

# CERTIFICATE IN TRANSPORTATION SYSTEMS PLANNING

The Certificate in Transportation Systems Planning is a preparatory coursework-only non-degree program designed to be taken standalone for gaining introductory knowledge in transportation systems, planning, and engineering, or in preparation for gaining

advanced knowledge in the Master of Engineering in Transportation Engineering program.

## Curriculum

Code	Title	Credit Hours
<b>Required Courses</b>		<b>(6)</b>
Select a minimum of two courses from the following (with adviser consent):		6
CAE 523	Statistical Analysis of Engineering Data	3
CAE 543	Demand Models for Urban Transportation	3
CAE 544	Urban Transportation Planning	4
CAE 546	Public Transportation Systems	3
CAE 548	Transportation Systems Management	3
CAE 555	Transportation Systems Evaluation	3
CAE 575	Systems Analysis in Civil Engineering	3
MATH 525	Statistical Models and Methods	3
<b>Elective Courses</b>		<b>(6)</b>
Select a minimum of two courses from the following (with adviser consent): <sup>1</sup>		6
CAE 416	Facility Design of Transportation Systems	3
CAE 417	Railroad Engineering and Design	3
CAE 419	Introduction to Transportation Engineering and Design	3
CAE 430	Probability Concepts in Civil Engineering Design	3
CAE 539	Introduction to Geographic Information Systems	3
CAE 549	Transportation Economics, Development and Policy	3
CAE 568	Transportation Asset Management	3
CAE 574	Economic Decision Analysis in Civil Engineering	3
CAE 581	Algorithms in Transportation	3
MATH 522	Mathematical Modeling	3
MATH 563	Mathematical Statistics	3
MATH 564	Applied Statistics	3
MATH 571	Data Preparation and Analysis	3
<b>Total Credit Hours</b>		<b>12</b>

<sup>1</sup> If more than two courses from the required courses list are taken, those additional courses can be applied as electives