CS 4349 is an advanced algorithm design and analysis course (3 semester credit hours) that covers asymptotic analysis, recurrences, and graph algorithms. Algorithm design techniques such as greedy method, dynamic programming, and divide-and-conquer. Issues from computational complexity. Course emphasizes a theoretical approach. Prerequisites: CS 3305 with a grade of C or better, and (CE 3345 or CS 3345 or SE 3345 or TE 3345). (3-0) S