

June 2023

**Vasantidevi Patil Institute of Pharmacy
Kodoli – Maharashtra**

Water Audit Report

**Vasantidevi Patil Institute of
Pharmacy
Kodoli- Maharashtra**

Water Audit Report

June 2023

**Encon Education and Research
Foundation**

www.enconerf.in

Report on

WATER AUDIT

of

Vasantidevi Patil Institute of Pharmacy

Kodoli, Dist. Kolhapur, Maharashtra.

Conducted by

Mrs. Gargi Bargale

CEO

Encon Education and Research Foundation

Address: - Near Dr. Dhawale Residence, Ichalkaranji.

Dist.-Kolhapur, Mo. No. 9422412664

Web: www.enconerf.in

June 2023

Water Audit

Water audit of Vasantidevi Patil Institute of Pharmacy has been conducted. During audit all data and information verified by visiting actual college site and hostel. Total number of students and staff residing at hostel are 225. Total number of students and staff daily attend lecture and practical are 553.

Water requirements for different usages are referred from NBC 2016, BIS. It was observed that water consumption at hostel and college are more than the requirements of NBC 2016. We analyzed the water consumption at hostel and college and wish to put forth that the water consumption can be reduced to around 32%.

Description	Unit	Hostel	College
		value	
Total Population (Approx.)	Nos.	225	553
Daily water requirement per capita (Through Awareness)	lit	135	45
Existing System			
Number of pump at stage I	HP	5	5
Measured Power Consumption			
Pump Stage I- Pump	HP/kW	5/3.7	5/3.7
Measured water discharge by pump	m ³ /hr.	14.4	14.4
Working hour of pump	Hr	3.5	3.5
Theoretical water discharge	Lit.	50400	50400
Quantity of water supplied to hostel per day	lit.	45000	50400
Actual water distributed per capita	lit.	200.00	91.14
Excess water per capita	lit.	65.00	46.14
Water saved per day @ 135 lit. & 45 lit.	lit.	14625.00	25515.00
Working Hrs. reduced of pump by distributing 135 liters water/day	hrs.	1.14	1.77
Energy saving annually	kWh	1661	2587
Energy Tariff	₹/kWh	10	10
Monetary saving annually	₹	16607.50	25869.38
Reduction in CO ₂ emissions	MT/Year	1.36	2.12

Recommendations:

Create awareness among students and staff about water conservation.

Use water conservative fixtures and taps.

Fix water meter to monitor daily consumption

Conclusion:

This is with reference to our recommendations, energy saving around 1661 and 2587 kWh respectively at hostel and college can be achieved. In addition, Monetary saving around ₹ 42500 can be set aside. It also helps in reduction in CO₂ emissions 3.48 MT/ annum.

.



Place: - Ichalkaranji

Date: - 23/06/23

Mrs. Gargi Bargale

CEO