

MASTER OF SCIENCE IN CIVIL ENGINEERING GEOTECHNICAL ENGINEERING

Program of study must include a minimum of 15 credit hours in Civil Engineering. Other suggested electives may be selected with the approval of the student's advisory committee.

At Least 9 Credit Hours Required: Credit:

CE 728 Advanced Geotechnical Design	3
CE 822 Shear Strength and Slope Stability of Soils	3
CE 824 Strength and Deformation of Geo-Materials	3
CE 828 Advanced Soil Mechanics	3

At Least 12 Credit Hours Required¹

CE 774 Pavement Design	3
CE 803 Num and Analytic Tech for Engr	3
CE 816-A ABAQUS Appl. in Geo-Systems	3
CE 816-B Adv Testing of Geo-Systems	3
CE 816-C Deep Foundation Design	3

Suggested Electives:

AGRON 816 Soil Physics	3
AGRON 916 Adv Soil Physics	3
CE 654 Design of Groundwater Flow Sys	3
CE 680 Economics of Design and Construction	3
CE 741 Civil Engineering Materials II	3
CE 802 Adv. Mech. Mat. & Applied Elasticity ²	3
CE 837 Structural Stability	3
CE 854 Analysis of Groundwater Flow	3
GEOL 630 Stratigraphy – Sedimentation	3
GEOL 743 Introduction to Geophysics	3
GEOL 745 Exploration Geophysics	3
GEOL 880 Clay Mineralogy	3
MATH 632 Elementary Partial Diff. Equations	3
MATH 635 Dynamics, Chaos, and Fractals	3
ME 836 Intro to Fracture Mechanics	3
ME 862 Finite Elements	3
ME 902 Theory of Plasticity	3
STAT 705 Regression and Analysis of Variance	3
STAT 713 Applied Linear Statistical Methods	3

¹ Can be substituted with more relevant courses to accommodate specific POS based on advisor approval.

² Cross listed with ME 802