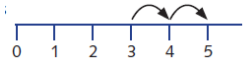
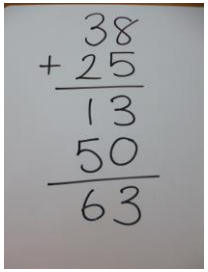
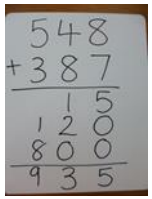
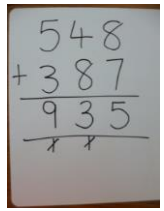
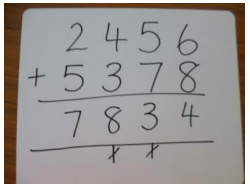
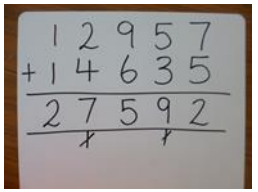
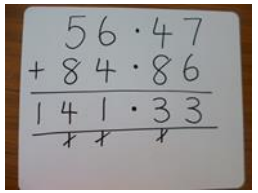
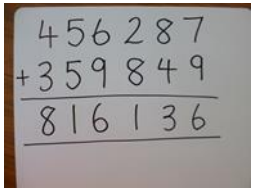
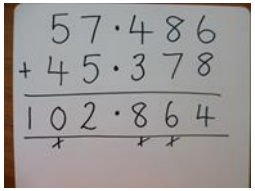
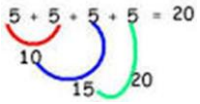
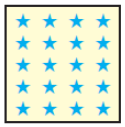
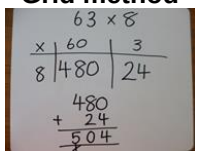
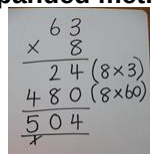
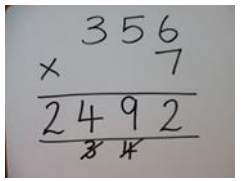
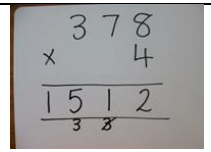
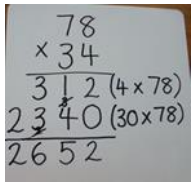
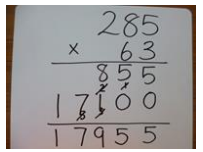
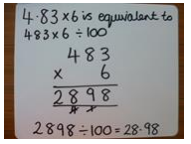
Paddox Primary School Calculations Policy
Progression in Addition

Year Group	Year R	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Expectation	Add numbers with one digit numbers using objects and pictures. 5 + 2 =	Add numbers with two digits and a one digit using number lines. 19 + 6 =	Add numbers with two digits using expanded written method. 49 + 12 =	Add numbers with up to three digits using expanded written method followed by formal compact written method. 652 + 563 =	Add numbers with up to four digits using formal compact written method. Including numbers involving money. 2456 + 5378 = £13.56 + £38.54 =	Add numbers with more than four digits and decimals with up to two decimal places using formal compact written method. 14623 + 11324 = 56.47 + 84.86 =	Add numbers with more than four digits and decimals with up to three decimal places using formal compact written method. 456287 + 359849= 57.486 + 45.378 =
Examples				 		 	 

Vocabulary: add, more, plus, make, sum, total, altogether, addition, carry tens, carry ones, carry hundreds, double, near double, inverse, equals, increase,

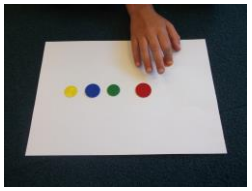
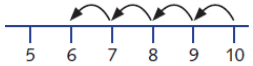
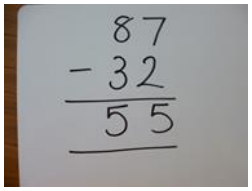
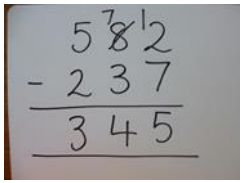
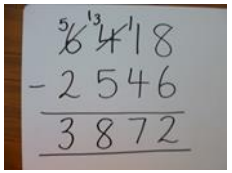
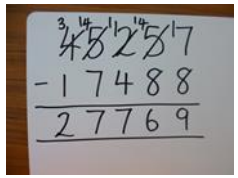
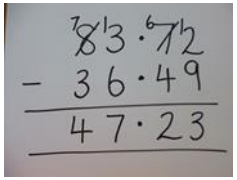
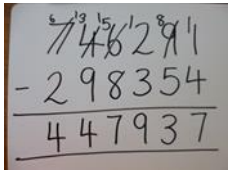
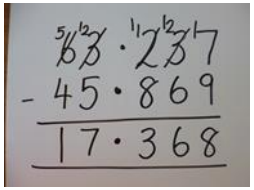
Paddox Primary School Calculations Policy
Progression in Multiplication

Paddox

Year Group	Year R	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Expectation			Recall and use 2, 5 and 10 times tables.	Recall and use 2, 3, 4, 5, 8 and 10 times tables.	Recall and use all times tables up to 12 x 12.	Use knowledge of times tables up to 12 x 12 to derive related multiple facts	Use knowledge of times tables up to 12 x 12 to derive related multiple facts and related decimal facts.
	Repeated addition using concrete objects. 5 + 5 =	Multiply through doubling and grouping small quantities 10 + 10 + 10 =	Multiply using arrays 5 x 4 = 5 lots of 4 4 lots of 5	Multiply a two-digit number by a one-digit number using grid method followed by expanded written method. 63 x 8 =	Multiply a two-digit or three-digit number by a one-digit number using formal written method for short multiplication 63 x 8 = 356 x 7 =	Multiply up to four-digit numbers by one digit numbers using formal written method for short multiplication. Multiply up to three-digit numbers by two-digit numbers using formal written method for long multiplication. 3524 x 5 = 378 x 12 =	Multiply up to four-digit numbers by two-digit numbers using formal written method for short multiplication. Multiply up to one-digit with up to two decimal places by a two-digit number using formal written method for short multiplication. 234 x 14 = 253 x 12 = 7.56 x 12 =
Examples	2 + 2 + 2 = 		 4 × 5 = 20 5 × 4 = 20	Grid method  Expanded method 		 	 

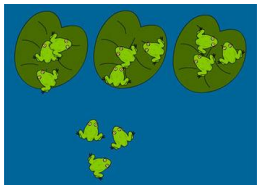
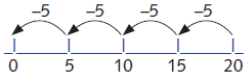
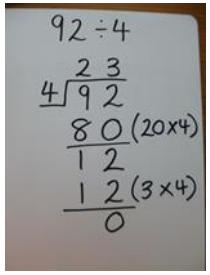
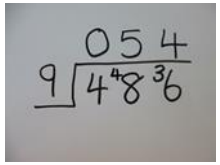
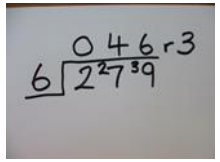
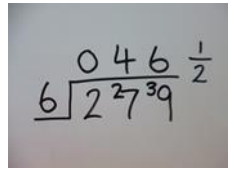
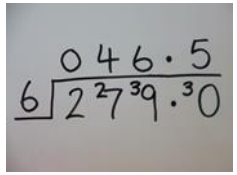
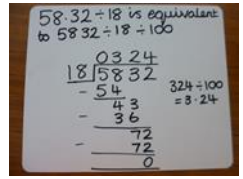
Vocabulary: lots of , groups of, times, multiply, multiple of, product, once…twice….ten times…, repeated addition, array, row, column, double, carry.

Paddox Primary School Calculations Policy
Progression in Subtraction

Year Group	Year R	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Expectation	Subtract a single digit number from a single digit number or from 10, using concrete objects or pictures. 5 – 3 = 10 – 7 =	Subtract a one and two digit numbers to 20, using pictures and number lines. 10 – 4 = 9 – 5 =	Subtract two, two-digit numbers (without exchanging), using partitioning followed by written method. 46 – 15 =	Subtract two numbers with up to three digits which need exchanging, using the formal written method. 582 - 237 =	Subtract two numbers with up to four digits which need exchanging including money, using the formal written method. 6418 - 2546 = £24.26 - £17.58 =	Subtract two numbers with more than four digits. Subtract decimals with up to two decimal places. 45257 – 17488 = 83.72 – 36.49 =	Subtract two numbers with more than four digits. Subtract decimals with up to three decimal places. 746291 – 298354 = 63.237 – 45.869 =
Examples						 	 

Vocabulary: subtract, subtraction, take away, minus, decrease, leaves, count back, count up, how many left, half, find the difference, less, fewer, inverse, exchange.

Paddox Primary School Calculations Policy
Progression in Division

Year Group	Year R	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Expectation	12 frogs shared between 3 lily pads Share objects between equal groups.	Share quantities into small groups and recognise sharing in two groups as halving. 20 ÷ 2 =	Share and group between 2,5 and 10 using pictures and use repeated subtraction on number lines. 20 ÷ 5 =	Divide a two-digit number by a one-digit number (without remainders) using the expanded written bus stop method. 92 ÷ 4 =	Divide a two-digit or three-digit number by a one digit number (without remainders) using the formal written bus stop method. 486 ÷ 9 =	Divide up to four-digit numbers by a one digit number (with remainders as whole numbers, fractions and decimals) using the formal written bus stop method. 279 ÷ 6 =	Divide up to two decimal places by a two-digit whole number using the formal written bus stop method. 58.32 ÷ 18 =
Examples						  	

Vocabulary: share, share equally, one each, two each, in groups, in sets, in pairs, equal groups of, divide, division, divided by, remainder, factor, quotient, divisible by, inverse.