7.1.4 Water Conservation Facilities Available at the Institution

1. Rain water harvesting
2. Bore/Open well recharge
3. Waste water recycling
4. Maintenance of water bodies and distribution system in the campus

1.Rain water harvesting

The college has taken proactive measures to address the increasing scarcity of water by implementing rainwater harvesting systems. The college has constructed rainwater harvesting tanks to reuse rainwater instead of allowing it to flow into drains. One rainwater harvesting tank and one soak pit were established on the college campus, and another soak pit was established in the hostel campus. The rainwater harvesting tank is located in the JKC block and has a capacity of about 50,000 liters. The second one is located at the Botany department, and the third one is located at the hostel. Rainwater from the roofs and terraces is collected directly into the rainwater harvesting tank. This collected water is then redirected to the open well through PVC pipes. The water is used to meet the water requirements of labs, toilets, trees, and gardens in the college.

Fig1 Rain water harvesting

2. Bore/Open well recharge

The JKC block holds an open well that is situated near the rainwater harvesting unit. The water collected from the rainwater harvesting unit is either deposited or recharged into this open well. The water from this well is then used to water the plants in the medical garden and for toilet purposes. Additionally, the botany department has another bore well that is used to meet the water requirements of the commerce block.

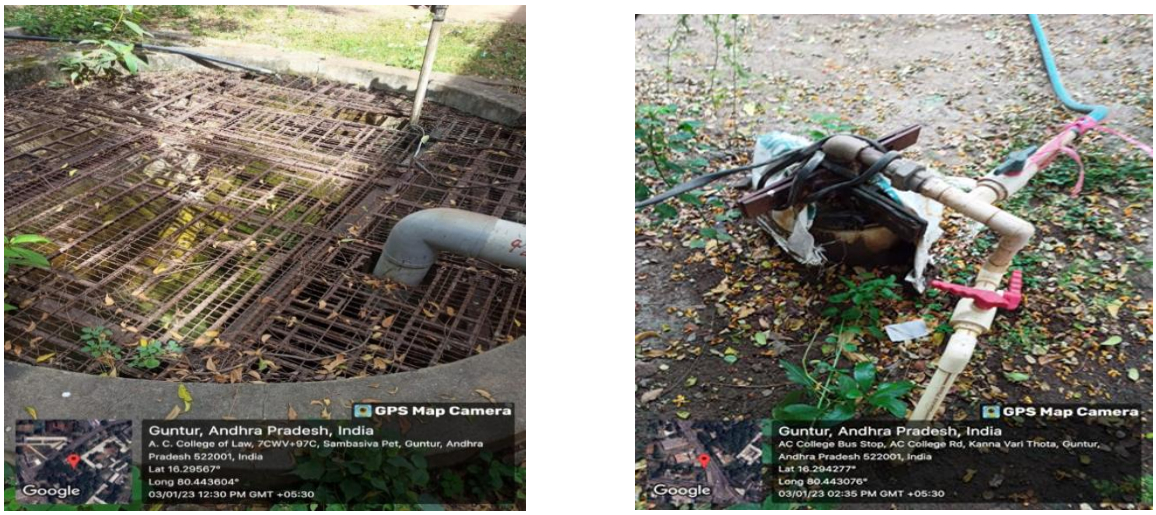

Fig2: open well recharge

3. Waste water recycling

The waste water produced from a reverse osmosis (RO) plant has been utilized for plantation near the botany department and also for recharging an open well located at the JKC block,

Fig 3: Waste water from RO plant is used to recharge open bore well

4. Maintenance of water bodies and distribution system in the campus

The college campus has four main blocks, namely the main block, home science block, commerce block, and JKC block. The primary source of water is groundwater, which is pumped to overhead tanks. A sump is constructed near the library to collect municipal water, which is then directed to an RO plant after filtration to make it suitable for drinking purposes. There are two RO plants available, one near the botany department and the other in the hostel to cater to the needs of hostel students. The campus has eight overhead tanks, and a well-connected piping system supplies water to all four blocks. Underground water connections enable water to reach the department labs. Two separate connections are present to differentiate drinking water that comes from municipal pipes and the other piping system that collects rainwater from the rainwater tank, which is then used for washrooms and watering plants. The taps are set with low-pressure flushes to minimize water wastage and students are educated not to waste water through posters.