

Key Learning in Mathematics – Nursery

Number – counting	Number – number sense	Measurement
Rote counting <ul style="list-style-type: none"> Take part in finger rhymes with numbers (birth to 3) Rote count from 1 to 5 (3 & 4 year olds) Recite numbers past 5 (3 & 4 year olds) Rote count back from 5 to 1 or 0 (3 & 4 year olds) Counting objects <ul style="list-style-type: none"> Counting-like behaviour, such as making sounds, pointing or saying some numbers in sequence (birth to 3) Understand that counting is to find out how many (birth to 3) Say one number for each item in order: 1, 2, 3, 4, 5 (3 & 4 year olds) Know the last number reached when counting a small set of objects tells you how many there are in total ('cardinal principle') (3 & 4 year olds) Count in everyday contexts, sometimes skipping numbers – '1-2-3-5' (birth to 3) Count reliably up to 5 in everyday contexts (3 & 4 year olds) Show 'finger numbers' up to 5 (3 & 4 year olds) Understand and use conservation of number (3 & 4 year olds) Use the word 'zero' to represent 'none' (3 & 4 year olds) Compare amounts, saying 'lots', 'more' or 'same' (birth to 3) Compare quantities using language: 'more than', 'fewer than' (3 & 4 year olds) Fast recognition of up to 3 objects, without having to count them individually (subitising) (3 & 4 year olds) Solve real world mathematical problems with numbers up to 5 (3 & 4 year olds) 	<ul style="list-style-type: none"> Know that numbers greater than 1 can be made in different ways (3 & 4 year olds) Practically partition a number up to 5 into two parts, identifying the amount in each part (3 & 4 year olds) Number – number recognition <ul style="list-style-type: none"> Recognise and identify numerals 0 to 5 (3 & 4 year olds) Link numerals and amounts: for example, showing the right number of objects to match the numeral, up to 5 (3 & 4 year olds) Number – graphics <ul style="list-style-type: none"> Experiment with their own symbols and marks as well as numerals (3 & 4 year olds) Represent and explain their thinking in their own ways (birth to 3) Number – calculating <ul style="list-style-type: none"> React to changes of amount in a group of up to three items (birth to 3) Use concrete equipment to find one more and one less than a given number up to 5 (3 & 4 year olds) 	Distance <ul style="list-style-type: none"> Describe and compare sizes using gesture and language – 'bigger/little/smaller', 'high/low', 'tall', (birth to 3) Make comparisons between objects relating to size, length and height e.g. longer / shorter; wider / narrower; taller / shorter (3 & 4 year olds) Find an object of similar length/width/height (3 & 4 year olds) Weight <ul style="list-style-type: none"> Describe and compare weights using gesture and language – 'heavy' (birth to 3) Make comparisons between objects relating to weight e.g. heavier/lighter (3 & 4 year olds) Volume/capacity <ul style="list-style-type: none"> Use language of full and empty to describe the amount in different containers (birth to 3) Make comparisons between objects relating to capacity e.g. more/less (3 & 4 year olds) Money <ul style="list-style-type: none"> Understand that we need to pay for goods (3 & 4 year olds) Talk about things they want to spend their money on (3 & 4 year olds) Talk about different ways we can pay for things (3 & 4 year olds) Recognise that there are different coins and notes (3 & 4 year olds) Time <ul style="list-style-type: none"> Talk about significant times of the day, e.g. home time, lunch time, snack time, bed time, etc. (birth to 3) Understand and use language – before, after, yesterday, today, tomorrow (3 & 4 year olds) Begin to describe a sequence of events, real or fictional, using words such as 'first', 'then...' (3 & 4 year olds) Know some names of the days of the week (3 & 4 year olds)
Shape	Space	
<ul style="list-style-type: none"> Combine objects like stacking blocks and cups (birth to 3) Talk about and explore 2D and 3D shapes (for example, circles, rectangles, triangles and cuboids) using informal mathematical language: 'sides', 'corners'; 'straight', 'flat', 'round' (3 & 4 year olds) Know that shapes can appear in different ways and be different sizes (3 & 4 year olds) Build with a range of resources (birth to 3) Complete inset puzzles (birth to 3) Select shapes appropriately: flat surfaces for building, a triangular prism for a roof etc. (3 & 4 year olds) Combine shapes to make new ones – an arch, a bigger triangle etc. (3 & 4 year olds) 	<ul style="list-style-type: none"> Put objects inside others and take them out again (birth to 3) Climb and squeezing selves into different types of spaces (birth to 3) Understand position through words alone – for example, "The bag is under the table," – with no pointing (3 & 4 year olds) Describe a familiar route (3 & 4 year olds) Discuss routes and locations, using words like 'in front of' and 'behind' (3 & 4 year olds) Notice patterns and arrange things in patterns (birth to 3) Talk about and identifies the patterns around them. For example, stripes on clothes, designs on rugs and wallpaper. Use informal language like 'pointy', 'spotty', 'blobs' etc. (3 & 4 year olds) Extend and create ABAB patterns – stick, leaf, stick, leaf (3 & 4 year olds) Notice and correct an error in a repeating pattern (3 & 4 year olds) 	
Statistics		
<ul style="list-style-type: none"> Sort objects and say what features they have in common (3 & 4 year olds) 		