

Introduction to Differential Equations (MATH 210)

Credit Hours: 3

Pre-Req: Linear Algebra with Differential Equations (MATH 120)

Instructor: Mudassar Razzaq

Schedule: Monday to Friday (2.45 PM – 4.45 PM)

The laws of science and engineering are typically expressed in differential equations, which are equations with derivatives in them. Understanding of differential equations and their solutions is important in the sciences and engineering. This course deals with: First order differential equations; modeling; second order linear equations; Damped motion in mechanical and electrical systems; System of first order linear equations; Eigenvalues and Eigen vector; Series solutions; Introduction to special functions; Fourier series; Partial differential equations; separation of variables and Sturm-Liouville problems