

## Spring 2026 course calendar - draft version

Date	Day of week	Day of course	Topic	Major deadlines (semester project deadlines are tentative)	Notes
1/13 Tues			1 Class intro/plan for semester/basics of programming practice		
1/15 Thurs			2 Numerical integration and differentiation/floating-point precision		
1/20 Tues			3 Root finding and Interpolation		
1/22 Thurs			4 Linear algebra, I		
1/27 Tues			5 Linear algebra, II + Debugging		
1/29 Thurs			6 Software development with GitHub, pull requests, etc.		
2/3 Tues			7 Initial value ODEs (RK4, adaptive solvers)		Brian out of town; Ben Wibking tentatively covering
2/5 Thurs			8 Boundary value ODEs (iterative methods)		
2/10 Tues			9 Hyperbolic PDEs, I (advection)		
2/12 Thurs			10 Hyperbolic PDEs, II (higher-order advection)	Homework #1 due Friday 2/13	
2/17 Tues			11 Hyperbolic PDEs, III		
2/19 Thurs			12 Elliptic PDEs, I (Poisson/Laplace equation)		
2/24 Tues			13 Elliptic PDEs, II (multigrid method)		
2/26 Thurs			14 Parabolic PDEs, I (Diffusion)		
3/3 Tues			No class - spring break		
3/5 Thurs			No class - spring break		
3/10 Tues			15 Fast Fourier transforms		
3/12 Thurs			16 Feigelson Ch. 2, 3.1-3.7 (Probability, Statistical inference)	Homework #2 due Friday 3/13	
3/17 Tues			17 Feigelson Ch. 5 and 6 (Nonparametric statistics, data smoothing)	Project proposal due Monday 3/16	
3/19 Thurs			18 Feigelson Ch. 7 (regression)		
3/24 Tues			19 Parallel computing with Python, 1 (on HPCC)		May move parallel computing before Feigelson Ch. 2
3/26 Thurs			20 Parallel computing with Python, 2 (on HPCC)		
3/31 Tues			21 Parallel computing with Python, 3 (on HPCC)	Project update #1 due Monday 3/30	
4/2 Thurs			22 Monte Carlo as a sampling tool (Owen Monte Carlo book ch. 1-2)		
4/7 Tues			23 Markov Chain Monte Carlo (Geyer MCMC handbook)		
4/9 Thurs			24 Andreon Ch. 1-5 (Intro to Bayesian stats)	Homework #3 due Friday 4/10	
4/14 Tues			25 No class - Brian's out of town!		Brian out of town
4/16 Thurs			26 Andreon Ch. 6, 10 (Bayes, II)	Project update #2 due Wednesday 4/15	
4/21 Tues			27 Feigelson Ch. 11 (Time series analysis)		
4/23 Thurs			28 Time series analysis, Part II; class wrapup.		
4/27-5/1	TBD		FINAL EXAM WEEK - Final presentations!	Homework #4 due Friday 5/1 (last day of finals week) Project presentations, code demos, writeup, etc. due finals week (immediately before final exam session)	