ESOF - Software Engineering

ESOF 322. Software Engineering, 3 Credits. (3 Lec) F
PREREQUISITE: CSCI 232 and WRIT 221. Software lifecycles, Unified Modeling Language, design patterns, software engineering standards, requirements analysis, development issues, efficiency tools, verification and validation, configuration management, testing and maintenance.

ESOF 422. Advanced Software Engineering, 3 Credits. (3 Lec) S even years
PREREQUISITE: ESOF 322. Course focuses on the early and late phases of the software lifecycle, extending the knowledge developed in ESOF 322 around UML specifications to formulate precise requirements and develop an understanding of the theoretical foundations of the most common forms of software testing.

ESOF 522. Empirical Software Engr, 3 Credits. (3 Lec) S odd years
PREREQUISITE: ESOF 322 or equivalent and STAT 216Q or equivalent. Empirical software engineering focuses on improving software quality through the use of metrics. The course will provide guidance on designing, analyzing and reporting empirical studies, provide information on techniques and metrics needed to measure desired qualities, and the use of practical approaches to study software evolution.