

Topic List for the Yr 7 SKI Assessment June 2025		Sparx Code	R	A	G
Sequences:	Describe and predict the next term in a sequence	M381			
	Recognise the difference between linear and non linear sequences	M981			
	Explain the term-to term rule for numerical sequences	M116			
	Generate sequences given an algebraic rule	M991			
	Find missing numbers in a sequence	M166			
	Find the nth term for a sequence	M991			
Understand and use notation	Use diagrams and letters in function machines	M813, M830			
	Substitute values into two step expressions	M175, M417			
	Represent one and two step functions graphically	M979			
Equality, equivalence and equations	Solve one step linear equations using inverse functions + and -	M707			
	Solve one step linear equations using inverse functions x and divide	M707			
	Understand the terms like and unlike	M795			
	Simplify algebraic expressions	M795, M531			
	To expand and simplify brackets	M792			
	To factorise into a single bracket	M100			
	To solve one and two step equations	M634			
	To solve complex two step equations	M855			
	To solve equations with unknowns on both sides	M554			
Place value	Recognise the place value of any number including decimals	M704, M522			
	Work out intervals on a number line and position of numbers	M763			
	Compare numbers using inequalities	M384			
FDP, Fractions and percentages of amounts	To represent any fraction as a diagram	M939			
	To identify and use equivalent fractions	M410			
	To order fractions, decimals and percentages	M264			
	To convert fluently between fractions decimals and percentages	M264			
	To find the fraction of an amount with and without a calculator	M695, M684			
	To find the percentage of an amount with and without a calculator	M437, M905			
	To work with percentage change	M533			
	To find the original amount	M528			
Four operations	To solve percentage problems	M533, M528			
	To use formal methods for addition and subtraction including decimals	M429, M151			
	To use formal methods to multiply and divide including decimals	M803, M491			
Operations with directed number	To use understand the order of operations and the use of BIDMAS	M521			
	To understand directed numbers	M527			
	To add and subtract directed number	M106			
	To multiply and divide directed number	M288			
	To evaluate algebraic expressions with directed number	M855			
Fractional thinking	To explore roots of positive numbers, explore higher powers and roots	M135			
	To convert between mixed and improper fractions	M601			
	To add and subtract fractions with any denominator	M835			
Multiplying and dividing fractions	To add and subtract mixed number fractions	M931			
	To multiply fractions by integers	M157			
	To find the product of any pair of fractions	M157			
	To divide any pair of fractions	M110			
	To understand and use reciprocal	M216			
	To multiply improper and mixed fractions	M197			
Angles	To divide improper and mixed fractions	M265			
	To know and use the basic angles rules to solve angle problems	M502			
	To use properties of shapes to solve angle problems	M351, M679			
	To solve angle problems with parallel lines	M606			
	To use and find the sum of angles in a polygon	M653			
		M393			