

MASTER OF SCIENCE IN MATHEMATICS (APPLIED MATHEMATICS)

Web Site: <https://twu.edu/mathematics/graduate-programs/>

Marketable Skills

Defined by the Texas Higher Education Coordinating Board's 60x30 Strategic Plan (<https://reportcenter.highered.texas.gov/agency-publication/miscellaneous/theccb-60x30-strategic-plan/>) as, "Those skills valued by employers that can be applied in a variety of work settings, including interpersonal, cognitive, and applied skills areas. These skills can be either primary or complementary to a major and are acquired by students through education, including curricular, co-curricular, and extracurricular activities."

- a. Apply mathematical theories and techniques to the solution of practical problems in business, engineering, the sciences, or other fields.
- b. Develop mathematical or statistical models of phenomena to be used for analysis and computational simulation.
- c. Determine appropriate methods for data analysis.
- d. Develop new principles and new relationships between existing mathematical principles to advance mathematical science.
- e. Disseminate research by writing reports, publishing papers, or presenting at professional conferences.
- f. Demonstrate personal accountability and work habits, integrity, and ethical behavior.
- g. Proficient in the software tools to achieve the skills listed, such as Matlab, R, SAS or SPSS, and LaTeX.