# Paper Title:

Design of Long-Term Evolution Based Mobile Edge Computing Systems to Improve 5G Systems

## Paper Link:

https://ieeexplore.ieee.org/document/10212420/metrics

# 1.Summary

## 1.1 Motivation

The motivation behind this work stems from the need to address challenges related to latency and energy efficiency in 4G networks. With the advent of 5G communications, there is an increasing interest in integrating MEC within existing mobile networks.

### 1.2 Contribution

The proposed system aims to demonstrate its effectiveness through extensive simulations and experiments, considering parameters such as latency, throughput, energy efficiency, and overall system responsiveness.

# 1.3 Methodology

The methodology involves the development of an advanced MEC system with a focus on both the control and data planes. The control plane utilizes intelligent algorithms for optimal offloading decisions, dynamic network management, and load balancing.

#### 1.4 Conclusion

In conclusion, the proposed LTE-based MEC system demonstrates significant improvements over traditional approaches in terms of reduced latency, enhanced energy efficiency, and improved system performance.

# 2.Limitations

### 2.1 First Limitation

The study primarily focused on comparing the performance of the proposed LTE-based MEC system under WiFi and LTE network conditions. However, the evaluation could benefit from exploring a more diverse set of network scenarios.

### 2.2 Second Limitation

The paper briefly mentions the importance of edge server selection but does not delve into the nuances of different placement strategies.

## 3.Synthesis

The paper briefly mentions the importance of edge server selection but does not delve into the nuances of different placement strategies. Future research could investigate the impact of various edge server placement strategies on system performance, considering factors such as geographical distribution, server load, and network topology.