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## WATER UTILIZATION SUPERVISION AND BILLING SYSTEM

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## ABSTRACT

We know that water is the most essential basic need of life and is required for all basic purposes in household works and in the fields of agricultural practices, Industries, and Construction. Today, many countries are facing water scarcity and hence the demand for water is increasing drastically. According to a survey, it shows that with present usage, we will face a 50% shortfall in the supply of water. Even though water is naturally abundant and is readily available, the excess amount of wastage of water and drilling borewells for private use has caused a decrease in the groundwater level and hence the skyrocketing demand for water. Some parts of the world are completely deprived of clean water, so it is crucial to bring a proper water utilization supervision system and we must come together and do our best to make sure that everyone has access to safe water every day. In order to conserve the water and maintain its availability and track its usage, we have come up with the idea of an "IoT Based water utilization supervision and Billing system

Keywords: Water Utilization, Iot Based, Wastage.

## I. INTRODUCTION

The proposed Water Supervision and Billing System would be employed in densely inhabited locations including hotels, residences, lodges, and hostels. On each floor of the flat, the Water supervision System can provide information about household water usage. It also aids in the provision of the needed amount of water on the ground. Using water flow sensors, this device can measure the water flowing in the pipe. Various electronic devices, such as LCD monitors and the NodeMCU ESP8266, are also integrated in addition to the flow rate sensors. This project is cost-effective because all of the components are readily available and inexpensive It. As a result, we'll be building a website based on the data received from the NodeMCU, using a variety of software tools like HTML, CSS, and PHP. The website can be accessible by both owner and tenants. Owner can monitor the water consumption of each house. Tenants can login to their account and can check their water, based on that they can pay the bill.



Figure 1: Flow chart of the water utilization and supervision system

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