

Master of Science in Transportation

Plan Description

The Master of Science in Transportation (M.S.T.) degree program is oriented toward the practice of transportation science and engineering, with emphasis on the planning, design, operations, and maintenance of transportation systems. It is intended for applicants with all backgrounds especially those in areas other than engineering, and who either presently work for or aspire to work for transportation agencies or private companies who provide professional services in the transportation field. The program is multi-disciplinary in nature and students must take courses from at least two colleges. Two tracks (thesis and project) are available in M.S.T. degree program.

For more information about your program, including your graduate program handbook and learning outcomes, please visit the Degree Directory.

Plan Admission Requirements

Application deadlines Applications available on the UNLV Graduate College website. Admission to the program leading to the M. S. T. degree in thesis and project tracks is open to those students completing the following requirements: Applications must include all documentation as required by the Graduate College. Applications should be submitted in the Grad Rebel Gateway system Applicants must have earned a Bachelor of Science or Bachelor of Arts degree from a regionally accredited four-year college or university. If applicant's degree is in a field other than engineering, it is desirable for the bachelor's degree to be earned in one of the following areas: urban or regional planning, architecture, business, economics, public administration, quantitative geography, computer science, mathematics, operations research, statistics, political science, physical science, psychology, health sciences, or similar discipline. The CEEC Graduate Program Committee (GPC) and Graduate Coordinator make all the final decisions after review of each applicant's records and admissions information. Overall undergraduate GPA of at least 2.75 on a 4.00 scale (4.00=A) or equivalent is required for admission or at least 3.00 (4.00=A) for the last two years of undergraduate work. The CEEC Graduate Program Committee (GPC) and Graduate Coordinator make all the final decisions after review of each applicant's records and admissions information. Prior credit (in semester hours) with grades of B or better must have been earned in the following subjects or their equivalents: • MATH 181 – Calculus I • PHYS 151/151L or 152/152L– General Physics I or II • STA 152–Statistics The applicant must submit a Statement of **Purpose (SOP) Intent (SOI)** with no more than two pages, indicating previous experience and the reasons why they wish to pursue the M. S. T. degree, and how the degree will be utilized following graduation. In addition, two letters of recommendation (LOR) must be submitted from individuals familiar with **the t he** applicant's knowledge, skills and abilities. It is highly recommended that LOR be written on official letter head. International applicants must meet English proficiency requirements established in the UNLV Graduate Catalog. All applicants are required to take GRE General Test and submit the scores to the University of Nevada, Las Vegas (code 4861). Successful applicants generally have a combined verbal and quantitative GRE score of at least 300 and analytical writing score of at least 3. All domestic and international applicants must review and follow the Graduate College Admission and Registration Requirements. Students are accepted into a degree program as described in the Graduate Catalog. The faculty, specific areas, and degree tracks within the described programs are subject to change at any time.

Plan Requirements

See Subplan Requirements below.

Subplan1: Thesis Track

Subplan 2: Project Track

Subplan 1 Requirements: Thesis Track

Total Credits Required: 30

Course Requirements

Required Courses – Credits: 3

CEE 700 Research Methods in Civil and Environmental Engineering	3
---	---

Elective Courses – Credits: 18

Complete 18 credits of advisor-approved elective coursework including a minimum of 3 courses from the following discipline-based list:

CEE 725 Freight Transportation	3
CEE 726 Railroad Operations	3
CEE 735 Earth Dams and Embankments	3
CEE 761 Transportation Demand Analysis	3
CEE 762 Operations Research Applications in Civil Engineering	3
CEE 763 Advanced Traffic Engineering	3

New-Core (Optional) Graduate Internship Course-Credit: maximum up to 1

Students ~~interested~~ engaged in ~~getting~~ Curricular Practical Training (CPT) ~~should~~ must take CEE 798 ~~up to~~. The course can be taken maximum one time during their study. However, the credit will not be counted towards the degree.

CEE 798 Graduate Internship for Civil Engineering and Transportation Students

Thesis – Credits: 9

CEE 797 Thesis in Civil Engineering

3 – 6

Degree Requirements

A Thesis Advisory Committee composed of at least four members of the UNLV graduate faculty is to be formed for the student. At least two of the committee members must be from tenured or tenure-track faculty of the CEEC Department and the third member can be from a related field. The fourth faculty member, the Graduate College Representative, is recommended by advisor/advisee and appointed by the Graduate College. It is recommended that the Thesis Advisory Committee collective expertise reflects the thesis topic. The committee chair must be a faculty from the area of expertise chosen for thesis topic.

In addition to CEE 700, all student must successfully complete a minimum of 18 credit hours of approved graduate courses.

In addition to the coursework requirements, 9 credits of research work associated with the master's level thesis (CEE 797) with the outcome being a manuscript written for a specific indexed conference or journal.

At least 50% of the courses (600 and 700 level) within the total coursework must be from the College of Engineering.

At least 50% of the courses within the total coursework must be 700 level.

Students must maintain a minimum grade point average of 3.00. A course in which a grade of less than C was earned will not be considered for use toward the degree.

Graduation Requirements

The student must submit all required forms to the Graduate College and then apply for graduation up to two semesters prior to completing his/her degree requirements.

The student must submit and successfully defend his/her thesis by the posted deadline. The defense must be advertised and is open to the public.

After the thesis defense, the student must electronically submit a properly formatted pdf copy of their thesis to the Graduate College for format check. Once the thesis format has been approved by the Graduate College, the student will submit the approved electronic version to ProQuest. Deadlines for thesis defenses, format check submissions, and the final ProQuest submission can be found here.

Total Credits Required: 30

Course Requirements

Elective Courses - Credits: 27

Complete 27 credits of advisor-approved elective coursework including a minimum of 3 courses from the following discipline-based list:

CEE 725 Freight Transportation	3
CEE 726 Railroad Operations	3
CEE 735 Earth Dams and Embankments	3
CEE 761 Transportation Demand Analysis	3
CEE 762 Operations Research Applications in Civil Engineering	3
CEE 763 Advanced Traffic Engineering	3

New-Core (Optional) Graduate Internship Course- Credit: maximum up to 1

Students ~~interested~~ engaged in ~~getting~~ Curricular Practical Training (CPT) ~~should~~ must take CEE 798 ~~up to~~. The course can be taken maximum one time during their study. However, the credit will not be counted towards the degree.

CEE 798 Graduate Internship for Civil Engineering and Transportation Students

Project - Credits: 3

CEE 796 Design Project in Civil Engineering	1 – 3
---	-------

Degree Requirements

The student's Advisor should be tenured or a tenure-track faculty member of the CEEC Department. An advisory committee is not required.

Students must complete a minimum of 27 credit hours of approved graduate courses, and 3 credits of project work associated with the master's level project (CEE 796) with the outcome being a paper written for a specific indexed conference or journal.

At least 50% of the courses (600 and 700 level) within the total coursework must be from the College of Engineering.

At least 50% of the courses within the total coursework must be 700 level.

Students must maintain a minimum grade point average of 3.00. A course in which a grade of less than C was received will not be considered for use toward the degree.

Graduation Requirements

The student must submit all required forms to the Graduate College and apply for graduation up to two semesters prior to completing his/her degree requirements.

The student must successfully complete a project and submit a project report.

Plan Graduation Requirements

Refer to your subplan for Graduation Requirements.

Subplan1: Thesis Track

Subplan 2: Project Track