipality on consent to use water sources and required land for construction of intake structures

Hupsekot Rural Municipality
Office of the Rural Municipal Executive
Jhyalbas, Nawalparasi (Bardaghat Susta Purba)
Gandaki Province Nepal
ESTD 2073

Date: May 29, 2020(2077-02-16)

Letter no.2076/77

Outgoing: 1874

Subject: Regarding the Recommendation

To,

Urban Water Supply & Sanitation Project,

Panipokhari, Kathmandu

Regarding to the subject matter, it is acknowledged that Deurali Hupsekot Urban Water Supply and Sanitation Users Committee had extensive discussion and interaction with local inhabitants of source area, thereby Hupsekot Rural Municipality reached to an agreement to avail 26 lps water volume from Girubari Khola ward no-5, 5 lps water from Betai Khola located in ward no 2, 8 lps from Pathar Kola ward no 4 and 11 lps from Girubari Sump well located in ward no 4 of the municipality. Considering to the agreement, Municipality office hereby would like to grant acceptance and approval to the Users' Committee to utilize the stated volume of water sources. There is no dispute in the four sites and the surveyed sites so there is a request along with a recommendation for the implementation of the project.

Land will be made available for the construction of necessary resource structures in these places.

1. 1017.47 sq. m land for ward no. 5 Girubari Khola (26 lbs.)
2. 508.74 sq. m land for Ward No. 2 Betai Khola (5 lps.)
3. 508.74 sq. m land for Ward No. 4 Pathar Khola (8 lps)
4. 1017.47 sq. m for ward no. 4 Girubari Khola (11 lps Lift) (For the construction of sump well, guard house, generator house including other necessary structure)

Rural Municipality Chairman
Laxmi Devi Pandey

हुप्सेकोट गाउँपालिका
गाउँ कार्यपालिकाको कार्यालय

ज्यालबास, नवलपरासी (व.सु .पूर्व)
गण्डकी प्रदेश, नेपाल
स्थापना २०७३

चलानी नम्बर – ९८५४
पत्र संख्या –०७६/०७७

मिति : २०७७/०२/१६

विषयः सिफारीस सम्बन्धमा ।

श्री शहरी खानेपानी तथा सरसफाई आयोजना,

पानीपोखरी, काठमाण्डौ ।

प्रस्तुत बिषयमा हुप्सेकोट बजार स्थित देउराली हुप्सेकोट(नवलपुर) शहरी खानेपानी तथा सरसफाई उपभोक्ता संस्था र श्रोतहरुका स्थानिय उपभोत्ताहरू बिच पटक पटक छलफल तथा अन्तरक्रिया भई यस गाँउपालिका अन्तगत रहेको वडा नं ५ को गिरुबारी खोलाबाट २६ लि. प्र. से. , वडा नं.२ बेतई खोलाबाट ५ लि. प्र. से. वडा नं ४ स्थित पत्थर खोलाबाट ८ लि. प्र. से. र वडा नं..४ गिरुबारीखोला सम्पवेल बाट ११ लि. प्र. से(लिफट्) का दरले श्रोत उपलब्ध गराउने सहमति भए अनुसार उक्त श्रोतहरुबाट उल्लेखित खानेपानी आपुर्ति व्यवस्थापन गर्न कुनै किसिमको बाधा अवरोध हुने छैन। चारैवटा सर्भे गरिएको स्थानमा विवाद नहुने भएकोले आयोजना कार्यान्वयन को लागि सिफारिसका साथ अनुरोध छ ।

उक्त स्थानहरुमा श्रोतहरुका आवश्यक संरचनाहरु निमार्ण गर्न जग्गा उपलब्ध गराईने छ।

१) वडा नं ५ गिरुबारी खोला (२६ लि.प्र.से.) को लागि १०१७.४७ बर्ग मिटर
२) वडा नं.२ बेतई खोला (५ लि.प्र.से.) को लागि ५०८.७४ बर्ग मि मिटर
३) वडा नं ४ पत्थर खोला (८ लि.प्र.से.) को लागि ५०८.७४ बर्ग मि मिटर
४) वडा नं.४ गिरुबारी खोला (११ लि. प्र.से लिफट्) को लागि १०१७.४७ बर्ग मिटर (सम्पवेल,गार्ड हाउस,जेनेरेटर हाउस समेत निर्माण गर्न)

लक्ष्मी देवी पाण्डे
अध्यक्ष

फोन नं : ०७८-५९०७००
Website: www.hupsekotmun.gov.np E-mail: hupsekotrmun@gmail.com

(vi) Land for Public toilet construction at Jhyalbas

Hupsekot Rural Municipality

4 No. Ward office, Shankhadev Nawalpur(Bardaghat Susta East)

Gandaki Province, Nepal

Letter no.2076-77 Date: November 8, 2019(2076-07-22)

Referenceno.436

Shree Deurali Hupsekot Urban Water supply Project

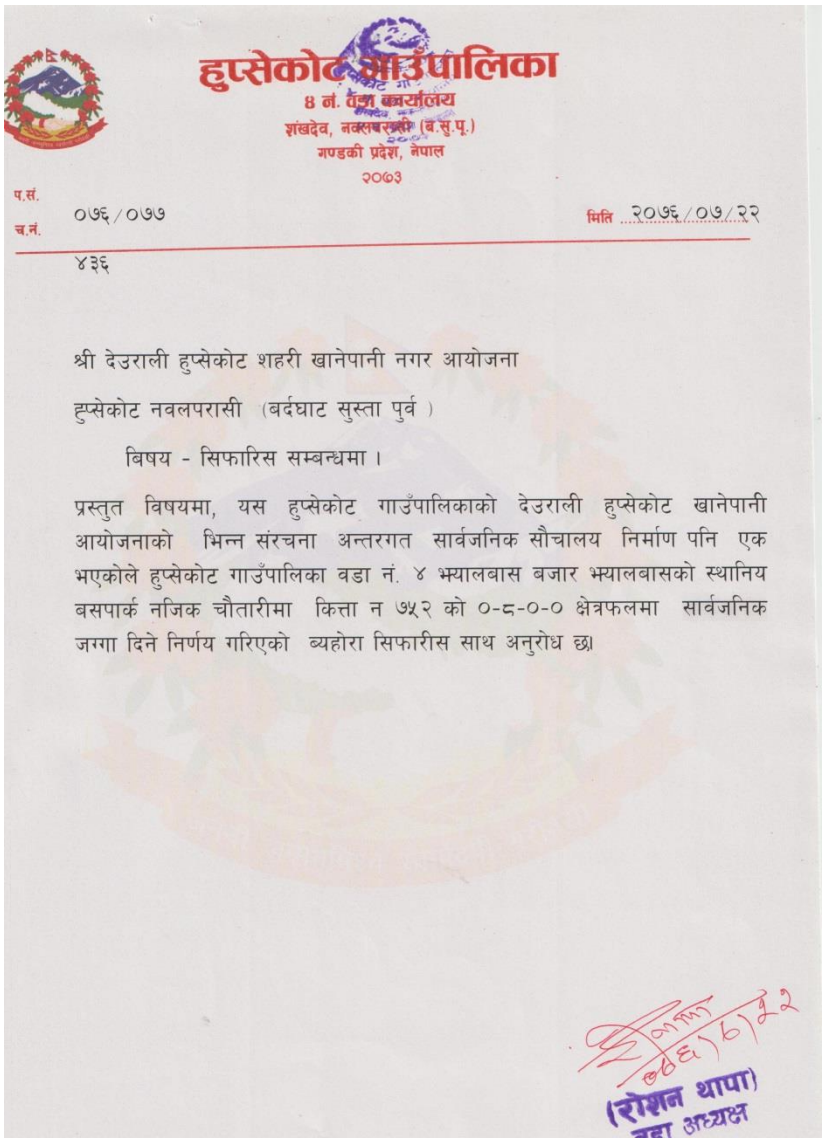
Hupsekot, Nawalparasi

Subject: Recommendation letter

In reference to the mentioned subject, the construction of a public toilet is an important component of the project. It has been recommended and decided that to provide required land (338.7m^2) out of an area 0-8-0-0 of parcel no. 752 at Jhyalbas Bazaar near local bus park in ward no. 4.

Note: This land is 0-8-0-0 is Bigha- Kattha- Dhur- Kanwa Standard. Out of this area only one kattha will be provided (1 kattha= 338.7$m^{2)}$.

Ward Chairman
Roshan Thapa



हुप्सेकोट गाउँपालिका
८ नं. वडा कार्यालय
शखदेव, नवलबरासी (ब.सु.पू.)
गण्डकी प्रदेश, नेपाल
२०७३

प.सं. ०७६/०७७
च.नं. ४३६

मिति २०७६/०७/२२

श्री देउराली हुप्सेकोट शहरी खानेपानी नगर आयोजना

हुप्सेकोट नवलपरासी (बर्दघाट सुस्ता पुर्व)

बिषय - सिफारिस सम्बन्धमा ।

प्रस्तुत विषयमा, यस हुप्सेकोट गाउँपालिकाको देउराली हुप्सेकोट खानेपानी आयोजनाको भिन्न संरचना अन्तरगत सार्वजनिक सौचालय निर्माण पनि एक भएकोले हुप्सेकोट गाउँपालिका वडा नं. ४ भ्यालबास बजार भ्यालबासको स्थानिय बसपार्क नजिक चौतारीमा कित्ता न ७५२ को ०-८-०-० क्षेत्रफलमा सार्वजनिक जग्गा दिने निर्णय गरिएको व्यहोरा सिफारीस साथ अनुरोध छ।

(रोशन थापा)
वडा अध्यक्ष

(vii) Google Map for public toilet site

(viii) Recommendation letter for Public toilet at ward no 2

Hupsekot Rural Municipality
2 No. Ward office, (Bardaghat Susta East)
Gandaki Province, Nepal

Letter no.2076-77 Date: November 8, 2019(2076-07-22)
Referenceno.13

Shree Deurali Hupsekot Urban Water supply Project
Hupsekot Nawalparasi

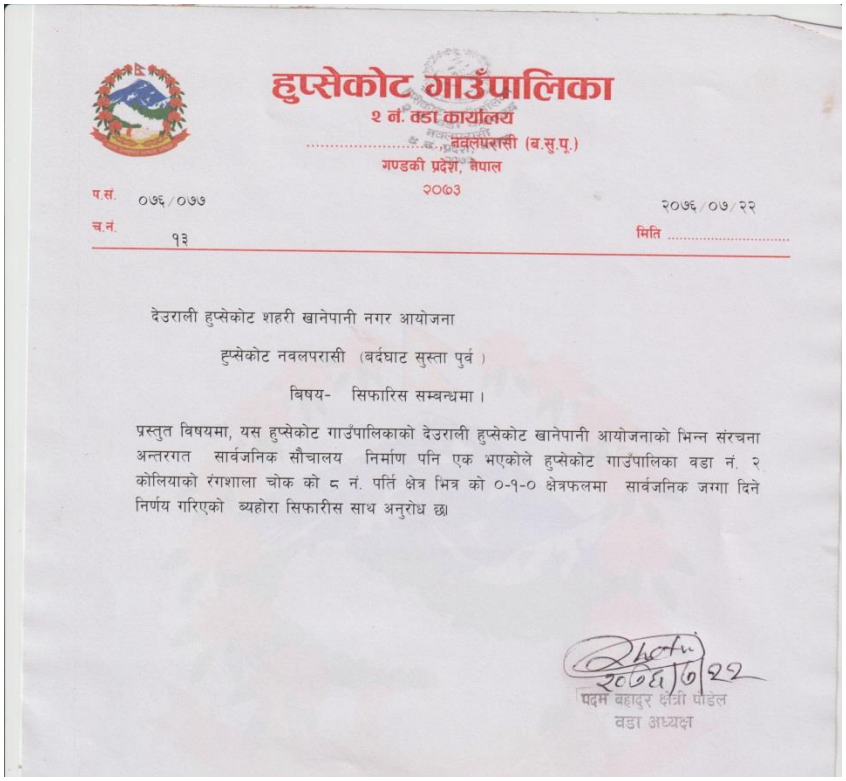
Subject: Recommendation letter

In reference to the mentioned subject, the construction of a public toilet is an important component of the project. The Hupsekot Rural Municipality ward no .2 has been recommended and decided that to provide an area 0-1-0-0(338.7m^2) of barren land at Koliya Stadium chock within the boundary of 8 number barren land.

Note: This land is 0-8-0-0 is Bigha- Kattha- Dhur- Kanwa Standard. Out of this area only one kattha will be provided (1 kattha= 338.7m2).

Ward Chairman

Padam Bahadur Chhetri Poudel



हुप्सेकोट गाउँपालिका
२ नं. वडा कार्यालय
नवलपरासी (ब.सु.पू.)
गण्डकी प्रदेश, नेपाल
२०७३

प.सं. ०७६/०७७
च.नं. १३
२०७६/०७/२२
मिति .....

देउराली हुप्सेकोट शहरी खानेपानी नगर आयोजना

हुप्सेकोट नवलपरासी (बर्दघाट सुस्ता पुर्व)

बिषय- सिफारिस सम्बन्धमा ।

प्रस्तुत विषयमा, यस हुप्सेकोट गाउँपालिकाको देउराली हुप्सेकोट खानेपानी आयोजनाको भिन्न संरचना अन्तरगत सार्वजनिक सौचालय निर्माण पनि एक भएकोले हुप्सेकोट गाउँपालिका वडा नं. २ कोलियाको रंगशाला चोक को ८ नं. पर्ति क्षेत्र भित्र को ०-१-० क्षेत्रफलमा सार्वजनिक जग्गा दिने निर्णय गरिएको व्यहोरा सिफारीस साथ अनुरोध छ।

२०७६/७/२२
पदम बहादुर क्षेत्री पौडल
वडा अध्यक्ष

(ix) Sump well construction on the River Bank (Girubari Khola)

Hupsekot Rural Municipality
4. No Ward office
Shankhadev Nawalparasi (Bardaghat Susta East)
Gandaki province, 2073

Letter no.076/77 Date: October 16, 2018(2075-6- 30)

Dispatch no.322

In reference to the mentioned subject, the public barren land (River Bank) at district Nawalparasi Hupsekot Rural Municipality ward no 4(formerly District Nawalparasi Hupsekot ward no 9) has been recommended for necessary process forwarding as per rules and regulation for construction of sump well for Deurali Hupsekot Urban water supply project.

Roshan Thapa
Ward Chairman ward no.4
Padam Bahadur Chhetri Poudel

हुप्सेकोट गाउँपालिका

वडा कार्यालय

शंखदेव, नवलपुरासी (ब.सु.पू.)

गण्डकी प्रदेश, नेपाल

२०७३

प.सं. ०७६/०७७

च.नं. ४२८

मिति २०७५/०६/३०

श्री देउराली हुप्सेकोट खानेपानी नगर आयोजना

हुप्सेकोट नवलपरासी (ब.सु.पु)

विषय :- सिफारिस सम्बन्धमा ।

उपरोक्त सम्बन्धमा जि.न.प.साबिक हुप्सेकोट -९ हाल जि.न.प. (ब.सु.पु.)हुप्सेकोट गाउँपालिका वडा नं. -४ मा पर्ने सार्वजनीक आवश्यक जग्गामा (खोलाको बगर) देउराली हुप्सेकोट खानेपानी आयोजनाको सम्पवेल निमार्णको लागी नियमानुसार आवश्यक प्रकृया अगाडी बढाई दिन हुन सिफारिस गरिएको व्यहोरा अनुरोध ।

(रोशन थापा)
वडा अध्यक्ष

(x) Recommendation letter for office building

Hupsekot Rural Municipality
Village Executive Office
Jhyalbas, Nawalparasi
Gandaki Province, Nepal
Estd 2073

Letter no.2076-77 Date: November 10, 2019(2076-07-24)
Referenceno.465

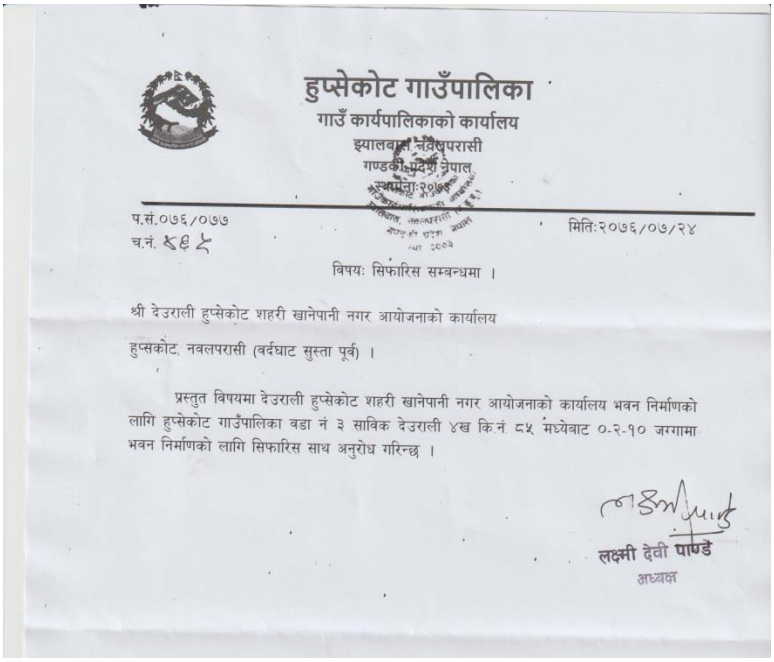
Shree Deurali Hupsekot Urban Water supply Project office
Hupsekot Nawalparasi (Bardaghat Susta East)

Subject: Recommendation letter

In reference to the mentioned subject, Hupsekot Rural Municipality has recommended and decided to provide an area 0-2-1-0 (693.35 m^2) of land from parcel no.85 for the construction of office building of Shree Deurali Hupsekot Urban Water supply users committee at ward no. 3 (formerly Deurali 4 kha parcel no.85).

Chairman
Hupsekot Rural Municipality

Note: The available land is 0-2-1-0 is Bigha- Kattha- Dhur- Kanwa. (1 kattha= 338.7m^2).



हुप्सेकोट गाउँपालिका
गाउँ कार्यपालिकाको कार्यालय
झ्यालबास, नवलपरासी
गण्डकी प्रदेश, नेपाल

प.सं.०७६/०७७
च.नं. ९९८

मितिः२०७६/०७/२४

विषयः सिफारिस सम्बन्धमा ।

श्री देउराली हुप्सेकोट शहरी खानेपानी नगर आयोजनाको कार्यालय
हुप्सेकोट, नवलपरासी (बर्दघाट सुस्ता पूर्व) ।

प्रस्तुत विषयमा देउराली हुप्सेकोट शहरी खानेपानी नगर आयोजनाको कार्यालय भवन निर्माणको लागि हुप्सेकोट गाउँपालिका वडा नं ३ साविक देउराली ४ख कि.नं ८५ मध्येबाट ०-२-१० जग्गामा भवन निर्माणको लागि सिफारिस साथ अनुरोध गरिन्छ ।

लक्ष्मी देवी पाण्डे
अध्यक्ष

(xi) WUSC Registration Certificate

Applicable to rules -6, sub rules 1
Hupsekot Rural Municipality
Office of the Rural Municipal Executive
Jhyalbas, Nawalparasi (Bardaghat Susta Purba)

User committee registration certificate

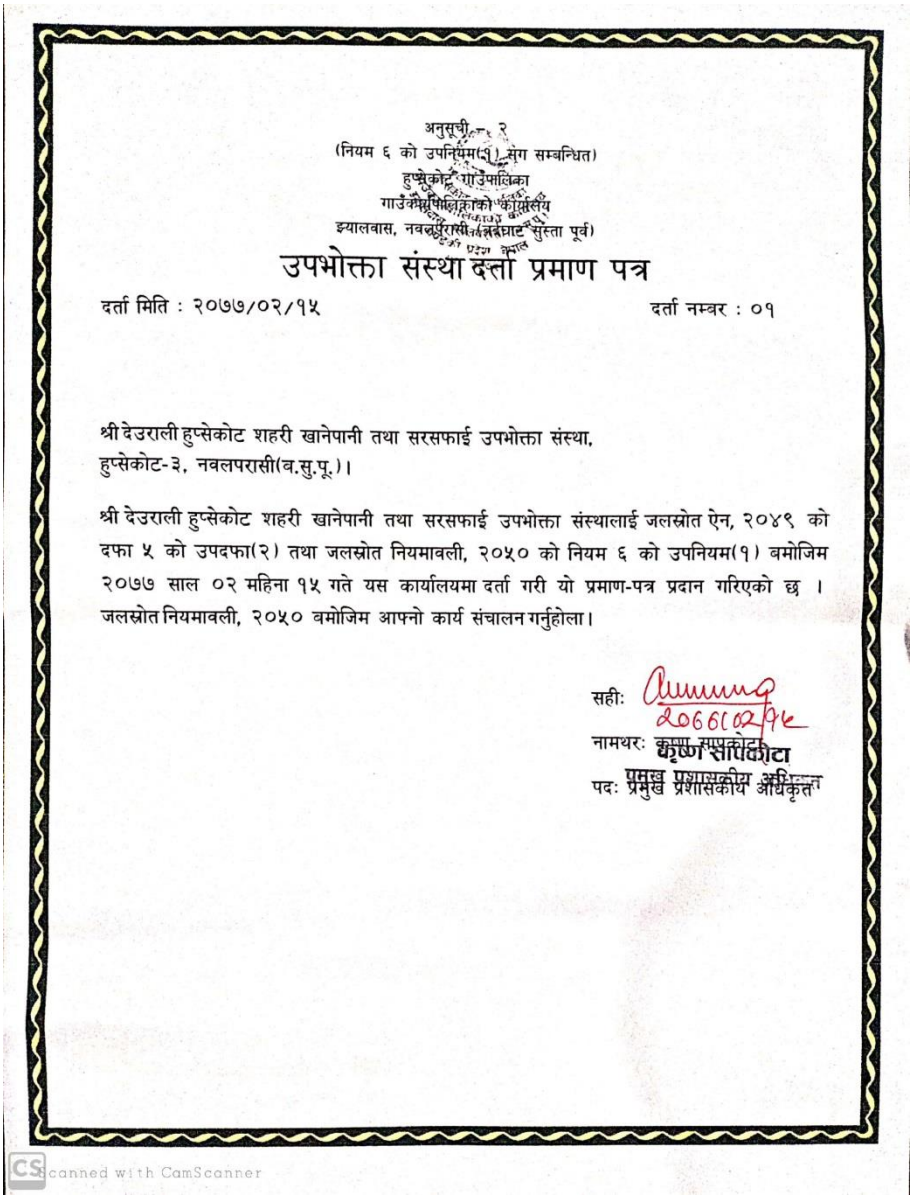
Registration no.197 Registration no.01

Date: 2077-2-15 (May 28, 2020)

To,
Deurali Hupsekot Urban Water Supply and Sanitation User Association
Hupsekot, Nawalparasi (Bardaghat Susta Purba)

This registration certificate is provided to **Deurali Hupsekot Urban Water Supply and Sanitation User Association** date May 28, 2020(2077-2-15) pertaining to the Water Resource Act 2049, clause No.5, sub-clause (2) and Water Resource Registration 2050 Rules, clause no 6, sub sub-clause (1). Execution of works should be done as per Water Resource Act 2049 and Water Regulation Rules 2050.

Signature:
Name: Krishna Sapkota
Designation: Local Development Officer
Date: 2077-2-15



अनुसूची-२
(नियम ६ को उपनियम(१) सँग सम्बन्धित)
हुप्सेकोट गाउँपालिका
गाउँकार्यपालिकाको कार्यालय
इयालवास, नवलपुरासी(बर्दघाट सुस्ता पूर्व)

उपभोक्ता संस्था दर्ता प्रमाण पत्र

दर्ता मिति : २०७७/०२/१५ दर्ता नम्बर : ०१

श्री देउराली हुप्सेकोट शहरी खानेपानी तथा सरसफाई उपभोक्ता संस्था,
हुप्सेकोट-३, नवलपरासी(व.सु.पू.)।

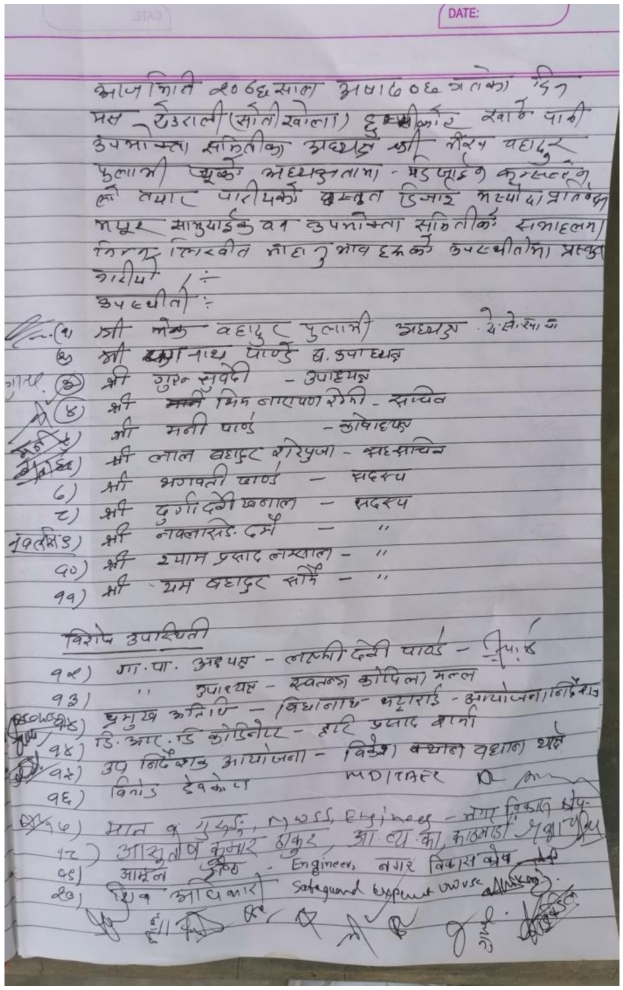
श्री देउराली हुप्सेकोट शहरी खानेपानी तथा सरसफाई उपभोक्ता संस्थालाई जलस्रोत ऐन, २०४९ को दफा ५ को उपदफा(२) तथा जलस्रोत नियमावली, २०५० को नियम ६ को उपनियम(१) बमोजिम २०७७ साल ०२ महिना १५ गते यस कार्यालयमा दर्ता गरी यो प्रमाण-पत्र प्रदान गरिएको छ । जलस्रोत नियमावली, २०५० बमोजिम आफ्नो कार्य संचालन गर्नुहोला।

सही: 2066/02/14
नामथर: कृष्ण सापकोटा
पद: प्रमुख प्रशासकीय अधिकृत

Annex-2: Minutes of Meeting

a. 21 June 2019 Stakeholders Meeting

MINUTES OF MEETINGS



DATE:

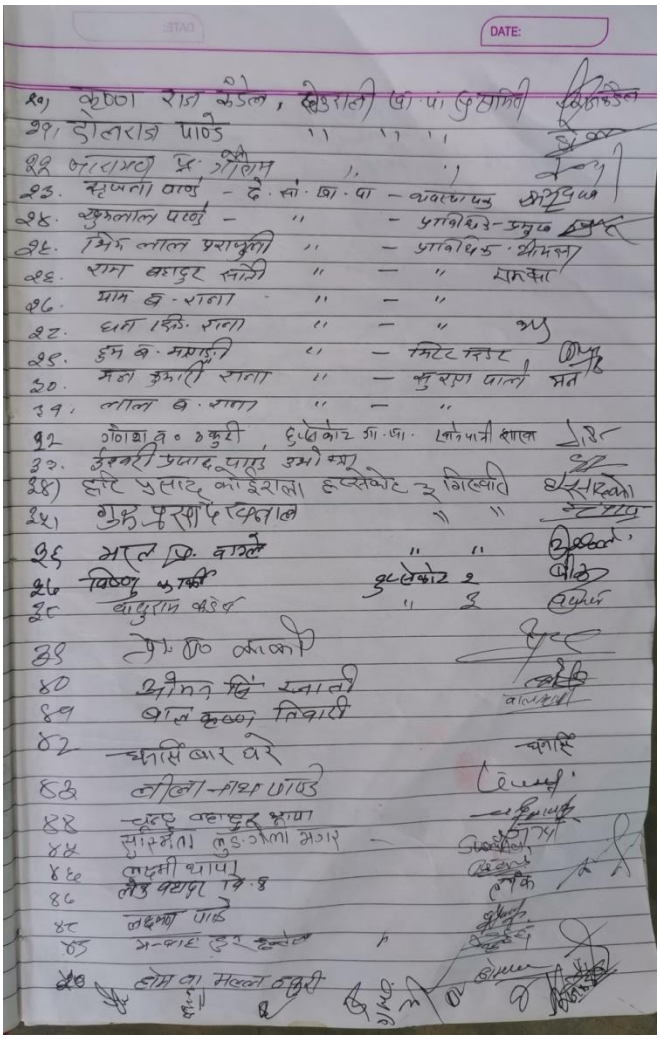
आज मिति २०७६ साल असार ०६ गतेका दिन यस ऐरानी (सोतीखोला) [illegible] खानेपानी उपभोक्ता समितिको अध्यक्ष श्री लोक बहादुर पुलामी ज्यूको अध्यक्षतामा मड जाइन्ट कन्सल्टेन्टले तयार पारीएको प्रस्तुत डिजाइन [illegible] प्रतिवेदन [illegible] र उपभोक्ता समितिको [illegible] तपसिल लेखिए बमोजिम महानुभावहरूको उपस्थितिमा प्रस्तुत गरियो।

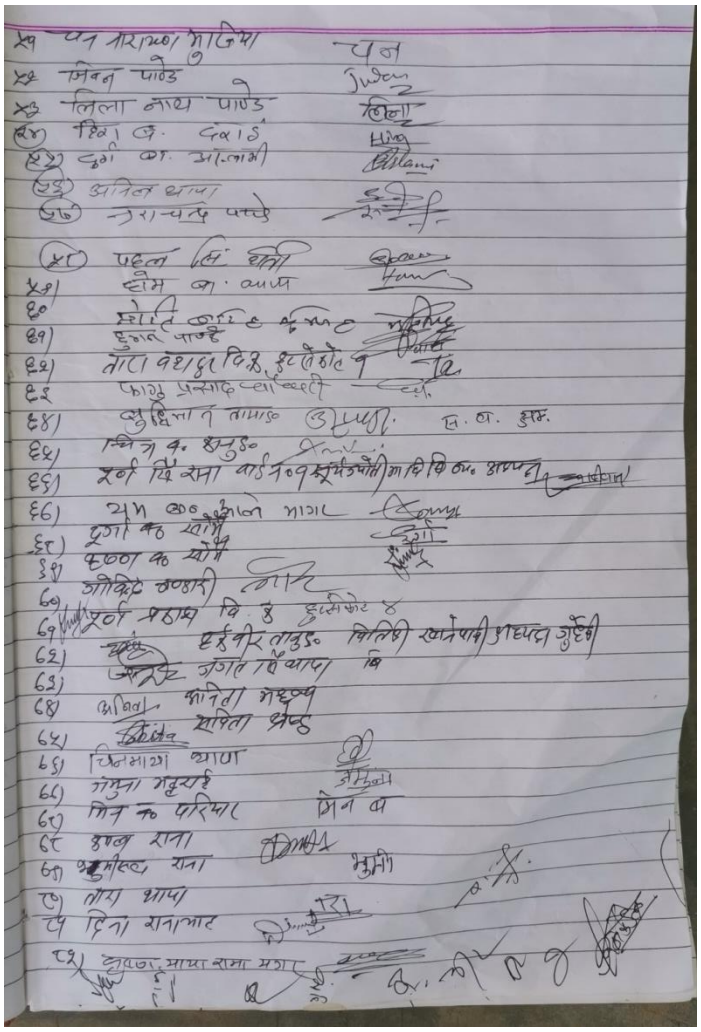
उपस्थिती :

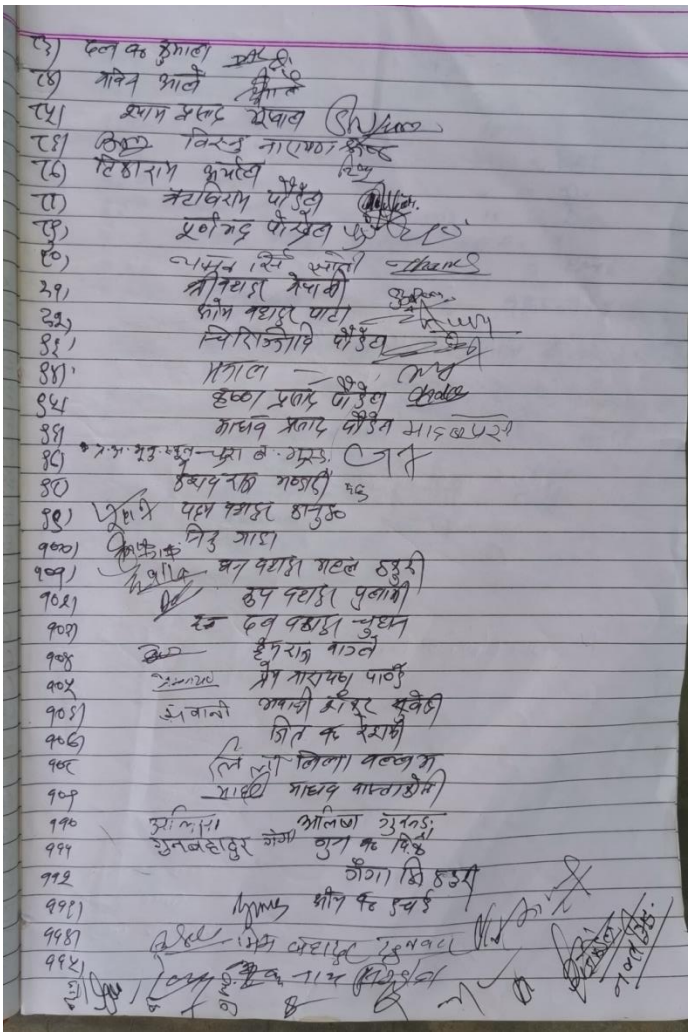
1. श्री लोक बहादुर पुलामी अध्यक्ष
2. श्री [illegible]नाथ पाण्डे व. उपाध्यक्ष
3. श्री गुरु सुवेदी - उपाध्यक्ष
4. श्री [illegible] नारायण [illegible] - सचिव
5. श्री मनी पाण्डे - कोषाध्यक्ष
6. श्री लाल बहादुर [illegible] - सहसचिव
7. श्री भगवती पाण्डे - सदस्य
8. श्री दुर्गा देवी खनाल - सदस्य
9. श्री [illegible] - "
10. श्री श्याम प्रसाद [illegible] - "
11. श्री यम बहादुर [illegible] - "

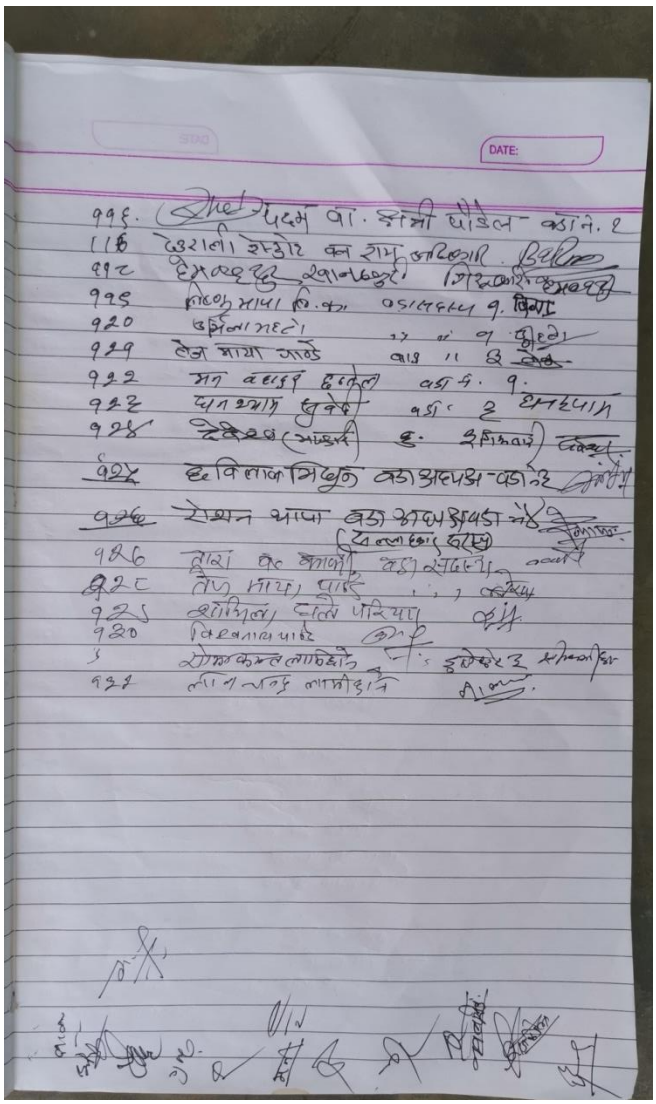
विशेष उपस्थिती

12) गा.पा. अध्यक्ष - लक्ष्मी देवी पाण्डे - [illegible]
13) " उपाध्यक्ष - स्वतन्त्र कोपिला मल्ल
14) प्रमुख अतिथि - बिधानाथ [illegible] - आयोजना निर्देशक
14) डि.आर.डि कोडिनेटर - हरि प्रसाद शर्मा
15) उप निर्देशक आयोजना - [illegible]
16) विनोद [illegible] MD/TAEC
17) [illegible], MWSS Engineer - नगर विकास कोष
18) आशुतोष कुमार ठाकुर, आ.व्य.का, काठमाडौं [illegible]
19) आमूल [illegible] - Engineer, नगर विकास कोष
20) शिव अधिकारी Safeguard Expert UWSSP [illegible]









English Translation for the Minutes of Meeting

Detail design report presentation and a public mass meeting were conducted under the chairmanship of Mr. Mek Bahadur Pulami, Chairman of Deurali Hupsekot WUSC date on 21 June 2019. In the presence of the following mentioned participants, similarly, discussions on the following mentioned agenda and decisions were made accordingly under the consent of all.

S. No.	Name of Participants	Designation
1.	Mr. Mek Bahadur Pulami	Chairman, Deurali Hupsekot WUSC
2.	Mr. Phaganath Pandey	Senior Vice chairman WUSC
3.	Mr. Guru Subedi	Vice chairman
4.	Mr. Bhim Narayan Regmi	Secretary WUSC
5.	Ms. Mani Pandey	Treasurer
6.	Mr. Lalbahadur Serpuja	Deputy Secretary WUSC
7.	Mrs . Bhagawati Pandey	Member
8.	Mrs. Durga Devi Khanal	Member
9.	Mr. Nawal Singh Damai	Member
10.	Mr. Shyam Prasad Lamsal	Member
11.	Mr. Yam Bahadur Sarki	Member
	Special participants	
12.	Mrs. Laxmi Devi Pandey	Chairman Rural Municipality
13.	Mrs . Sotantra Kopila Malla	Vice Chairman Rural Municipality
14.	Mr. Bidhya Nath Bhattrai	Chief guest/project director
15.	Mr. Hari Prasad Sharma	DRTAC coordinator
16.	Mr. Bikesh Wadhanthachhya	Deputy Director PMO
17.	Mr. Binod Devkota	MD / TAEC
18.	Mr. Man Bahadur Gurung	WSS Engineer TDF
19.	Mr. Asutosh Kumar Thakur	Engineer PMO
20.	Mr. Shiva Adhikari	Safeguard Expert
21.	Krishna Raj Kandel	Deurali
22.	Dol Raj Pandya	Deurali
23.	Narayan Prasad Gautam	Deurali
24.	Srijana Pandya	Deurali
25.	Khum Lal Pandya	Deurali
26.	Bhim Lal Parajuli	Deurali
27.	Ram Bahadur Soti	Deurali
28.	Yam Bahadur Rana	Deurali
29.	Dhan Sing Rana	Deurali
30.	Hum Bahadur Masangi	Deurali
31.	Man Kumari Rana	Deurali
32.	Lal Bahadur Rana	Deurali
33.	Ganesh Bdr. Thakuri	Hupsekot
34.	Ishwori Pd. Pandya	Hupsekot
35.	Hari Pd. Koirala	Hupsekot
36.	Guru Pd. Khanal	Hupsekot
37.	Bharat Pd. Wagle	Hupsekot
38.	Bishnu Karki	Hupsekot
39.	Baburam Kandel	Hupsekot

S. No.	Name of Participants	Designation
40.	Prem Bdr. Karki	
41.	Oman Sing Rajati	
42.	Balkrishna Tiwari	
43.	Dhan Sing Bdr Ghale	
44.	Lila Nath Pandya	
45.	Chandra Bdr. Thapa	
46.	Susmita Langeli Magar	
47.	Laxmi Thapa	
48.	Lek Bdr. B.K	
49.	Laxman Pandya	
50.	Man Bdr. Bhujel	
51.	Hom Bdr. Malla Thakuri	
52.	Chan narayan Mukhiya	
53.	Jivan Pandya	
54.	Lila Nath Pandya	
55.	Hira Bdr. Darai	
56.	Durga Bdr. Aslami	
57.	Anil Thapa	
58.	Nara chandra Oandya	
59.	Pahal Sing Gharti	
60.	Hom Bdr. Thapa	
61.	Moti Bdr. Kumal	
62.	Fagu Pdr. Chaudhary	
63.	Buddhi Man Tamang	
64.	Chitra Bdr. Kanung	
65.	Purna Sing RANA	
66.	Yam Bdr. Alemagar	
67.	Humaan Pandya	
68.	Tara Bdr. B.K.	
69.	Durga Bdr. Sorme	
70.	Krishna Bdr. Sorme	
71.	Govinda Bhandari	
72.	Purna Prakash B.K.	
73.	Harka Bir Tamang	
74.	Jagat Sing Thapa	
75.	Anita Mahato	
76.	Sabita Shrestha	
77.	Chin maya Thapa	
78.	Jamuna Thapa	
79.	Min Bdr. Pariyar	
80.	Kamal Rana	
81.	Bhumishwo Rana	
82.	Tara Thapa	
83.	Dina Rnabhat	
84.	Krishnamaya Ranamagar	
85.	Dal Bdr. Kumal	
86.	Nabin Ale	

S. No.	Name of Participants	Designation
87.	Shyam Pdr. Bhusal	
88.	Bishnu narayan Shrestha	
89.	Tika Ram Aryal	
90.	Rishiram Poudyal	
91.	Purnachandra Pokheral	
92.	Yaman Sing Jyoti	
93.	Shree Bdr. Nepali	
94.	Om Bdr. Pata	
95.	Chirinjivi Poudyal	
96.	Maka Poudyal	
97.	Krishna Pdr. Poudyal	
98.	Madhav Pdr. Poudyal	
99.	Chura Bdr. Bhusung	
100.	Keshav RAJ Bhandari	
101.	Padam Bdr. Kanung	
102.	Minu Gaha	
103.	Dhan Bdr. Malla Thakuri	
104.	Rup Bdr. Pulami	
105.	Dal Bdr. Chauhan	
106.	Hem Raj Wagle	
107.	Prem Narayan Pandya	
108.	Bhawanishankher Subedi	
109.	Jit Bdr. Raimajhi	
110.	Lila Ballav	
111.	Madhav Bastakoti	
112.	Alisha Gurung	
113.	Gun Bdr. B.K.	
114.	Ganga Nisthuri	
115.	Om Bdr. Ichai	
116.	Bhim Bdr. Danuwar	
117.	Tek Nath Sigdel	
118.	Padam Bdr. Chetri Poudyal	
119.	Balram Poudyal	Deurali
120.	Hem Bdr. Khan Thakuri	
121.	Bishnumaya B.K.	
122.	Urmila Mahato	
123.	Tejmaya Pandya	
124.	Man Bdr. Chantel	
125.	Ghanashyam Subedi	
126.	Dekeshwor Bhandari	
127.	Chabilal Mighun	
128.	Roshan Thapa	
129.	Tara Bdr. Karki	
130.	Tejmaya Pandya	
131.	Sharmila Ghale Pariyar	
132.	Bishow Nath Pandya	
133.	Shomkanta Lamichhane	

S. No.	Name of Participants	Designation
134.	Lalchandra Lamichhane	

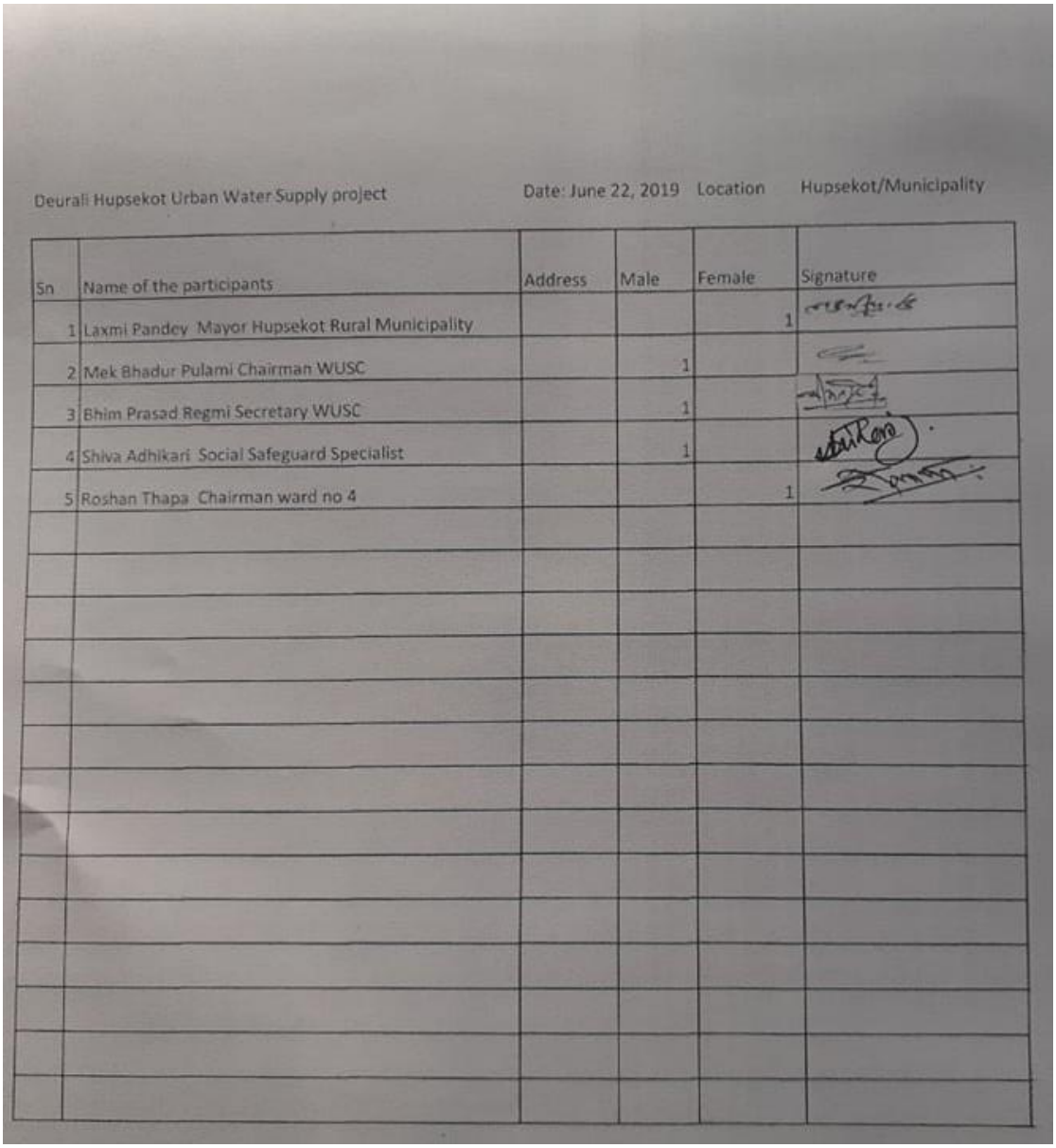
Proposals:-

1. Presentation of Detailed Design Report of Deurali Soti Khola Hupsekot Water Supply Project
2. Acquisition/Possession of the required land for the project
3. Environment effect due to construction works of the project
4. Selection of the project and it's estimate
5. Preparation of final report

Decisions:-

1. The Deurali Soti Khola Water Users Association of the Project, selected as per policy of the Urban Water Supply and Sanitation (sector) project, shall provide required land for construction of different components of water supply and Sanitation project and a contribution of 30% of the estimated cost inclusive of 5% upfront cash to be collected from each household and 25% loan from TDF. The design report prepared and presented by TAEC-ICON JV based on pumping of water from Girubari Khola sump well as well as collection of water from existing water sources-Patthar Khola, Betai Khola in presence of WUSC, local stakeholders and the Chairperson of the Rural Municipality. It was decided after thorough discussion on queries and solutions of the stakeholders to move further ahead.
2. After discussion on proposal No2, the required land for the proposed components like Water Treatment Plant (WTP), Water Tank (RVT), Intake works etc. of this project shall be made available as per ADB safeguard policy by the WUA or the rural municipality.
3. It was decided after discussion on the proposal No 3 that the environmental effect due to construction of required components/units, extraction of stream sources, pipeline works shall be assessed and an Initial Environmental Examination Report shall be prepared in consultation and discussion with all the stakeholders with adequate mitigation measures to minimize the negative impact.
4. After discussion on the proposal No4, It was decided to proceed further as 5% of the cost of proposed project components to be constructed considering existing 8 sources and an additional source (Sump well on the bank of Girubari Khola at Chapari koura & Badrer Kholsi) shall be borne by the users of each household. The WUSC has made commitments to collect the said amount within 2 months.
5. It was decided that the design consultant TAEC-ICON Jv should go ahead after discussion on the queries raised during the presentation of social profile surveys, environmental impact surveys, and social/environmental safeguard assessment surveys.

b. June 22, 2019 Attendance sheet of Meeting



Deurali Hupsekot Urban Water Supply project Date: June 22, 2019 Location Hupsekot/Municipality

Sn	Name of the participants	Address	Male	Female	Signature
1	Laxmi Pandey Mayor Hupsekot Rural Municipality			1	
2	Mek Bhadur Pulami Chairman WUSC		1		
3	Bhim Prasad Regmi Secretary WUSC		1		
4	Shiva Adhikari Social Safeguard Specialist		1		
5	Roshan Thapa Chairman ward no 4			1	

c. Meeting minutes of 30 October 2018

Nawalparasi

DATE:

आज मिती २०७५।०७।१३ गतेका दिन जिल्ला नवलपुर हुप्सेकोट गाउँपालिका कार्य क्षेत्र भित्र स्वच्छ खानेपानी तथा सरसफाई कार्यक्रम अहर्ता खानेपानी आयोजनाको लागि, यस श्री [illegible] खोला खानेपानी तथा सरसफाई उपभोक्ता संस्थाका अध्यक्ष श्री भेक बहादुर पुलामी ज्यूको अध्यक्षतामा, गाउँपालिकाका अध्यक्ष श्री [illegible] पाण्डे उपाध्यक्ष श्री स्वतन्त्र कोपिला मगर, गाउँपालिकाको कार्यकारी अधिकृत श्री हरि प्र. गिरी ज्यू, एक कन्सल्टेन्ट प्रा.लि.का मेनेजिङ डाइरेक्टर श्री विनोद देवकोटा ज्यू, सामाजिक परिचालक श्री शिव अधिकारी ज्यू समेतको समुपस्थितिमा उपभोक्ता संस्थाका पदाधिकारी सदस्य ज्यूहरूको उपस्थितिमा निम्न प्रस्ताव माथि छलफल गरी निर्णय पारित गरियो ।

१- अध्यक्ष श्री- भेक बहादुर पुलामी
२- वरिष्ठ उपाध्यक्ष श्री- [illegible]नाथ पाण्डे
३- उपाध्यक्ष श्री- गुरु प्रसाद सुवेदी (सु. [illegible])
४- सचिव श्री- भिम नारायण रेग्मी
५- सह सचिव श्री- लाल बहादुर थोरपुजा
६- कोषाध्यक्ष श्री- मोति पाण्डे
७- सदस्य श्री- नवल सिं [illegible]
८- से. श्री- दुर्गा देवी खनाल
९- से. श्री- भगवती पाण्डे
१०- से. श्री- श्याम प्रसाद लम्साल
११- से. श्री- धन बहादुर [illegible]

१२, सुरक्षा समिति सचिव
१३, सेनाका लेखापाल श्रीजना पाण्डे
प्र. सुरक्षा समिति सदस्य श्री शुभलाल पाण्डे
१५, श्री कृष्ण राज केडेल सदस्य
१६- श्री महेन्द्र खड्याल
(विशेष उपस्थित)
१७, हुमेकोट गाउँपालिकाका अध्यक्ष श्री लक्ष्मी पाण्डे
१८, " , उपाध्यक्ष श्रीमती कमला मल्ल
१९ प्रमुख प्रशासकीय अधिकृत श्री हरि मोतानी
२०, थप सैन्यका संरक्षक अधिकृत श्री प्रेम बहादुर कार्की
२१, कन्सल्टेन्ट ग्रुप श्री विनोद देवकोटा
२२- मानव अधिकार आयोग श्री शिव कार्की
२३, मिश्र वं. आरक्षक फार्म इन्डिया सेइन
२४, श्री कविलाल मिश्र वडा अध्यक्ष वडा नं. २
२५ श्री राम बहादुर लामा
२६, नव कर्मचारी श्री राम बहादुर राना

60

आजको प्रस्ताव तथा निर्णय

आजका प्रस्तावहरु

प्रस्ताव नं १ शहरी खानेपानी आयोजनाको जानकारी सम्बन्धमा ।

प्रस्ताव नं २, प्रस्तावित आयोजनाको स्थलगत निरीक्षण सम्बन्धमा

प्रस्ताव नं ३ - सेवा क्षेत्र निर्धारण सम्बन्धमा

प्रस्ताव नं ४ - आवश्यक पर्ने जग्गा व्यवस्थापन तथा उपलब्ध गराउने तथा सामाजिक सुरक्षा सम्बन्धमा ।

प्रस्ताव नं ५ आयोजना तयार हुनेको सामाजिक तथा प्राविधिक सर्भे सम्बन्धमा ।

प्रस्ताव नं ६ आयोजनाको कार्य गर्दा आइपर्ने वातावरण सम्बन्धमा ।

प्रस्ताव नं ७ हाल भैरहेको पुरानो संरचनाको पाइप लाईन सम्बन्धमा ।

निर्णय नं १

प्रस्ताव नं १ माथी छलफल गर्दा परामर्श दाताको टोलीले शहरी खानेपानी आयोजनाको जानकारी गराउने सिलसिलामा ५% नगद र जनश्रम संकलन ४५% T.D.F. (Town Development Found) ऋण ५०% नेपाल सरकार बाट अनुदान सहयोग मा आयोजना संचालन हुने कुरा जानकारी गराइयो ।

निर्णय नं २ आयोजनाको सम्पूर्ण डिजाइनका लागी - परामर्श कामको तर्फ बाट डिजाइन इन्जिनियर श्री - विनोद चन्द्र केसकोटा, सामाजीक [illegible] श्री शिव अधिकारी र सम्बन्धित गाउँ पालिका हुँदै गाउँपालिका को सहयोग, गाउँपालिका उपाध्यक्ष, स्थानीय कोपिला [illegible] संस्था संरक्षक प्रेमबहादुरको, संस्थाका पदाधिकारी [illegible] समेत प्रत्यक्ष उपस्थितिमा हाल संचालनमा आइरहेका [illegible] खोला, [illegible] खोला, पत्थर खोला [illegible] जाँदै संचालन भइरहेका पानी रहेको प्रयोग [illegible] निरीक्षण भयो आवश्यक जानकारी प्राप्त भयो।

निर्णय नं ३
प्रस्तावित भावी [illegible] देहायका स्थान हरु आयोजना ले समेटने छन्,
वडा नं ३ सम्पूर्ण क्षेत्र बेलबार, जुगेपानी
वडा नं २ कौलिया, गुहेरी तल्लो समथर भाग (वन रहेको क्षेत्र)
वडा नं ५ को सम्पूर्ण क्षेत्र
वडा नं ६ को [illegible] नक्लोडिको [illegible] दिइरहेको क्षेत्र.

निर्णय नं ४ प्रस्तावित भावी [illegible] हाल भइरहेको डिपो वडा नं ४ को [illegible] टंकी निर्माण को लागी आवश्यक पर्ने जग्गाको आवश्यक कागजात लालपुर्जा गाउँपालिका बाट सिफारिस लिई आयोजना को लागी अन्य स्थानहरुमा कार्यालय भवन,

सार्वजनिक शौचालय निर्माण स्थल आवश्यक भएको जग्गा सामाजिक सुरक्षा समिति कमेटीमा हुँदै लाई आएर नपाई जग्गा उपलब्ध गराउने निर्णय भयो ।

निर्णय नं ५

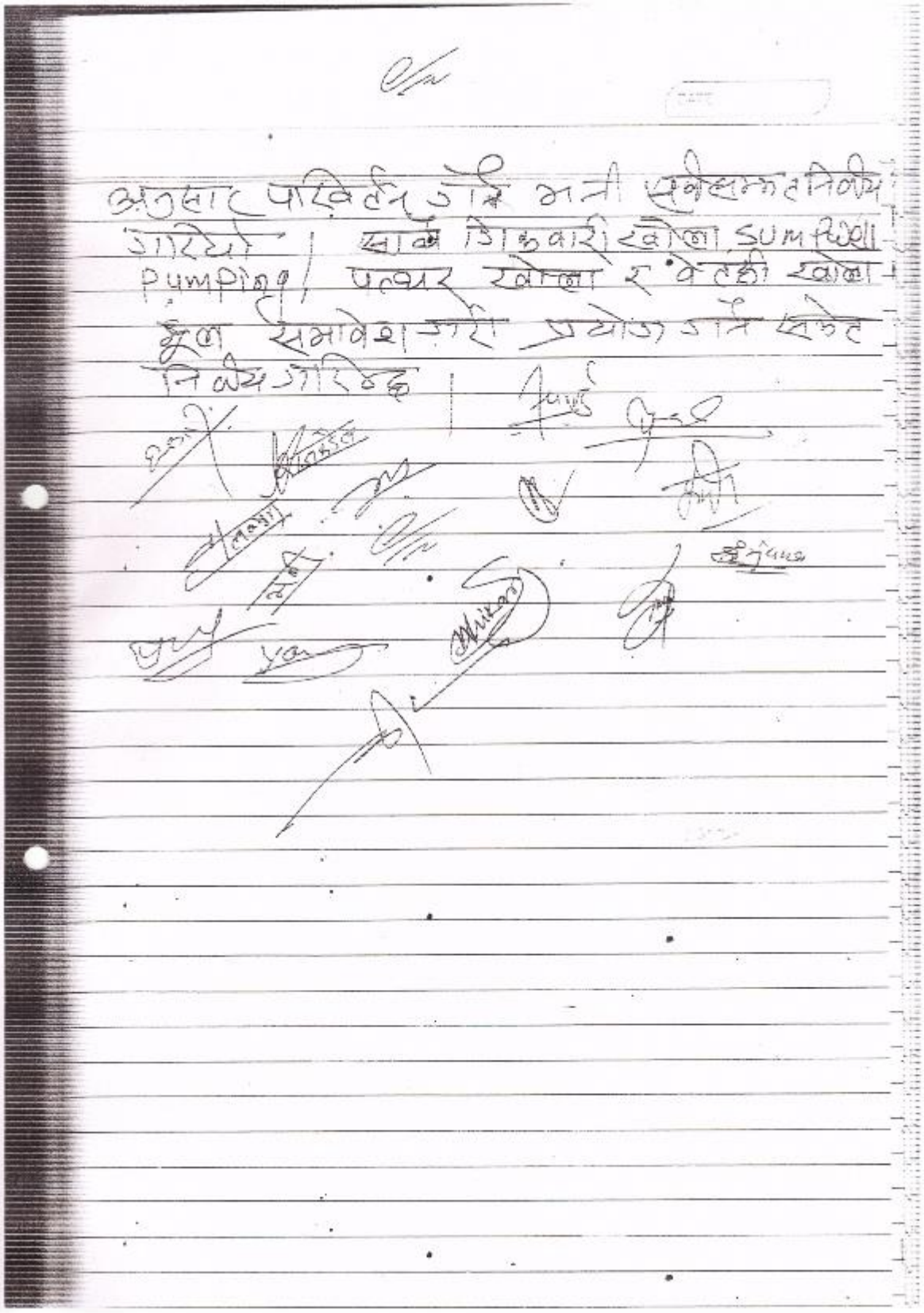
प्रस्ताव नं ५ माथी छलफल गर्दा आयोजना पूरै छिटो सामाजिक तथा प्राविधिक समेत जनश्रमदान लागि स्थानीय जनताको सहभागिता उपभोक्ता समितिले ८० प्रतिशत गरी सोही रेट बाट व्यवस्थापन गर्ने निर्णय गरियो साथै प्राविधिक सभै गर्दा यस समितिमा कार्यरत प्राविधिकलाई सेवा दिँदै सहयोग गर्ने भनी सर्वसम्मत निर्णय गरियो

निर्णय नं ६

प्रस्ताव नं ६ माथी छलफल गर्दा आयोजनाको निर्माण कार्य गर्दा श्री पा महान प्रयोग गर्दा स्थानीय वातावरणलाई कुनै नोक्सानी नपुग्ने गरी वातावरणीय पक्षलाई ध्यानमा राख्दै आयोजना संचालन गर्ने गरी काम गर्ने निर्णय गरियो ।

निर्णय नं ७

प्रस्ताव नं ७ माथी छलफल गर्दा हाल संचालन भइरहेको सेरसनाको पाइप लाइनमा प्रयोग भएको पाइप अति जीर्ण, पुरानो डिजाइन अनुसार पानी फरक परी प्रयोग गर्न नमिल्ने हुँदा



English Translation for the Minutes of Meeting

Today dated 30 October 2018, for the Urban Water Supply & Sanitation Project proposed within proposed area of Hupsekot Rural Municipality of Nawalpur District, discussion has been made for the following mentioned proposals and decisions were made accordingly, under the chairmanship of Mr. Mek Bahadur Pulami (Chairman of Deurali Soti Khola WUSC) in the presence of Ms. Laxmi Devi Pandey (Chairperson of Hupsekot Rural Municipality), Mr. Swatantra Kopila Malla (Vice Chairperson of Hupsekot Rural Municipality), Mr. Hari Pangeni (Executive Officer of Hupsekot Rural Municipality), Mr. Binod Chandra Devkota (MD of TAEC Consult P. Ltd.), Mr. Shiva Adhikari (Social Safeguard Specialist) and other members of Deurali Soti Khola WUSC.

S. No.	Name of Participants	Designation/Address
135.	Mr. Mek Bahadur Pulami	Chairman, Deurali Soti Khola WUSC
136.	Mr. Phaganath Pandey	Senior Vice Chairman, Deurali Soti Khola WUSC
137.	Mr. Guru Prasad Subedi	Vice Chairman, Deurali Soti Khola WUSC
138.	Mr. Bhim Narayan Regmi	Secretary, Deurali Soti Khola WUSC
139.	Mr. Lal Bahadur Sherpuja	Assistant Secretary, Deurali Soti Khola WUSC
140.	Mr. Mani Pandey	Treasurer, Deurali Soti Khola WUSC
141.	Mr. Nawal Singh Damai	Member, Deurali Soti Khola WUSC
142.	Ms. Durga Devi Khanal	Member, Deurali Soti Khola WUSC
143.	Ms. Bhagwati Pandey	Member, Deurali Soti Khola WUSC
144.	Mr. Shyam Prasad Lamsal	Member, Deurali Soti Khola WUSC
145.	Mr. Yam Bahadur Somai	Member, Deurali Soti Khola WUSC
146.		Secretary, Safeguard Committee
147.	Mr. Srijan Pandey	Accountant, Deurali Soti Khola WUSC
148.	Mr. Khum Lal Pandey	Member, Safeguard Committee
149.	Mr. Krishna Raj Kandel	Member, Safeguard Committee
150.	Mr. Mahendra Basyal	Member, Safeguard Committee
	Special Invitees	
151.	Ms. Laxmi Devi Pandey	Chairperson, Hupsekot Rural Municipality
152.	Mr. Swatantra Kopila Malla	Vice Chaiperson, Hupsekot Rural Municipality

S. No.	Name of Participants	Designation/Address
153.	Mr. Hari Pangeni	Executive Officer, Hupsekot Rural Municipality
154.	Mr. Prem Bahadur Karki	Patron & Former Chairman, Deurali Soti Khola WUSC
155.	Mr. Binod Chandra Devkota	Managing Director, TAEC Consult P. Ltd.
156.	Mr. Shiva Adhikari	Social Safeguard Specialist, TAEC Consult P. Ltd.
157.	Mr. Bhim Bahadur Aslami Magar	Safeguard Committee
158.	Mr. Chhabilal Midhuna	Chairman, Ward No. 3
159.	Mr. Purna Bahadur Lama	
160.	Mr. Ram Bahadur Rana	Deurali Soti Khola WUSC

Agendas:

1. Regarding the information on the proposed Deurali Hupsekot Water Supply & Sanitation project
2. Regarding the field visit for the proposed project
3. Regarding the delineation of the service area
4. Regarding the management & availability of the required land and Social Safeguard
5. Regarding social and technical survey of the proposed project town
6. Regarding the environmental issues that may be encountered during project implementation
7. Regarding the pipeline of the existing water supply system

Decisions:

The following decisions were made concerning the above-mentioned agendas:

1. Regarding the agenda no. 1, the information on the requirement of 5% upfront cash collection, 25% TDF Loan and 70% from GoN Contribution for the project implementation, has been delivered by the consultant team.

2. Regarding agenda no. 2, it has been informed by the consultant team that the field visit has been carried out at the existing sources i.e., Girubari Khola, Rakse Khola,Pathar Khola, and at the existing water treatment plant site, by the team that includes Mr. Binod Chandra Devkota (MD of TAEC Consult P. Ltd.), Mr. Shiva Adhikari (Social Safeguard Specialist), Ms. Laxmi Devi Pandey (Chairperson of Hupsekot Rural Municipality), Mr. Swatantra Kopila Malla (Vice Chairperson of Hupsekot Rural Municipality), Mr. Prem Bahadur Karki, Patron of WUSC and other members of WUSC.

3. As per agenda no. 3; the proposed service area of the project includes as follows;

    - Ward no. 1: Beluwa and Jukepani
    - Ward no. 2: Koliya and Guheri (water to be supplied from RVT without pumping)
    - Ward no. 3: Girubari and Belhani
    - Ward no. 4: Jhyalbas and Tallo Dihi

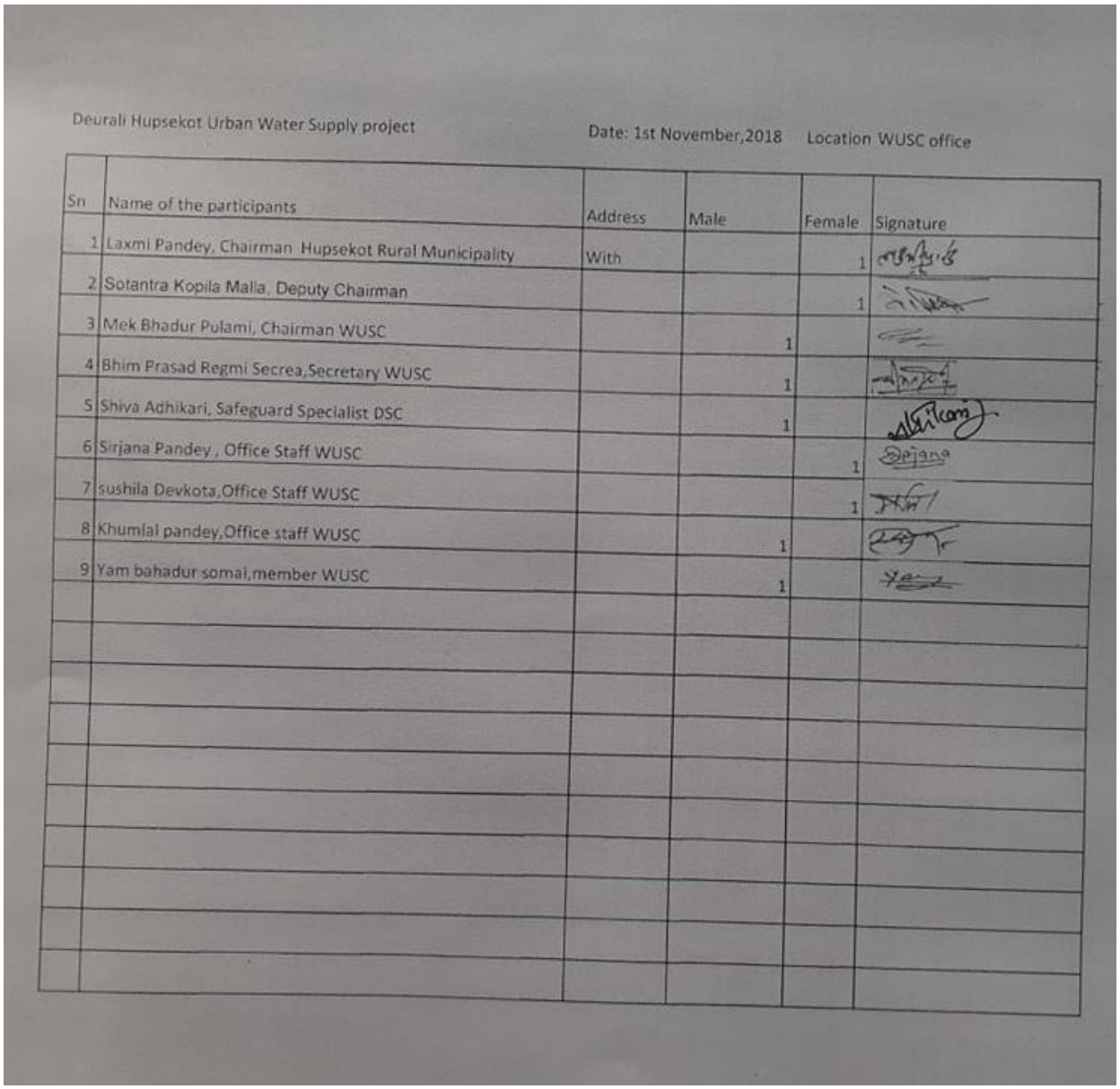
4. As per agenda no. 4; it has been informed that recommendation from the rural municipality office is required along with the required documents & land ownership certificates of the required land for the proposed reservoir tank at ward no. 4. It has also been decided to provide land at other locations for an office building and public toilets as per the Social Safeguard Policy without affecting others.

5. As per agenda no. 5, it has been decided to manage the local human resources by the local bodies to carry out the detailed social and technical survey. Along with this, it has also been decided that to seek help from the technicians employed at the WUSC, during the technical survey.

6. As per agenda no. 6, it has been decided to use the proposed sources without having any effect on the local environment during project implementation and to move the project forward keeping in view of the environmental aspects.

7. As per agenda no. 7, it has been decided to replace the existing pipelines as the existing pipelines are old and worn out, are as per the old design and cannot be brought into use. Along with this, it has also been decided to assimilate the sources i.e., Girubari Khola, Sump Well Pumping, Pathar Khola and Betai Khola.

d. Attendance sheet of 1st November 2018



Deurali Hupsekot Urban Water Supply project Date: 1st November,2018 Location WUSC office

Sn	Name of the participants	Address	Male	Female	Signature
1	Laxmi Pandey, Chairman Hupsekot Rural Municipality	With		1	
2	Sotantra Kopila Malla, Deputy Chairman			1	
3	Mek Bhadur Pulami, Chairman WUSC		1		
4	Bhim Prasad Regmi Secrea,Secretary WUSC		1		
5	Shiva Adhikari, Safeguard Specialist DSC		1		
6	Sirjana Pandey , Office Staff WUSC			1	Sirjana
7	sushila Devkota,Office Staff WUSC			1	
8	Khumlal pandey,Office staff WUSC		1		
9	Yam bahadur somai,member WUSC		1		

Annex-3: Photographs

	
Proposed/ Existing Site Shivalaya (WTP-2/ RVT-2 site), parcel no 696 ward no.4	Existing Collection Chamber, Betai Khola ward no.2
	
Proposed/ Existing Intake, Betai Khola ward no. 2	A view of Community Settlement

	
Proposed/ Existing WTP2/ RVT 2 or existing Filter plant parcel no 696 ward no.4 at Shivalaya	Proposed/ Existing WTP-2/RVT-2 area Shivalaya at ward no. 4
	
Proposed/Existing Water Treatment Plant WTP-1/ RVT-1=2 RVTs of 400cum site(Dihidanda) parcel no.1967 and1968 ward no 4	Proposed/ Existing Intake (Gravity), Girubari Khola (Satakon) with Mayor Laxmi Pandey October 30, 2018

	
Proposed Sump well Site, Girubari Khola in between Badahare kholsi and Chepari Gaira ward no. 4	Proposed/ Existing Intake, Pathar Khola, ward no.4
	
Detail report presentation program, 21 June 2019	Public Consultation Participants, 21 June 2019

	
Public Consultation Participants, 21 June 2019	Public Consultation Participants, 21 June 2019
	
Mayor Laxmi Pandey during the presentation program, 21 June 2019	Proposed/ Existng WTP-2/ RVT 2=400cum site Dihidanda ward no 4, parcel no. 1967,1968

Annex-4: Involuntary Resettlement Screening Checklist

Country Nepal

Subproject Name **Deuralisoti Khola Hupsekot Urban Water Supply and Sanitation Proiect**

Date May 2020

I. Resettlement Impact Checklist

(Note: Involuntary Land Acquisition is not required for the town project)

A. Probable Resettlement Effects	Yes	No	Not Known		Remarks
Acquisition of Land					
1. Will there be land acquisition?					Nearly 9557.26 square meters of land is required for different project components such as sump wells, treatment units, RVTs etc. No involuntary acquisition of private land is anticipated.
		√			
2. Will easement be utilized within an existing Right of Way (ROW)?	√				The pipe laying will be carried out along the existing Right of Way as far as possible in order to avoid the private land loss and to minimize the other possible adverse impacts.

3. Will there be loss of shelter and residential land due to land acquisition?		√			All the land to be obtained from WUSC/ public / government land and there are no any structures on the lands, there will be no loss of shelter and residential land. All barren land will be used.
4. Will there be loss of agricultural and other productive assets due to land acquisition?		√			All public/Municipality land will be used non fertile/ barren land has been proposed.
5. Will there be losses of crops, trees, and fixed assets due to land acquisition?		√			The land is mostly barren non-agricultural public land; hence losses of crops, trees and fixed assets are not anticipated. No trees will be cut except clearing of bushes. For any tree to be cut, consider replacement of 1:25(From IEE Report) Major project components do not encroach into any of the community forests of the project area. However, some portion of transmission mains pass through the Musedanda Community Forest. The study shows that there is no requirement of cutting trees. There will also be requirement of clearing of some bushes and shrubs only along the proposed pipeline alignment. Hence, there will be no such significant adverse inpact on the community forest.
6. Will there be loss of businesses or enterprises due to land acquisition?		√			Since there is no need of private or residential land acquisition, there will be no loss of business or

					enterprises.
7. Will there be loss of income sources and means of livelihoods due to land acquisition?		√			Loss of income source and means of livelihoods are not anticipated as proposed project components will be constructed in vacant public/government land.
Involuntary restrictions on land use or on access to legally designated parks and protected areas					
8. Will people lose access to natural resources, communal facilities and services?		√			There is no any designated park and protected area in or near to the project. The land to be obtained is mostly barren land with some bushes. Since loss of vegetation will be insignificant, local people will not lose access to natural resources. No trees will be cut except clearing of bushes. For any tree to be cut, consider replacement of 1:25(From IEE Report)
9. If land use is changed, will it have an adverse impact on social and economic activities?		√			Construction of small structures on small size of public/government vacant lands will not result change in land use, and hence adverse impact on social and economic activities are not expected.
10. Will access to land and resources owned communally or by the state be restricted?		√			There is no any land and resources owned by community.
Information on Displaced Persons:					

Any estimate of the likely number of persons that will be displaced by the Subproject?					**[√]**	**No**	**[ ]**	**Yes**
If yes, approximately how many? __N/A_____								
Are any of them poor, female-heads of households, or vulnerable to poverty risks?					**[√]**	**No**	**[ ]**	**Yes**

Annex-5: Indigenous Peoples Impact Screening Checklist Deurali- Hupsekot

key concerns (please provide elaboration of the remarks column)	***yes***	***no***	***not known***	***remarks***
indigenous peoples identification				
1. are there socio-cultural groups present in or use the subproject area who may be considered as "tribes" (hill tribes, schedules tribes, tribal peoples), "minorities" (ethnic or national minorities), or "indigenous communities" in the subproject area?	√			the service area of the subproject is heterogeneous in terms of ethnicity/caste and culture. mixed community including of indigenous people or socio-cultural groups has been observed. basically deurali-hupsekot uwssp project area is the dominant by ip community tamang and magar/ darai
2. are there national or local laws or policies as well as anthropological researches/studies that consider these groups present in or using the subproject area as belonging to "ethnic minorities", scheduled tribes, tribal peoples, national minorities, or cultural communities?		√		
3. do such groups self-identify as being part of a distinct social and cultural group?		√		
4. do such groups maintain collective attachments to distinct habitats or ancestral territories and/or to the natural resources in these habitats and territories?		√		
5. do such groups maintain cultural, economic, social, and political institutions distinct from the dominant society and culture?		√		
6. do such groups speak a distinct language or dialect?	√			the ethnic groups in the service area speak their own distinct languages among their members, but nepali is spoken as common language.
7. has such groups been historically, socially and economically marginalized, disempowered, excluded, and/or discriminated against?		√		the service area is highly populated by indigenous group

key concerns (please provide elaboration of the remarks column)	***yes***	***no***	***not known***	***remarks***
				(tamang, magar) but they have high moral in society one example is mek bahadur pulami (magar) is the chairman in wusc.
8. are such groups represented as "indigenous peoples" or as "ethnic minorities" or "scheduled tribes" or "tribal populations" in any formal decision-making bodies at the national or local levels?	√			the janajati (ip) and dalits are included in wusc. most of the community forest user committee has leading by ip group.