

Math 163 – List of Topics

The exercises in the following textbook sections are *not* to be handed in for marking. Instead, you are encouraged to work on these exercises as part of your studying for the course.

Topic	Section	Title
Logic	1.1	Sets
	1.2	Subsets
	1.3	Operations on Sets
	1.4	Venn Diagrams
	1.5	Intro to Logic
	1.6	Logical Equivalence
	1.7	Algebra of Sets
	1.8	Boolean Algebra
	1.9	Laws of Logic
	1.10	More Laws of Logic
		1.11
	1.12	The Biconditional
Relational Algebra	2.1	Relations
	2.2	Relational Algebra
Sequences & Series	3.1	Sequences and Series
	3.2	Arithmetic Sequences and Series
	3.3	Geometric Sequences and Series
Trigonometry	4.1	Introduction to Trigonometry
	4.2	Solving Right Triangles
	4.3	Applications in Computer Graphics
	4.4	Radians and Trig Functions of Any Angle
Exponents & Logs	5.1	Exponential Functions
	5.2	Logarithmic Functions
	5.3	Properties of Logs
	5.4	Solving Equations
	5.5	Applications
Probability & Stats	6.1	Counting Techniques
	6.2	Combinations and Permutations
	6.3	Probability
	6.4	Statistical Quantities
	6.5	The Empirical Rule

Note:

- The colour banding indicates the quiz cutoffs. For example, Quiz 1 will test Logic sections 1.1 to 1.10 inclusive, while Quiz 2 will include sections from 1.11 up to and including section 3.3.