# COURSE OFFERING FALL 2019

## CSE40838/60838 Data Visualization

**DESCRIPTION:** Introduction to scientific and information visualization. Topics include visualization of scalar and vector fields (isosurface extraction, volume rendering, line integral convolution, and particle tracing); visual data representations (parallel coordinates, treemaps, and graph layouts); interactive techniques (focus+context visualization and coordinated multiple views); and solutions for big data visual analytics. Students will gain hands-on experiences in learning popular visualization programming (D3.js) and toolkit (ParaView). Students will have the opportunity to learn, implement, and apply visualization techniques through assignments and projects.

**CREDITS:** 3
**DAY/TIME/PLACE:** MWF, 11:30-12:20, 319 DeBartolo Hall
**INSTRUCTOR:** Chaoli Wang (chaoli.wang@nd.edu)
**TEXTBOOK:** Not required. Instructors will prepare slides and online material.
**GRADING:** Based on class participation, assignments, and project.

## Selected Past Student Projects