## Elementary Chemistry

## CHEM 1110

## Spring 2022

Instructor: Matthew Rowley Office Hours: Daily 10:00 am – 11:00 am

**Telephone:** (435) 586-7875

Email: matthewrowley1@suu.edu Office: SC-220

Please include the course number in the subject line of all correspondence.

## **Tentative Schedule**

This class will meet on Mondays, Wednesdays, and Fridays from 2:00-2:50 in room 114 of the science center (SC):

For the best lecture experience, read the indicated textbook chapter *before* each lecture.

	Date	Topic	Chapter
Week 1	M, Jan. 10	Chemistry: The Central Science	1.1–1.2
	W, Jan. 12	Elements and the Periodic Table	1.3–1.6
	F, Jan. 14	Measuring Physical Quantitites	1.7-1.9
Week 2	M, Jan. 17	Martin Luther King Day – No Class!	
	W, Jan. 19	Numbers and Math in Chemistry	1.10-1.12
	F, Jan. 21	Temperature, Heat, and Derived Units	1.13-1.14
Week 3	M, Jan. 24	Atoms, Elements, and Isotopes	2.1-2.3
	W, Jan. 26	Atomic Weight, Periodic Table, and Atomic Structure	2.4-2.6
	F, Jan. 28	Electron Configuration	2.7-2.9
Week 4	M, Jan. 31	Catch-up/Review Day - Midterm Exam 1 (Ch. 1–2)	
	W, Feb. 2	Ions and Ionic Bonds	3.1-3.4
	F, Feb. 4	Ionic Compounds	3.5-3.7

	Date	Topic	Chapter
Week 5	M, Feb. 7	Naming Ionic Compounds	3.8-3.11
	W, Feb. 9	Molecular Compounds	4.1-4.3
	F, Feb. 11	Covalent Bonds and Molecules	4.4-4.7
Week 6	M, Feb. 14	Molecular Structure	4.8-4.9
	W, Feb. 16	Polarity and Binary Molecular Compounds	4.10-4.11
	F, Feb. 18	Catch-up/Review Day - Midterm Exam 2 (Ch. 3	<b>-4)</b>
Week 7	M, Feb. 21	President's Day – No Class!	
	W, Feb. 23	<b>Balancing Chemical Reactions</b>	5.1-5.3
	F, Feb. 25	Classes of Chemical Reactions	5.4-5.6
Week 8	M, Feb. 28	Spring Break – No Class!	
	W, Mar. 2	Spring Break – No Class!	
	F, Mar. 4	Spring Break – No Class!	
Week 9	M, Mar. 7	Redox Reactions	5.7-5.8
	W, Mar. 9	Chemical Calculations I	6.1-6.3
	F, Mar. 11	Chemical Calculations II	6.4-6.5
Week 10	M, Mar. 14	Chemical Reactions: Energy and Rates	7.1-7.3
	W, Mar. 16	Chemical Reactions: Equilibrium	7.4-7.6
	F, Mar. 18	Equilibrium Equations	7.7-7.9
Week 11	M, Mar. 21	Catch-up/Review Day - Midterm Exam 3 (Ch. 5	<del>-7</del> )
	W, Mar. 23	Gases and Kinetic Molecular Theory	8.1-8.3
	F, Mar. 25	Pressure and Gas Laws	8.4-8.7
Week 12	M, Mar. 28	Gas Laws	8.8–8.11
	W, Mar. 30	Festival of Excellence – No Class!	
	F, Apr. 1	Liquids and Solids	8.12-8.15

	Date	Topic	Chapter
Week 13	M, Apr. 4	Solutions	9.1-9.4
	W, Apr. 6	Solubility and Dilution	9.5-9.9
	F, Apr. 8	Ions in Solution: Electrolytes	9.10-9.13
Week 14	M, Apr. 11	Acids and Bases	10.1–10.5
	W, Apr. 13	Acids and Bases – Calculations	10.6–10.10
	F, Apr. 15	<b>Buffers and Titrations</b>	10.11-10.14
Week 15	M, Apr. 18	Catch-up/Review Day - Midterm Exam	4 (Ch. 8–10)
	W, Apr. 20	Nuclear Chemistry	11.1–11.5
	F, Apr. 22	Nuclear Chemistry and Radiation	11.6–11.11
Finals Week	R, Apr. 28	Final Exam – 1:00–2:50 Bring a pencil	and scantron!