

Models and images (CPA): Same & Different / 5 frames (10 frames) / Odd One Out / Correct or Not Correct / Maths Pictures / BAS resources

Mathematical Language <i>*including shape, space and measure</i>	Number: Counting and calculating skills	Number Pattern, Comparisons and Relationships <i>*including shape, space and measure</i>	Number Recognition, Mark Making /Number Formation
<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Begin to recite numbers in order to 5                             <ul style="list-style-type: none"> <li>□ String level, a continuous sound e.g. 1, 2, 3 / 1, 2, 3, 4 ....</li> <li>□ Recognise numbers as separate words but may not be able to break the sequence, always starting from 1</li> </ul> </li> <li>▪ Use some number names spontaneously in:                             <ul style="list-style-type: none"> <li>□ Play</li> <li>□ Daily routine</li> </ul> </li> <li>▪ Begin to use some number names and the word ‘number’ in play</li> <li>▪ Use language of quantities, such as ‘more’ and ‘lots’ with increasing confidence</li> <li>▪ Use language of ‘same’ when:                             <ul style="list-style-type: none"> <li>□ Matching objects</li> <li>□ Matching numerals</li> </ul> </li> <li>▪ Begin to understand ‘different’</li> <li>▪ Begin to use some number language of ‘quantities’ spontaneously</li> <li>▪ Begin to understand ‘less’ through acting out and using props when singing number rhymes</li> <li>▪ Begin to understand ‘how many are left’ from number rhyme experiences</li> <li>▪ Begin to compare objects, using appropriate vocabulary, according to                             <ul style="list-style-type: none"> <li>□ Space</li> <li>□ Size - big / little / smaller</li> <li>□ Height – low / tall / high</li> <li>□ Weight – heavy</li> </ul> </li> <li>▪ Begin to talk about shapes:                             <ul style="list-style-type: none"> <li>□ Describe some shape properties, using vocabulary e.g. <i>round, pointy, corners</i></li> </ul> </li> <li>▪ Begin to understanding some talk about immediate, past and future through daily routine e.g. <i>Next we are going to / Mummy is coming later</i></li> <li>▪ Begin to anticipate specific time-based events e.g. <i>snack time /home time</i></li> <li>▪ Begin to follow some instruction using positional language within daily routine / self-care routines / familiar activities</li> </ul> <p style="text-align: right;"><i>* Also see linked vocabulary overview</i></p>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Begin to join in with number rhymes familiar and new                             <ul style="list-style-type: none"> <li>□ Using props to represent number</li> <li>□ Using fingers to represent numbers</li> <li>□ Request favourite rhyme using rhyme box / bag with props</li> </ul> </li> <li>▪ Select a small number of objects from a group when asked e.g. <i>please give me one/two</i></li> <li>▪ Begin to explore one to one correspondence by movement of objects e.g. <i>1 spoon for each teddy, 1 peg in each box (ONE TO ONE PRINCIPLE)</i></li> <li>▪ Begin to recognise that there is an order to counting (STABLE ORDER PRINCIPLE)</li> <li>▪ Begin to represent numbers, using fingers e.g. <i>asking for 1 or 2 objects</i> <ul style="list-style-type: none"> <li>□ Know they can use their fingers to count but not always accurate with the number they use</li> </ul> </li> <li>▪ Begin to assign one counting word to each of the objects to be counted, 1 to 3 (ONE TO ONE PRINCIPLE)</li> <li>▪ Begin to make repeating patterns using 2 objects (ONE TO ONE PRINCIPLE)</li> <li>▪ Begin to know that numbers identify how many objects are in a set (CARDINAL PRINCIPLE)</li> <li>▪ Begin to know that a group of things changes in quantity when something is added or taken away                             <ul style="list-style-type: none"> <li>□ Adding more objects into a group</li> <li>□ Singing / acting out number rhymes</li> </ul> </li> <li>▪ Begin to make comparison between quantities                             <ul style="list-style-type: none"> <li>□ Identify which set has ‘more’</li> </ul> </li> <li>▪ Begin to show an interest in number problems:                             <ul style="list-style-type: none"> <li>□ More milk cartons are needed at Snack Time so everyone has one</li> <li>□ Finding two matching shoes</li> </ul> </li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Manipulate objects to begin to develop an understanding of number                             <ul style="list-style-type: none"> <li>□ Complete inset puzzles</li> <li>□ Place single objects in a set of tins / nesting boxes</li> </ul> </li> <li>▪ Sort / match objects and label                             <ul style="list-style-type: none"> <li>□ Create groups by different criteria e.g. <i>theme, colour, size, shape ...</i></li> <li>□ Name each group</li> </ul> </li> <li>▪ Begin to recognise and match some early number patterns e.g. <i>dice, dominoes, numicon</i></li> <li>▪ Begin to notice different patterns                             <ul style="list-style-type: none"> <li>□ In the environment</li> <li>□ Within resources e.g. <i>stripes on small world zebra</i></li> <li>□ Photographs / illustrations</li> <li>□ Daily routine</li> </ul> </li> <li>▪ Begin to make arrangements / pattern with objects                             <ul style="list-style-type: none"> <li>□ Line up objects</li> <li>□ Copy a short pattern with one attribute e.g. ABABAB...</li> </ul> </li> <li>▪ Begin to talk about arrangement of objects, naming pattern e.g. <i>leaf / conker / leaf; red / blue / red; big / small / big; circle / line / circle</i></li> <li>▪ Begin to notice what is the same / different about two groups of objects / pattern</li> <li>▪ Show an interest in shapes and space in play / exploration                             <ul style="list-style-type: none"> <li>□ Make arrangements</li> <li>□ Select and rotate shapes to fit into a given space</li> <li>□ Begin to select shapes for a purpose</li> <li>□ Make constructions / drawings, including enclosures</li> </ul> </li> <li>▪ Begin to show interest in shapes in the environment                             <ul style="list-style-type: none"> <li>□ Point to some shapes that they notice / like</li> <li>□ Trace some shapes that they like e.g. <i>shape of bricks</i></li> </ul> </li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Begin to show interest in numerals in the environment                             <ul style="list-style-type: none"> <li>□ Identify a numeral(s) in the immediate learning environment, indoors &amp; outdoors. within displays, resources – pointing to numbers</li> </ul> </li> <li>▪ Begin to show curiosity about numbers e.g. <i>looking at number books; pointing to number on the car and asking what number it says</i></li> <li>▪ Begin to show an interest in representing numbers e.g. <i>tracing numbers with fingers</i></li> </ul>

**OUTCOMES: Emerging Three & Four Year Olds**  
*Development Matters 2020*

- Practitioners observing children as they engage in a range of learning experiences.
- Assessment judgements to be made on what children can do independently within a range of contexts

Models and images (CPA): Same & Different / 5 frames (10 frames) / Odd One Out / Correct or Not Correct / Maths Pictures / BAS resources / Split Me Up (Part Whole Model) / Star centre / Match Me Up / Picture Maths

Mathematical Language <i>*including shape, space and measure</i>	Number: Counting and calculating skills	Number Pattern, Comparisons and Relationships <i>*including shape, space and measure</i>	Number Recognition, Mark Making /Number Formation
<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>Recite numbers in order to 5 with accuracy, recognising numbers as separate words</li> <li>Use some number names accurately in play</li> <li>Use language of 'same / different' when comparing small sets e.g. <i>when playing dominoes, rolling two dice with spots, sorting / matching objects</i></li> <li>Begin to use the language of 'more than' / 'fewer than'</li> <li>Use some previously learnt number language of 'quantities' spontaneously</li> <li>Understand <b>'how many are left'</b> from number rhymes experiences</li> <li>Begin to use the word 'less' when acting out and using props to sing number rhyme</li> <li>With support begin to use full sentences when comparing sets e.g. <i>there are more cars than boats</i></li> <li>Show curiosity about numbers                             <ul style="list-style-type: none"> <li>Offering comments e.g. <i>I am 4'. My baby is 1. My bike is number 2</i> □ Asking questions e.g. <i>Is this number 4? Where is number 2?</i></li> <li>Compare objects, using appropriate vocabulary, according to                                     <ul style="list-style-type: none"> <li>Size - big / little / smaller / smallest □ Space □ Height – low / tallest / highest / □ Weight – heaviest</li> </ul> </li> </ul> </li> <li>Begin to talk about shapes using new vocabulary                             <ul style="list-style-type: none"> <li>Describe some shape properties, using vocabulary e.g. <i>flat, side, straight</i></li> </ul> </li> <li>Continue to develop understanding of measure                             <ul style="list-style-type: none"> <li>Size e.g. <i>Will teddy fit in the box? How can we find out?</i> □ Capacity – <i>Is the jug full or empty?</i></li> </ul> </li> <li>Begin to develop an understanding of time                             <ul style="list-style-type: none"> <li>Follow the visual timetable □ Understand some talk about immediate, past and future – next / later / after</li> </ul> </li> <li>Begin to use the vocabulary of money - pennies</li> <li>Continue to follow some instruction using positional language within daily routine / self-care routines / familiar activities</li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>Join in with number rhymes familiar and new, using objects / fingers to present quantity</li> <li>Explore one to one correspondence in a range of contexts e.g. <i>giving each teddy a plate, knife and fork</i> (ONE TO ONE PRINCIPLE)</li> <li>Select a small number of objects from a group when asked e.g. <i>please give me two / three</i></li> <li>Know that numbers identify how many objects are in a set (CARDINAL PRINCIPLE)</li> <li>Recognise that there is an order to counting (STABLE ORDER PRINCIPLE) – one number for each object</li> <li>Explore and use number resources in play, beginning to see counting opportunities e.g. <i>making patterns in the playdough using numicon pieces</i></li> <li>Begin to use fingers to represent number in a range of contexts</li> <li>Begin to count up to 3/4 objects by saying one number name for each item in a range of contexts (ONE TO ONE PRINCIPLE)</li> <li>Begin to realise that not only objects, but anything can be counted e.g. <i>steps, claps, jumps, chimes on a clock</i> (ABSTRACTION PRINCIPLE)</li> <li>Begin to match numeral and quantity correctly (1 to 3)</li> <li>Show an interest in number problems:                             <ul style="list-style-type: none"> <li>Parking bike in right bay – matching numicon to numicon image □ Using money in the role play</li> </ul> </li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>Manipulate objects to continue to develop an understanding of number                             <ul style="list-style-type: none"> <li>Sort / match objects and label and begin to talk about                                     <ul style="list-style-type: none"> <li>Find the odd one out □ Notice what is the same / different</li> </ul> </li> <li>Notice and begin to talk about pattern in the environment</li> </ul> </li> <li>Make arrangements / patterns with a range of objects and begin to talk about them                             <ul style="list-style-type: none"> <li>Copy a pattern with one attribute e.g. <i>button / leaf / button</i></li> </ul> </li> <li>Begin to suggest what might come next in a pattern (ABABAB)</li> <li>Explore pattern using actions e.g. <i>clapping</i></li> <li>Begin to separate a group of 3 / 4 objects in different ways. Begin to recognise that the total is still the same</li> <li>Continue to recognise and match some number patterns e.g. <i>dice, dot flash cards, dominoes</i></li> <li>Develop fast recognition of 1 / 2 objects in groups, not having to count (SUBITISING)</li> <li>Compare two groups of objects, saying when they have the 'same / different' number</li> <li>Show awareness of similarities of shapes in the environment                             <ul style="list-style-type: none"> <li>Take part in a Shape Treasure Hunt</li> </ul> </li> <li>Show interest in shape by sustained construction activity                             <ul style="list-style-type: none"> <li>Begin to build with purpose in mind □ Name and talk about models</li> <li>Begin to join shapes together to create new ones, including to fit into a space</li> </ul> </li> <li>Begin to use shapes appropriately for tasks (2D &amp; 3D) e.g. <i>cutters in playdough</i></li> <li>Begin to make some comparisons                             <ul style="list-style-type: none"> <li>Size □ Length □ Weight □ Capacity</li> </ul> </li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>Show interest in numerals in the environment                             <ul style="list-style-type: none"> <li>Begin to use numerals/numbers purposefully e.g. <i>placing number candle on the birthday cake in the playdough area; using the emergency telephone list in the home corner</i></li> <li>Begin to identify numerals that are the same e.g. <i>number sort</i></li> <li>Begin to recognise some numbers of personal significance e.g. <i>age</i> (NOMINAL NUMBERS)</li> <li>Continue to show curiosity about numbers e.g. <i>looking at number books; pointing to number on the car and asking what number it says</i></li> <li>Begin to identify some numerals to 3 and say a number name (NOMINAL NUMBERS)</li> <li>Show increased curiosity about numbers e.g. <i>arrange wooden numbers in a line, join in a number board game</i></li> <li>Continue to show interest in representing numbers e.g. <i>tracing numbers with fingers, making playdough numbers (multi-sensory approach)</i></li> <li>Begin to explore number through marks / symbols / pictures                                     <ul style="list-style-type: none"> <li>Images to represent quantity □ Tally marks to represent quantity</li> </ul> </li> </ul> </li> </ul>
<p><b>OUTCOMES: Developing Three &amp; Four Year Olds</b> <i>Development Matters 2020</i></p>		<ul style="list-style-type: none"> <li>Practitioners observing children as they engage in a range of learning experiences.</li> <li>Assessment judgements to be made on what children can do independently within a range of contexts</li> </ul>	

Models and images (CPA): Same & Different / 5 frames (10 frames) / Odd One Out / Correct or Not Correct / Maths Pictures / Split Me Up (Part Whole Model) / Star centre / Match Me Up / Picture Maths / Eliminate Me / Pick A Pair / Convince Me / Target Boards / BAS resources

Mathematical Language <i>*including shape, space and measure</i>	Number: Counting and calculating skills	Number Pattern, Comparisons and Relationships <i>*including shape, space and measure</i>	Number Recognition, Mark Making /Number Formation
<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Begin to recite numbers beyond 5</li> <li>▪ Use the words ‘bigger’ and ‘smaller’ when comparing numbers</li> <li>▪ Use number names to 5 accurately in play</li> <li>▪ Use language of ‘same / different’ when comparing sets up to 5. Begin to use when separating a group of objects</li> <li>▪ Use the language of ‘more than’ / ‘fewer than’</li> <li>▪ Begin to use some language of addition in practical activities e.g. <i>and, add, altogether, makes</i></li> <li>▪ Use the word ‘less’ when acting out and using props to sing number rhyme and begin to use in a variety of number activities e.g. <i>can you give me one less than ..</i></li> <li>▪ With support begin to use some full sentences when comparing sets e.g. <i>there are fewer buttons than leaves</i></li> <li>▪ Talk about shapes, using range of vocabulary                             <ul style="list-style-type: none"> <li>□ Describe some shape properties, using vocabulary e.g. <i>round, pointy, corners, flat ...</i></li> </ul> </li> <li>▪ Continue to develop understanding of measure and begin to use some comparative language                             <ul style="list-style-type: none"> <li>□ Size e.g. <i>Which one is the tallest?</i> □ Capacity e.g. <i>Can you make the bucket full?</i> □ Order e.g. <i>Can you put the boxes in order by size?</i></li> </ul> </li> <li>▪ Continue to develop an understanding of time                             <ul style="list-style-type: none"> <li>□ Egg timers □ Understand some talk about immediate, past and future – before / after</li> </ul> </li> <li>▪ Continue to use the vocabulary of money – pennies</li> <li>▪ Follow instruction using positional language within daily routine / self-care routines / familiar activities</li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Join in with number rhymes familiar and new, using objects / fingers to present quantity</li> <li>▪ Begin to count up to 4/5 objects by saying one number name for each item in a range of contexts (ONE TO ONE PRINCIPLE)</li> <li>▪ Begin to count an irregular arrangement of up to 4/5 objects (ONE TO ONE PRINCIPLE)</li> <li>▪ Begin to count non-physical things to 4/5 e.g. <i>seen and not seen sounds</i> (ABSTRACTION PRINCIPLE)</li> <li>▪ Begin to count up to 4/5 objects from a larger group (ONE TO ONE PRINCIPLE)</li> <li>▪ Begin to find the total number of items in two groups, to 4/5, by counting all of them (AGGREGATION STRUCTURE) e.g. <i>range of practical resources, using 5 frame</i></li> <li>▪ Begin to find one more from a group of up to 5 objects</li> <li>▪ Begin to find one less from a group of 5 objects</li> <li>▪ Begin to estimate how many objects they can see and then check by counting them - up to 5 objects</li> <li>▪ Show an interest in number problems within a growing range of contexts                             <ul style="list-style-type: none"> <li>□ Joining in / finding out - how many children are in Key Person group / how many are missing □ Matching the numicon image to the numeral in the bike parking bay</li> </ul> </li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Manipulate objects to continue to develop an understanding of number</li> <li>▪ Sort / match objects and talk about them with developing confidence</li> <li>▪ Notice and correct an error in a repeating pattern (ABABA). Use talk to explain findings.</li> <li>▪ Continue a repeating pattern (ABABAB) using objects and actions. Name and talk about pattern.</li> <li>▪ Begin to create own repeating pattern (ABABA) using objects and actions. Name and talk about pattern.</li> <li>▪ Notice and talk about pattern in the environment</li> <li>▪ Begin to separate a group of up to 4/5 objects in different ways, beginning to recognise that the total is still the same e.g. <i>using numicon, 5 frame</i></li> <li>▪ Develop fast recognition of up to 3 objects (SUBITISING)</li> <li>▪ Continue to develop an interest in shapes                             <ul style="list-style-type: none"> <li>□ Being to combine two shapes together to make a new shape, including to join two spaces e.g. <i>an arch</i></li> </ul> </li> <li>▪ Begin to select a particular named shape                             <ul style="list-style-type: none"> <li>□ 2D - including circles, triangles, rectangles and squares</li> <li>□ 3D – including cubes, cuboids, pyramid and spheres</li> </ul> </li> <li>▪ Continue to make comparisons                             <ul style="list-style-type: none"> <li>□ Size □ Length □ Weight □ Capacity</li> </ul> </li> </ul>	<p>Children are taught to:</p> <ul style="list-style-type: none"> <li>▪ Continue to show curiosity about numbers e.g. <i>looking at number books; numberline</i></li> <li>▪ Begin to recognise numerals to 5 e.g. <i>number sort, sorting 1p, 2p and 5p coins; number hunt</i></li> <li>▪ Begin to order numbers 1 to 5 and discuss their position e.g. <i>2 comes after 1, 3 comes before 4</i> (ORDINAL NUMBERS)</li> <li>▪ Begin to link numeral to amount to 5</li> <li>▪ Record numbers using marks that can be shared</li> <li>▪ Begin to represent numbers through marks / symbols / pictures, developing 1:1 correspondence                             <ul style="list-style-type: none"> <li>□ Images to represent quantity</li> <li>□ Tally marks to represent quantity</li> </ul> </li> <li>▪ Begin to show some interest in forming some numbers                             <ul style="list-style-type: none"> <li>□ Sky writing □ Multi-sensory (different media)</li> </ul> </li> </ul>

**OUTCOMES: Secure Three & Four Year Olds**  
*Development Matters 2020*

- Practitioners observing children as they engage in a range of learning experiences.
- Assessment judgements to be made on what children can do independently within a range of contexts