

# UGPL in SSP

## Summary of Field Studies

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# NADOLIYA minor (Mehsana)

- **Functional Years:** 4
- **Availability:** Sufficient in Rabi. Kharif initial watering by tubewell
- **WUA Status:** Active
- **Conflict:** None
- **Others:** Political upper-hand

- **Functional Years:** 3
- **Availability:** Not timely; Kharif initial watering by tubewell
- **WUA Status:** Inactive
- **Conflict:** None
- **Others:** Some users don't pay user fee but farmers feel its an issue SSNNL should resolve

- Rampant lifting from branch and distributary canal
- Pumped water stored in ditches along the farm and used later as per need
- Recurrent need to repair the canal network as head enders obstruct flow of water

- **Functional Years:** 3
- **Availability:** Business issue; Not ent
- **Status:** Inactive
- **Conflict:** Out of turn
- **Others:** g of valves
- **Status:** One farmer d down a 3000 pipeline
- **Status:** ctected to

Saurashtra Br. Canal

01 NDM

02 NDM

08 NDM

BAKARTHALI  
minor  
(Surendranagar)

50%



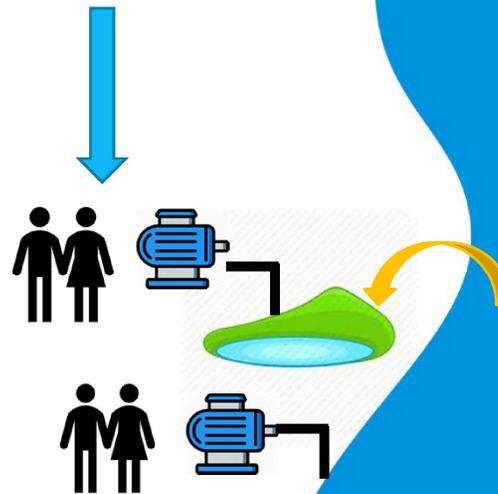
50%



**15% have  
private  
underground  
pipelines**

## KAUNDH minor (Morbi)

- **Functional Years:** 1; construction incomplete for some farms
- **Availability:** Sufficient for completed sub-minors
- **WUA Status:** Inactive
- **Others:** 25-30% of the village is in Narmada command



70%

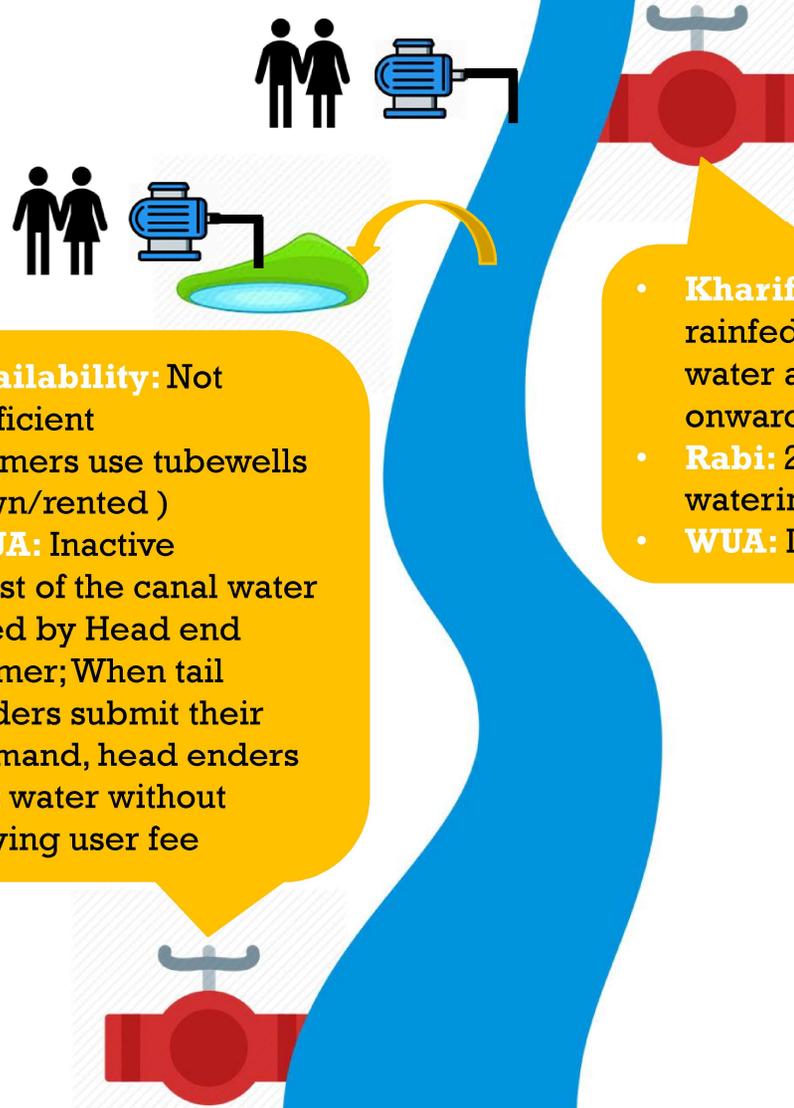


- **Out of Canal Command**
- **Use Electric pumps (8 hours electricity)**

# THORIMUBARAK minor (Ahmedabad)

- **Availability:** Not sufficient
- Farmers use tubewells (own/rented)
- **WUA:** Inactive
- Most of the canal water used by Head end farmer; When tail enders submit their demand, head enders get water without paying user fee

- **Kharif:** Initial watering rainfed/ borewell. Canal water available October onwards
- **Rabi:** 2-3 turns of watering
- **WUA:** Inactive



## MEETHAPUR minor (Bhavnagar)

### Availability Issues

- Out of designated 8 days, only 2-3 days it was available
- At 2 feet water level in the minor, only 3-4 hours flow possible in the turnouts
- For gravity flow chaks pressure not sufficient to reach farms
- Untimely release leads to wastage of water

### Design Issues

- Land slope such that water from each turnout does not flow eastwards
- Leakage in pipeline and turnout



- **Functional Years:** 1
- **Usage:** Rabi; End of Kharif
- **Availability:** Not sufficient; Timeliness issue
- **WUA:** Inactive

# Private Pipeline Cost



Bakarthali  
(Surendranagar)

■ Lifting from Pond



Rs. 50,000



Rs. 1200-1500 per 100 feet (rubber pipes)



Rs. 75 per litre: 20 litre for 7-8 acres (24 hours)

800 acres : Rs. 150,000 per turn



Rs. 463 per Ha per turn

(Rs. 357 per Ha per turn)

Bakarthali  
(Surendranagar)

■ Lifting from Distributary using UGPL



Rs. 50,000



Rs. 4500 per 100 feet



Rs. 75 per litre: 20 litre for 7-8 acres (24 hours)

800 acres : Rs. 150,000 per turn



Rs. 463 per Ha per turn

(Rs. 357 per Ha per turn)

# Tarav (Vadodara)

Lifting from distributary using pipeline			
	Respondent 1	Respondent 2	Respondent 3 (buyer)
Pumpsizes	6.5 HP	5 HP	
Pump Cost (2001)	Rs. 22000	Rs. 16000	
Rent (per hour)			Rs. 50
Pipeline	Rs. 8000 for 300 feet	Rs. 70 per feet	
Diesel	Rs. 70 per litre	Rs. 70 per litre	
Kerosene	Rs. 50-60 per litre	Rs. 50-60 per litre	
Fuel Cost (Diesel)		1 L/hour	
Fuel Cost (Kerosene)	4 L/bigha		
Hours to irrigate		4-5 hours per acre	6 hours per bigha
Irrigation Cost using Diesel (per Ha per turn)	Rs. 1210	Rs. 865	Rs. 3110
Irrigation Cost using Kerosene (per Ha per turn)	Rs. 1037	Rs. 730	Rs. 2851

# Ankadiyapura (Vadodara)

## Irrigation Rates for different sources

	Borewell	Lifting from Canal
Diesel/Electric	Electric	Diesel
Rent (per hour)	Rs 60	Rs 130 (50+80)
Pipeline		Rs. 10000 for 1500 feet
Hours to irrigate	6-7 per bigha	6-7 per bigha
Irrigation Cost (per Ha per turn)	Rs. 1814	Rs. 3930

# Thank You

Questions 