



Centre for e-Learning

SRI GURU TEGH BAHADUR KHALSA COLLEGE
UNIVERSITY OF DELHI, DELHI-110007



Date: 06/01/2016

Advisory Committee

Prof. A K Bakshi
(Chairman)

Prof. K V Bhanu
Murthy
(Vice-Chairman)

Prof. H C Pokhriyal
(Member)

Prof. N K Chadha
(Member)

Prof. A K Gupta
(Member)

Prof. Suresh Chand
Aggarwal
(Member)

Dr. Jaswinder Singh
(Secretary)

Dr. Jatinder Bir
Singh (Member)

Dr. G S Sodhi
(Member)

Dr. Vimal Rarh
(Member)

Administrative Heads

Dr. Jaswinder Singh
Executive Director

Dr. Vimal Rarh
Deputy Director

To whomsoever it may concern

This is to certify that **Dr. Mukesh C. Joshi** has contributed in the e-PG Pathshala Project for **Chemistry** Subject by UGC under the NMEICT mission of MHRD, Govt. of India, as **Author** for the following **Modules in Four Quadrant Format** as per the details:

Paper 5: Organic Chemistry II (Reaction Mechanisms-1)		
Module Tag	Module Title	Author(s)
CHE_P5_M11	S _N 2 Reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M12	S _N 1 Reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M13	Mixed S _N 1 and S _N 2 Reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M14	SET Reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M15	The Neighbouring Mechanism, Neighbouring Group Participation by π and σ Bonds	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M16	Neighbouring group participation in S _N reactions and Anchimeric assistance	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M17	Nucleophilic Substitution at an Allylic, Aliphatic Trigonal and S _N i Reactions and Nucleophilic Substitution at a Vinylic Carbon, Reactivity Effects of Substrate	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M18	Reactivity Effects of Attacking Nucleophile, Leaving Group and Reaction Medium	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M19	Ambident nucleophile and regioselectivity	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M20	Common Carbocation Rearrangements and non-classical Norbornyl cation	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M21	Phase transfer catalysis	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M22	Ultrasound	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi

CHE_P5_M23	S _E 2 Reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M24	S _E i Reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M25	S _E 1 reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M26	Effect of substrates, leaving group and the solvent polarity on the reactivity in electrophilic aliphatic substitutions reactions	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi
CHE_P5_M27	Substitution accompanied by double bond shifts	Prof. Diwan S. Rawat, Dr. Mukesh C. Joshi


Dr. Vimal Rarh
 Deputy Director