

Unit	Title	Estimated hours	Date
FP2 – Term 1			
1 1 2	Solving Inequalities	4	HT1 week 1-2
	By algebraic manipulation		
	Graphically including modulus		
2 .1	Series	1	HT1 week 3
	Using the method of differences to sum simple finite series.		
3 .1 .2 .3 .45 .6	Complex numbers	5	HT1 week 3-5
	Modulus-argument form		
	Euler's relation		
	Multiplying and dividing complex numbers		
	De Moivre's theorem and its application to solving trig identities.		
	Mock Exam		
	Using De Moivre's theorem to solve the nth roots of a complex number.		
3 .78 .9	Further complex numbers	4	HT2 week 1-2
	Argand diagrams – locus and regions		
	Transformations to map points from the z plane to the w plane		
4 .1 .23 .4	First order differential equations	4	HT2 week 3-4
	First order with separable variables and sketching solution curves.		
	Solving exact equations and using an integrating factor.		
	Using a given substitution.		
5 .123 .23 .4	Second order differential equations	2	HT2 week 5
	Finding the general solution to linear homogeneous eqns using an auxiliary equation.		
	Mock exam	2	HT2 week 6
	General solutions to non homogeneous equations	2	HT2 week 7
		28 hours	
Term 2			
5 .5 .6	Further second order differential equations	4	HT3 week 1-2
	Using boundary conditions to find specific solutions		

	Using a given substitution.		
6	Maclaurin and Taylor series	4	HT3 week 3-4
.1	Finding and using higher derivatives of functions		
.23	Maclaurin's expansion		
.4	Taylor's expansions		
.5	Mock Exam	2	HT3 week 5
	Using the Taylor series method to solve differential equations	2	HT3 week 6
7	Polar coordinates	6	HT4 week 1-3
	Polar and Cartesian coordinates		
.1	Polar and Cartesian equations of curves		
.2	Curve sketching		
.3	Areas using polar coordinates		
.4	Tangents parallel and perpendicular to the initial line		
.5	Mock Exam	2	HT4 week 4
3.4	De Moivre's theorem proof by induction	2	HT4 week 5
		22 hours	

