MASTER OF SCIENCE IN CIVIL ENGINEERING TRANSPORTATION ENGINEERING

Required Courses (all options)

-		Hours
CE 774	Pavement Design	3
CE 775	Traffic Engg.	3
CE 786	Land Devt for CEs and PInrs	3

Option Electives

Students should choose at least one course from each of the following areas, or 9-12 hrs. in one option area. Other option electives may be selected with the approval of the student's advisory committee.

Planning Option

CE 680	Econ of Des and Constr	3
CE 771	Travel Demand Modeling	3
CE 872	Transportation Safety	3
CE 874	Sustainable Transp. Asset Mg	jmt 3
CE 816	Advanced Topics (Var)	
ECON 631	Principles of Transp	3
GEOG 608	Geographic Info Systems II	3
IMSE 850	Ergonomics (Human Factors)	Eng 3
PLAN 667	Transportation Planning	3
STAT 705	Regression and Anal of Var	3
STAT 710	Sample Survey Methods	3

Operations Option CE 680 Econ of Des and Constr 3 CE 771 Travel Demand Modeling 3 Advanced Topics CE 816 (Var) CE 872 Transportation Safety Traffic 3 Flow Theory CE 875 3 Sustainable Transp. Asset Mgmt 3 CE 874 Principles of Transportation ECON 631 3 Intro to Op Res I 3 **IMSE 560** Ergonomics (Human Factors) Eng.3 **IMSE 850** IMSE 881 Linear Programming 3 **PLAN 667** Transportation Planning 3 Regression and Anal of Var 3 **STAT 705** Sample Survey Methods **STAT 710** 3

Design Option

Econ of Des and Constr	3
Travel Demand Modeling	3
	3
	3
	3
Prestressed Concrete Des	3
Transportation Safety	3
Sustainable Transp. Asset Mg	gmt 3
Ergonomics (Human Factors)	Eng 3
Transportation Planning	3
Regression and Ana. of Var.	3
Sample Survey Methods	3
	Travel Demand Modeling Adv Geotech Design Hydraulics Open Channels Shear Str & Slope Stability Prestressed Concrete Des Transportation Safety Sustainable Transp. Asset Mo Advanced Topics (Var) Ergonomics (Human Factors) Transportation Planning Regression and Ana. of Var.

Materials Option				
CE 641	CE Materials I	3		
CE 680	Econ of Des and Constr	3		
CE 728	Adv Geotech Design	3		
CE 741	CE Materials II	3		
CE 773	Hot Mix Asphalt Design	3		
CE 777	PCC Pavements	3		
CE 822	Shear Str & Slope Stability	3		
CE 802	Adv Mechanics of Materials	3		
CE 828	Adv Soil Mechanics	3		
CE 816	Advanced Topics (Var)			
CE 874	Sustainable Transp. Asset Mgr	nt 3		
ME 862	Finite Elements	3		
STAT 705 STAT 710 STAT 720	Regression and Ana. of Var Sample Survey Methods Design of Experiments	3 3 3		