

IV YEAR SEM-II B.Tech CSE	ELECTIVE	L	T	P	C
CODE: CS4604	MOBILE ADHOC NETWORKS	2	2	0	4

UNIT I: INTRODUCTION

Introduction to adhoc networks – definition, characteristics features, applications. Characteristics of Wireless channel, Adhoc Mobility Models:- Indoor and out doormodels.

UNIT II: MEDIUM ACCESS PROTOCOLS

Protocols: design issues, goals and classification. Contention based protocols- with reservation, scheduling algorithms, protocols using directional antennas.

UNIT III: NETWORK PROTOCOLS

Routing Protocols: Design issues, goals and classification. Proactive Vs reactive routing, Unicast routing algorithms, Multicast routing algorithms,

UNIT IV: ALGORITHMS

hybrid routing algorithm, Energyaware routing algorithm, Hierarchical Routing, QoS aware routing.

UNIT V: END-END DELIVERY AND SECURITY

Transport layer :

Issues in designing- Transport layer classification, adhoc transport protocols. Security issues in adhoc networks: issues and challenges, network security attacks, secure routing protocols.

UNIT VI: CROSS LAYER DESIGN AND INTEGRATION OF ADHOC FOR 4G

Cross

layer Design: Need for cross layer design, cross layer optimization, parameter optimization techniques, Cross layer cautionary perspective. Intergration of adhoc with Mobile IP networks.