## DEGREES AWARDED BY THE UNIVERSITY OF TEXAS AT AUSTIN:

DEGREE: BACHELOR OF SCIENCE IN CHEMICAL ENGINEERING

DATE: AUGUST 20, 1979 MAJOR:

CHEMICAL ENGINEERING

WITH HONORS

DEGREE: MASTER OF SCIENCE IN ENGINEERING

DATE: MAY 21, 1983

MAJOR: CHEMICAL ENGINEERING

DEGREE: DOCTOR OF PHILOSOPHY

DATE: MAY 18, 1985

MAJOR: CHEMICAL ENGINEERING

HIGH SCHOOL: KASHMERE HIGH SCHOOL

HOUSTON

**CLASS OF 1975** 

TRANSFERRED WORK FROM UNIVERSITY OF TEXAS DALLAS

DATE ORIGINAL COURSE DESIGNATION GR/CR UT EQUIVALENT SUMMER, 1979 MMS 3360 PROB STAT N-MAJ SUMMER, 1979 MMS 3318 ADV LINEAR ALGEBRA В 3 311 3

TOTAL HOURS TRANSFERRED:

## COURSEWORK UNDERTAKEN AT THE UNIVERSITY OF TEXAS

FALL SEMESTER 1975 CREDIT BY EXAM E 306 RHETORIC & COMPOSITION SPN 406 BEGINNERS SPANISH SPN 407 INTERMEDIATE SPANISH CH 301 INTRODUCTORY CHEMISTRY	3.0 CR 4.0 A 4.0 CR 3.0 CR
FALL SEMESTER 1975 ENGINEERING E 307 LITERATURE & COMPOSITION-SPEC CH 302 PRINCIPLES OF CHEMISTRY M 608EA CALCULUS WITH ANLY GEOM PHY 403K ENGINEERING PHYSICS I PSY 319K SOCIAL PSYCHOLOGY HRS UNDERTAKEN 16 HRS PASSED 16 GPA HRS 16 GR PTS 54	3.0 B 3.0 B 3.0 A 4.0 B 3.0 A GPA 3.3750
SPRING SEMESTER 1976 ENGINEERING  CH 204 INTRODUCTION CHEMICAL PRACTICE  M 608EB CALCULUS-ANLY GEOM II  PHY 403L ENGINEERING PHYSIC II  HIS 315K UNITED STATES 1492-1865  P I 107L GYMNASTICS-BEG-MEN  CHE 202 INTRO TO ENGINEERING  HRS UNDERTAKEN 15 HRS PASSED 15 GPA HRS 15 GR PTS 50	2.0 A 3.0 A 4.0 B 3.0 C 1.0 A 2.0 A GPA 3.3333
SUMMER SESSION 1976 ENGINEERING GDV F310L AMERICAN GOVERNMENT GOV S312L ISS & POL-AMER FOREIGN RELATNS HIS F315L UNITED STATES SINCE 1865 HRS UNDERTAKEN 6 HRS PASSED 6 GPA HRS 6 GR PTS 21	3.0 A 3.0 B 3.0 Q GPA 3.5000

MORE WORK ON NEXT PAGE



FALL SEMESTER 1976 ENGINEERING		
FALL SEMESTER 1976 ENGINEERING E 317 TECHNICAL WRITING-SCI MAJORS CH 618A ORGANIC CHEMISTRY CH 118K ORGANIC CHEMISTRY LABORATORY M 325 CALCULUS III E M 314 MECHANICS HRS UNDERTAKEN 13 HPS PASSED 40		
CH 6184 DRGANIC CHEMICTON		3.0 B
CH 118K ORGANIC CHEMISTRY		3.0 A
M 325 CALCIBLE TIT		1.0 B
E M 314 MECHANICS		3.0 A
E M 314 MECHANICS HRS UNDERTAKEN 13 HRS PASSED 13 GPA HRS 13		3.0 Å
THE PASSED 13 GPA HRS 13	GR PTS 48	GPA 3 6923
SPRING SEMESTER 1977 ENGINEERING  CH 618B ORGANIC CHEMISTRY  CH 118L ORGANIC CHEMISTRY LABORATORY  M 427K ADV CALCULUS FOR APPL I  CHE 317 INDUSTRIAL CHEM CALCULATIONS  DRW 201 ENGINEERING DRAWING  HRS UNDERTAKEN 13 HRS PASSED 13 GPA HRS 12		
CH 618B OBCANIO CHEMING		
CH 1181 ODGANIC CHEMISTRY		3.0 B
M 427K ARM RANGE CHEMISTRY LABORATORY		1.0 B
CHE 247 ANY CALCULUS FOR APPL I		4.0 B
DOW SOLL INDUSTRIAL CHEM CALCULATIONS		3.0 B
LINE LINESTALE		3.0 6
HRS UNDERTAKEN 13 HRS PASSED 13 GPA HRS 13	GR PTS 41	2.U A
		GPA 3.1538
FALL SEMESTER 1977 ENGINEERING E 314K INTRODUCTION TO LITERATURE I CH 353 PHYS CHEM-FOR CHEM.CHE OR PHY HIS 315L UNITED STATES SINCE 1865 CHE 453 TRANSPORT PHENOMENA E E 331 ELEC CIRCUITS & MACHINERY HRS UNDERTAKEN 16 HRS PASSED 16 GPA HRS 16	*•	
FALL SEMESTER 1977 ENGINEERING		
5 314K INTRODUCTION TO LITERATURE I		5.6
CH 353 PHYS CHEM-FOR CHEM, CHE OR PHY		3.0 A
HIS 315L UNITED STATES SINCE 1865		3.0 B
CHE 453 TRANSPORT PHENOMENA		3.0 B
E E 331 ELEC CIRCUITS & MACHINERY		4.0 A
HRS UNDERTAKEN 16 HRS PASSED 16 GPA HRS 16	CD DTC EA	3.0 C
	GK P15 52	GPA 3.2500
SPRING SEMESTER 1978 ENGINEERING		
CH 153K PHYSICAL CHEMISTRY LABORATORY		
CH 354L PHYSICAL CHEMISTRY		1.0 Q 3.0 A
CHE 322 THERMODYNAMICS		3.0 A
CHE 454 UNIT OF THE FLO HEAT MACE TO		3.0 B
CHE 363K POLYMER PROCESSING		4.0 A
HRS UNDERTAKEN 13 HRS PASSED 13 GPA HRS 13		3.0 B
THE THEOLO TO GEN HIS 13	GR PTS 46	GPA 3.5384
SUMMER SESSION 1978 ENGINEERING		
CH F153K PHYSICAL CHEMISTRY LAD		
CHE S253M CHEM FAIGH FUNDAMENTAL C LAD		1.0 A
HRS UNDERTAKEN 3 HPS PASSED 3 OF HOS		2.0 A
SUMMER SESSION 1978 ENGINEERING CH F153K PHYSICAL CHEMISTRY LAB CHE S253M CHEM ENGR FUNDAMENTALS LAB HRS UNDERTAKEN 3 HRS PASSED 3 GPA HRS 3	GR PTS 12	GPA 4.0000
FALL SEMESTER 1978 ENGINEERING CH 331 INDRGANIC CHEMISTRY CHE 363 UNIT OPER II-SEPARATN PROCESS CHE 372 CHEMICAL REACTOR DESIGN CHE 379 COMPUTER APPLICATIONS IN CHE HRS UNDERTAKEN 12 HRS PASSED 12 CPA HRS 10		
CH 331 INDRGANIC CHEMISTRY		
CHE 363 UNIT OPEN IL-SEDARATA PROGRAM		3.0 A 3.0 A
CHE 372 CHEMICAL PEACTOR DECION		3.0 A
CHE 379 COMPLITED APPLICATIONS TO THE		3.0 A
HRS UNDERTAKEN 12 HDS DASSED 40 OD 1		3.0 A
HRS UNDERTAKEN 12 HRS PASSED 12 GPA HRS 12	GR PTS 48	GPA 4.0000
SPRING SEMESTER 1979 ENGINEERING		
CHE 380 CHEM FACE MATERIALS		
CHE 264 CHE PROGRAM A TERIALS		3.0 C
CHE 2724 OPPOSES & PROJECTS LAB		2.0 C
CH 354 PHUCESS AND PLANT DESIGN		3.0 8
CH 1544 PHYSICAL CHEM-INTRO QUAN MECH		3.0 B
HPS LINDERTAKEN 40 LINE TARRETTE LABORATORY		1.0 B
CHE 350 CHEM ENGR MATERIALS CHE 264 CHE PROCESS & PROJECTS LAB CHE 373K PROCESS AND PLANT DESIGN CH 354 PHYSICAL CHEM-INTRO QUAN MECH CH 154K PHYSICAL CHEMISTRY LABORATORY HRS UNDERTAKEN 12 HRS PASSED 12 GPA HRS 12	GR PTS 31	GPA 2.5833

MORE WORK ON NEXT PAGE



MORE WORK ON NEXT PAGE

SUMMER SESSION 1979 ENGINEERING		
ABS IN ABSENTIA		
		0.0
FALL SEMESTER 1979 GRADUATE SCHOOL CHE 384 ADV CHE ANALYSIS CHE 384 INTRODUCTION TO RESEARCH CHE 384 TRANSPORT SEMINAR CHE 387K ADVANCED THERMODYNAMICS CHE 390 PROCESS RATES HRS UNDERTAKEN 15 HRS PASSED 15 GPA HRS 15		
CHE 384 ADV CHE ANALYSIS		
CHE 384 INTRODUCTION TO RESEARCH		3.0 A
CHE 384 TRANSPORT SEMINAR		3.0 A
CHE 387K ADVANCED THERMODYNAMICS		3.0 R
HRS UNDERTAKEN 15 HPS PASSED 45 OD 1100		3.0 B
TING PASSED IS GPA HRS 15	GR PTS 54	GPA 3.6000
SDOING SCHEOTER 100		
CHE 384 INTRODUCTION OF SCHOOL		
CHE 385M SUPFACE DUENOMENA		3.0 A
SPRING SEMESTER 1980 GRADUATE SCHOOL CHE 384 INTRODUCTION TO RESEARCH CHE 385M SURFACE PHENOMENA CHE 698A THESIS CH 390L ADV ANLY-ELECTROCHEM METHODS HRS UNDERTAKEN 12 HRS PASSED 9 GPA HRS 9		3.0 A
CH 390L ADV ANLY-ELECTROCHEM METHODS		3.0 *
HRS UNDERTAKEN 12 HRS PASSED 9 GPA HRS 9	GR PTS 36	3.0 A
	/ . 5 00	GPA 4.0000
SUMMER SESSION 1980 GRADUATE SCHOOL CHE W684 INTRODUCTION TO RESEARCH M E N381Q NONEQUILIBRIUM THERMODYNAMICS HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9		
CHE W684 INTRODUCTION TO RESEARCH		
M E N381Q NONEQUILIBRIUM THERMODYNAMICS		6.0 A
HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9	GR PTS 36	GPA 4 0000
FALL SEMESTER 1980 GRADUATE SCHOOL		
CHE 685 RESEARCH		
M 364K VECTOR & TENSOR ANALYSIS I		6.0 A
FALL SEMESTER 1980 GRADUATE SCHOOL CHE 685 RESEARCH M 364K VECTOR & TENSOR ANALYSIS I HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9	GR PTS 36	GPA 4.0000
SPRING SEMESTER 1981 GRADUATE SCHOOL PED 105T JUDO-BEG CHE 384 TRANSPORT SEMINAR CHE 685 RESEARCH CH 392N PHY CHEM OF MACROMOLECULAR SYS HRS UNDERTAKEN 13 HRS PASSED 12 GPA HRS 9		
PED 105T JUDO-BEG		1 O CB
CHE 384 TRANSPORT SEMINAR		3.0 A
CH 392N PHY CHEM DE MACROMOLEOUS AD ANG		6.0 A
HRS UNDERTAKEN 13 HRS PASSED 12 GPA HPS 9	CD 075 00	3.0 CR
THE STATE OF THE S	GR P15 36	GPA 4.0000
SUMMED SECTION 4004		
CHE N384 ADV TODICE THE MEMORINE		
CHE W384 INTRODUCTION TO DESEABLE		3.0 A
CHE N387M MASS TRANSFER		3.0 A
SUMMER SESSION 1981 GRADUATE SCHOOL CHE N384 ADV TOPICS IN MEMBRANES CHE W384 INTRODUCTION TO RESEARCH CHE N387M MASS TRANSFER HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9	GR PTS 32	3.0 B
	un 1 13 33	GPA 3.6666
FALL SEMESTER 1981 GRADUATE SCHOOL		
CHE 384 TRANSPORT SEMINAR		_
CHE 684 INTRODUCTION TO RESEARCH		3.0 A
HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9	GR PTS 36	6.0 A GPA 4.0000
		GFA 4.0000
SPRING SEMESTER 1982 GRADUATE SCHOOL		
CHE 384 INT TO RSCH: TRANSPORT SEMINAR		
CHE 384 INTRODUCTION TO DESEABLE		3.0 A
M E 3745 SOLAR ENERGY		3.0 A 3.0 A
		^



CONTINUE	SPRING SEMESTER 1982 GRADUATE SCHOOL PEN 387 SECOND RECOVERY OF PETROLEUM HRS UNDERTAKEN 12 HRS PASSED 12 GPA HRS 12 GR PTS 45	3.0 B GPA 3.7500
	SUMMER SESSION 1982 GRADUATE SCHOOL CHE N384 MEMBRANE SCI AND ENG CHE W684 INTRODUCTION TO RESEARCH HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9 GR PTS 36	
	FALL SEMESTER 1982 GRADUATE SCHOOL CHE 699W DISSERTATION CH 397S ADV CHEM-INTERFACIAL PHENOM HRS UNDERTAKEN 9 HRS PASSED 3 GPA HRS O GR PTS O	
	SPRING SEMESTER 1983 GRADUATE SCHOOL CHE 384 INT TO RSCH: RESEARCH SEMINAR CHE 685 RESEARCH HRS UNDERTAKEN 9 HRS PASSED 9 GPA HRS 9 GR PTS 36	
	SUMMER SESSION 1983 GRADUATE SCHOOL CHE WG99R DISSERTATION AST F109L ASTRONOMICAL OBSERVATIONS HRS UNDERTAKEN 7 HRS PASSED O GPA HRS O GR PTS O	6.0 A 1.0 CR GPA 0.0000
	FALL SEMESTER 1983 GRADUATE SCHOOL CHE 699R DISSERTATION M 393C MATHEMATICAL PHYSICS HRS UNDERTAKEN 9 HRS PASSED 3 GPA HRS 3 GR PTS 12	
	SPRING SEMESTER 1984 GRADUATE SCHOOL CHE 384 INT TO RSCH: TRANSPORT SEMINAR CHE 999R DISSERTATION HRS UNDERTAKEN 12 HRS PASSED 3 GPA HRS 3 GR PTS 12	
	SUMMER SESSION 1984 GRADUATE SCHOOL	3.0 A
	FALL SEMESTER 1984 GRADUATE SCHOOL CHE 384 PROCESS SEMINAR CHE 999W DISSERTATION	3.0 A
		GPA 4.0000 6.0 A
	CUMULATIVE TOTALS EARNED AS AN UNDERGRADUATE STUDENT AT U HRS UNDERTAKEN 133 HRS PASSED 133 GPA HRS 123 GR PTS 419	

MORE WORK ON NEXT PAGE



CUMULATIVE TOTALS EARNED AS A GRADUATE STUDENT AT U.T. AUSTIN HRS UNDERTAKEN 170 HRS PASSED 117 GPA HRS 111 GR PTS 432 GPA 3.8918

END OF TRANSCRIPT \*\*\*

TASP SCORES

OUR RECORDS INDICATE THE FOLLOWING TASP INFORMATION: STATUS: EXEMPT PREVIOUS EDUCATION

AREAS: NO SCORES

