

MASTER OF ENGINEERING IN TRANSPORTATION ENGINEERING

These master of engineering programs are course-only, professionally-oriented degree programs that permit a concentration in preparation for engineering practice. Admission requirements to these programs are the same as those for the master of science program. Candidates in these programs must complete a minimum of 32 credit hours, up to four of which may be a special project course—CAE 594, CAE 597, or ENVE 597. Up to 12 credit hours of 400-level undergraduate coursework (except CAE 431 and CAE 432) may be included in the master of engineering program with prior adviser approval. No thesis or comprehensive examination is required for completion of the degree.

With a Master of Engineering in Transportation Engineering degree, a student will be a qualified transportation planner, traffic engineer, and traffic safety engineer. Additionally, the student will be trained to understand and evaluate the socioeconomic impacts of transportation and infrastructure engineering projects.

Curriculum

Code	Title	Credit Hours
Core Courses		(12-13)
Select a minimum of four courses from the following with adviser consent:		12-13
CAE 523	Statistical Analysis Engg Data	3
CAE 543	Demand Models for Urban Trans	3
CAE 544	Urban Transportation Planning	4
CAE 546	Public Transportation Systems	3
CAE 548	Transportation Systems Mgnt	3
CAE 555	Transportation Sysys Evaluatio	3
CAE 575	Systems Analysis in Civil Engg	3
MATH 525	Statistical Models and Methods	3
Project Course		(1-3)
CAE 594	Research Problems	1-3
or CAE 597	Special Problems	
General Electives		(17-18)
Select 17-18 credit hours from the following:		17-18
CAE 416	Facilty Dsgn Trnsprtn Syst	3
CAE 417	Railroad Engineering & Design	3
CAE 419	Intro Transportation Engg/Dsgn	3
CAE 430	Probability Cncpt Ce Dsgn	3
CAE 508	Advanced Bridge Engineering	3
CAE 539	Intro to Geographic Info Sysys	3
CAE 541	Pavement Evaluation&Management	3
CAE 545	Traffic Operations & Flow Thry	3
CAE 547	Advanced Traffic Engineering	3
CAE 549	Transportation Econ, Dev&Plcy	3
CAE 568	Transportation Asset Mgmt	3
CAE 574	Economic Decision Analysis	3
CAE 580	Intelligent Transport Systems	3
CAE 581	Algorithms in Transportation	3
MATH 522	Mathematical Modeling	3
MATH 542	Stochastic Processes	3
MATH 563	Mathematical Statistics	3
MATH 564	Applied Statistics	3
MATH 565	Monte Carlo Methods in Fin	3
MATH 571	Data Preparation and Analysis	3
MATH 574	Bayesian Computational Stats	3

Minimum degree credits required: 32