



# RECHERCHE

A DIGEST OF MULTIDISCIPLINARY EXPLORATIONS  
(PEER REVIEWED)



# R D

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# RECHERCHE

A DIGEST OF MULTIDISCIPLINARY EXPLORATIONS  
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# Application of Queuing Theory in Industrial Problems

Priya K <sup>1</sup>

## ABSTRACT

This report discusses the fundamental concepts of Queue, Queuing models and Derivations of some performance measures related to queuing model. While studying queuing system one can review the efficiency of model in terms of utilization and waiting time. The efficiency of a Queuing system of BIG BAZAAR's checkout service unit is analysed using the performance measure of a queuing model.

Keywords : Arrival Process, Service Mechanism, Queuing Models, Little's Equation, Birth and Death Equations.

## INTRODUCTION

The Queuing theory , also called the Waiting line theory, was developed by A. K Erlang , who is called the father of Queuing theory, in the year 1909[1].The theory is applicable to situations where the customers arrive at some service station(s) for some service; wait; and then leave the system after

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