uc3m Universidad Carlos III de Madrid

Vicerrectorado de Estudios Apoyo a la docencia y gestión del grado

COURSE: CALCULUS II

DEGREE: BACHELOR IN ELECTRICAL POWER ENGINEERING

YEAR: FIRST

TERM: SECOND

	WEEKLY PLANNING									
		s			EACHING (mark X) SPECIAL ROOM		TUDENT			
W E K	'	E S I O N	DESCRIPTION	L E C T U R E S	S E M I N A R S	FOR SESSION (Computer class room, audio-visual class room)		CLASS HOURS (1,66=50+50 min)	HOMEWORK HOURS (Max. Estim. 6,5h)	
1			THE EUCLIDEAN SPACE RN, FUNCTIONS OF SEVERAL VARIABLES, LEVEL SETS, INTRODUCTION TO NOTION OF LIMIT	x		No	SECTIONS 14.1, 14.2, 14.3 AND 14.5 OF SALAS AND/OR SECTION 2.1 OF MARSDEN	1,66	6,5	
		2	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 1.1	1,66		
2		3	LIMITS AND CONTINUITY	х		No	SECTION 14.6 OF SALAS AND/OR SECTION 2.2 OF MARSDEN	1,66	6,5	
		4	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 1.1	1,66		
3		5	DIFERENTIABILITY AND PARTIAL DERIVATIVES, MATRIX OF DERIVATIVES AND GRADIENT VECTOR	x		No	SECTIONS 15.1 AND 15.4 OF SALAS AND/OR SECTION 2.3 OF MARSDEN	1,66	6,5	
		6	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTIONS 1.2 AND 1.3	1,66		
4		7	CHAIN RULE, DIRECTIONAL DERIVATIVES	x		No	SECTIONS 15.2 AND 15.3 OF SALAS AND/OR SECTIONS 2.5 Y 2.6 OF MARSDEN	1,66	6,5	
		8	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 1.4	1,66		

	WEEKLY PLANNING									
	s	DESCRIPTION	TEACHING (mark X)		SPECIAL ROOM	WEEKLY PROGRAMMING FOR STUDENT				
W E K	E S I O N		L E C T U R E S	S E M I N A R S	FOR SESSION (Computer class room, audio-visual class room)	DESCRIPTION	CLASS HOURS (1,66=50+50 min)	HOMEWORK HOURS (Max. Estim. 6,5h)		
5	9	HIGH ORDER DERIVATIVES AND LOCAL EXTREMA	х		No	SECTION 15.5 OF SALAS AND/OR SECTIONS 3.1 AND 3.3 OF MARSDEN	1,66	6,5		
	10	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTIONS 2.1 AND 2.2	1,66			
6	11	CONSTRAINED EXTREMA, LAGRANGE MULTIPLIERS, GLOBAL EXTREMA	х		No	SECTION 15.5 OF SALAS AND/OR SECTION 3.4 OF MARSDEN	1,66	6,5		
	12	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 2.3	1,66			
7	13	INTEGRALS IN RN	х		No	SECTIONS 16.2 AND 16.3 OF SALAS AND/OR SECTIONS 5.1, 5.2, 5.3 AND 5.6 OF MARSDEN	1,66	6,5		
	14	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 3.1	1,66			
8	15	DOUBLE AND TRIPLE INTEGRALS, THEOREM OF FUBINI, APPLICATIONS	х		No	SECTIONS 16.3 AND 16.7 OF SALAS AND/OR SECTION 5.4 OF MARSDEN	1,66	6,5		
ð	16	DISCUSSION AND SOLUTION OF PROBLEMS FIRST PARTIAL EVALUATION.		х	No	PROBLEMS IN SECTION SECCIÓN 3.1	1,66	0,5		
9		CHANGE OF COORDINATES, POLAR, CILINDRICAL AND SPHERICAL COORDINATES, APPLICATIONS	x		No	SECTIONS 16.8, 16.9 AND 16.10 OF SALAS AND/OR SECTION 6.2 OF MARSDEN	1,66	6,5		
	18	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTIONS 3.2 AND 3.3	1,66			
10	19	PATH AND LINE INTEGRALS, CONSERVATIVE FIELDS	x		No	SECTIONS 17.1, 17.2 AND 17.3 OF SALAS AND/OR SECTIONS 7.1, 7.2 AND 8.3 OF MARSDEN	1,66	6,5		
	20	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 4.1	1,66			

	WEEKLY PLANNING									
	s	DESCRIPTION	TEACHING (mark X)			WEEKLY PROGRAMMING FOR STUDENT				
W E K	E S I O N		L E C T U R E S	S E M I N A R S	SPECIAL ROOM FOR SESSION (Computer class room, audio-visual class room)	DESCRIPTION	CLASS HOURS (1,66=50+50 min)	HOMEWORK HOURS (Max. Estim. 6,5h)		
11	21	PARAMETRIZATION OF SURFACES, SURFACE INTEGRAL	x		No	SECTIONS 17.6 AND 17.7 OF SALAS AND/OR SECTIONS 7.3, 7.4, 7.5 AND 7.6 OF MARSDEN	1,66	6,5		
	22	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 4.2	1,66			
12	23	THEOREMS OF GREEN, STOKES AND GAUSS	x		No	SECTIONS 17.5, 17.9 AND 17.10 OF SALAS AND/OR SECTIONS 8.1, 8.2 AND 8.4 OF MARSDEN	1,66	6,5		
	24	DISCUSSION AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 4.3	1,66			
13	25	LAPLACE TRANSFORM	х		No	SECTIONS 7.1, 7.2, 7.3 AND 7.4 OF NAGLE	1,66	6,5		
	26	DISCUSSION AND SOLUTION OF PROBLEMS	х		No	PROBLEMS IN SECTIONS 5.1 AND 5.2	1,66			
	27	LINEAR DIFFERENTIAL EQUATIONS		х	No	SECTIONS 7.5, 7.6 AND 7.7 OF NAGLE	1,66			
14	- 28 -	DISCUSSION AND SOLUTIION OF PROBLEMS SECOND PARTIAL EVALUATION.	x		No	PROBLEMS IN SECTION 5.3	1,66	6,5		
	29	REVIEW AND SOLUTION OF PROBLEMS		х	No	PROBLEMS IN SECTION 5.3	1,66	3,25		
Subtotal 1								94		
		14	12							

15	Tutorials, handing in, etc	х		No		3,6	-
16							
17	Assessment					4	10
18							
			-		Subtotal 2	8	10
	Total 2 (Hours of class plus student homework)						8

WEEKLY PLANNING									
s		TEAC (mai	rk X)	SPECIAL ROOM FOR SESSION (Computer class room, audio-visual class room)	WEEKLY PROGRAMMING FOR STUDENT				
E S I O N	DESCRIPTION	L E C T U R E S	S E M I N A R S		DESCRIPTION	CLASS HOURS (1,66=50+50 min)	HOMEWORK HOURS (Max. Estim. 6,5h)		

TOTAL (Maximun 160 horas)	160
	100