

Modern Algebra Spring 2022						
Dates	Week	Monday	Tuesday	Wednesday	Thursday	Friday
01/17/2022 01/22/2022	1	MLK Jr. Day	<i>math autobio due</i>	Intro, Chapter 1 (Well-Ordering, Division Algorithm)	WA 0 due	Chapter 1 (GCD, FTA)
01/24/2022 01/29/2022	2	Chapter 1 (Induction)	HW 1 due	Chapter 3 (Complex Numbers)	WA 1 due	Chapter 3 (Complex Numbers)
01/31/2022 02/05/2022	3	Chapter 4 (Modular Arithmetic)	HW 2 due	LaTeX, catch-up	WA 2 due	Chapter 4 (Zero Divisors, Quats)
02/07/2022 02/12/2022	4	Chapter 5 (Fields)	HW 3 due	Chapter 5 (Subfields)	WA 3 due	Chapter 6 (Solvability by Radicals)
02/14/2022 02/19/2022	5	Chapter 6 (Solvability by Radicals)	HW 4 due	Chapter 7 (Rings)	WA 4 due	Chapter 7 (Rings)
02/21/2022 02/26/2022	6	Chapter 7 (Rings)	HW 5 due	Chapter 8 (Polynomial Rings)	WA 5 due	Chapter 8 (Polynomial Rings)
02/28/2022 03/05/2022	7	Chapter 9 (PIDs)	HW 6 due	Chapter 9 (PIDs)	EXAM 1 Ch 1-8	Ring Homomorphisms
03/07/2022 03/12/2022	8	Chapter 10 (Algebraic Elements)	HW 7 due	Chapter 10 (Algebraic Elements)	Final Paper First Draft due	Chapter 11 (Irreducibility)
03/14/2022 03/26/2022	break	<i>have a great spring break!</i>				
03/28/2022 04/02/2022	9	Chapter 12 (Extension Fields as Vector Spaces)	HW 7 due	Chapter 13 (Auts of Fields)	WA 6 due	Chapter 14 (Counting Auts)
04/04/2022 04/09/2022	10	Chapter 15 (Groups)	WELLNESS DAY	Chapter 15 (Groups)	WA 7 due	Chapter 16 (Permutation Groups)
04/11/2022 04/16/2022	11	Chapter 17 (Group Homomorphisms)	HW 8 due	Chapter 18 (Subgroups)	WA 8 due	Chapter 19 (Generators)
04/18/2022 04/23/2022	12	Chapter 20 (Cosets)	HW 9 due	Chapter 21 (Lagrange)	EXAM 2 Ch 9-18	Chapter 23 (Normal Subgroups)
04/25/2022 04/30/2022	13	Chapter 23 (Quotient Groups)	HW 10 due	Chapter 25 (Galois Revisited)	WA 9 due	Chapter 26 (Solvable Groups)
05/02/2022 05/07/2022	14	Chapter 26 (Solvable Groups)	HW 11 due	Chapter 27-28	WA 10 due	Chapters 27-28
05/09/2022 05/14/2022	15	Catch up/Review	C&C Day			
05/16/2022 05/21/2022	16	Final Exam Final Paper		Yellow material: Exam 1 Orange material: Exam 2	Red material: emphasized on Final Exam Final paper is cumulative	