

ABSTRACT

This research focuses on using an Nginx server to monitor the maturity of tea leaves in real time using RTMP modules and IP cameras. This is very important for the tea industry to ensure the quality of the final product. To achieve this goal, a system was built using Nginx as the main server responsible for managing real-time video transmission from IP cameras installed in tea gardens. The implementation of this system includes several stages, including installation and configuration of the Nginx server, integration of the RTMP module, and installation of IP cameras in strategic locations. Certain visual indicators are used to analyze the collected video data to determine the maturity level of tea leaves. This research shows that the use of an Nginx server with an RTMP module can enable effective real-time monitoring of tea leaf maturity. This can help tea farmers and producers improve their quality and productivity. The results make a significant contribution to the field of smart agriculture and Internet of Things-based monitoring technology and also open up opportunities for the development of similar systems in other agricultural fields.

Keywords: Tea Leaves, Nginx Server, RTMP, Ip camera, Real-time.