

ME 412 Course Schedule* - Spring 2024

Lec	Date	Lecture Topic	HW Assigned	HW Due	SIM Assigned	SIM Due	CODE Assigned	CODE Due	Notes
1	W 17	Overview							
2	F 19	Governing Equations	HW-01						
3	M 22	Finite Difference Methods - 1							
4	W 24	Finite Difference Methods - 2							
5	F 26	Simulation Project - 1 (EH 406B1)	HW-02	HW-01	SIM-01		CODE-01		Lab 1-3pm
6	M 29	Finite Difference Methods - 3							
7	W 31	Finite Difference Methods - 4							
8	F 2	Finite Difference Methods - 5	HW-03	HW-02					
9	M 5	Finite Volume Method - 1							
10	W 7	Finite Volume Method - 2							
11	F 9	Simulation Project - 2 (EH 406B1)	HW-04	HW-03	SIM-02	SIM-01	CODE-02	CODE-01	Lab 1-3pm
12	M 12	Finite Volume Method - 3							
13	W 14	Finite Volume Method - 4							
--	F 16	No Lecture	HW-05	HW-04					
14	M 19	Linear Solvers - 1							
15	W 21	Linear Solvers - 2							
16	F 23	Simulation Project - 3 (EH 406B1)	HW-06	HW-05	SIM-03	SIM-02	CODE-03	CODE-02	Lab 1-3pm
17	M 26	Linear Solvers - 3							
18	W 28	Linear Solvers - 4							
19	F 1	Boundary Layer / Parabolic Flows - 1	HW-07	HW-06					
20	M 4	Boundary Layer / Parabolic Flows - 2							
21	W 6	Boundary Layer / Parabolic Flows - 3							
22	F 8	Boundary Layer / Parabolic Flows - 4	HW-08	HW-07			CODE-04		
--	M 11	No Lecture - Spring Break							
--	W 13	No Lecture - Spring Break							
--	F 15	No Lecture - Spring Break							
23	M 18	Pressure Projection Methods - 1							
24	W 20	Pressure Projection Methods - 2							
25	F 22	Simulation Project - 4 (EH 406B1)	HW-09	HW-08	SIM-04	SIM-03		CODE-03	Lab 1-3pm
26	M 25	Pressure Projection Methods - 3							
27	W 27	Pressure Projection Methods - 4							
28	F 29	SIMPLE Algorithm - 1	HW-10	HW-09					
29	M 1	SIMPLE Algorithm - 2							
30	W 3	SIMPLE Algorithm - 3							
31	F 5	Simulation Project - 5 (EH 406B1)	HW-11	HW-10	SIM-05	SIM-04	CODE-05	CODE-04	Lab 1-3pm
32	M 8	SIMPLE Algorithm - 4							
33	W 10	Complex Geometry - 1							
34	F 12	Complex Geometry - 2	HW-12	HW-11					
35	M 15	Complex Geometry - 3							
36	W 17	Complex Geometry - 4							
37	F 19	Turbulence Modeling - 1	HW-13	HW-12		SIM-05			
38	M 22	Turbulence Modeling - 2							
39	W 24	Turbulence Modeling - 3							
40	F 26	Turbulence Modeling - 4	HW-14	HW-13				CODE-05	
--	M 29	No Lecture							
--	W 1	No Lecture	HW-15/16	HW-14					

* Schedule is subject to change at the discretion of the instructor.

BLUE assignments are to be completed only by four-credit students.

During PURPLE lecture periods students will meet for Lab Simulation tutorials in Engineering Hall (EH) 406B1.