**P.4 MATHEMATICS SCHEME TERM 1 2023**

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| **WK** | **PD** | **TOPIC** | **SUB-TOPIC** | **SUBJECT COMP.** | **COMPETENCES** | | **CONTENT** | **METHOD** | **ACTIVITIES** | **L/SKILL** | **T/LAIDS** | **REF** | **REM** |
| **SUBJECT** | **LANGUAGE** |
| 1 | 1 | set | set concept |  | **The learner;**  Describes a set.  Draws sets  Names the given sets  Counts members of a given set | **The learner;**  Reads, pronounces and spells new words  -sets  -member  -element | **A set** This is a collection of well defined objects / elements / members  -A member is a thing which belong to a set.  -An element is another name for a member  **Examples**  Name these sets   1. a , e, i, o, u A set of vowel letters 2. How many elements has set K?   K  Set K has 5 elements. | Guided discovery  Observation | Drawing sets  Naming sets  counting members of a set | Effective communication  Problem solving | Pens  Books  Rubbers  Leaves | A new MK book 4 page 1  St Bernard book 4 page 1 - 3 |  |
|  | 2 | sets | set concept |  | **The learner;**  Describes various types of sets  Draws the set symbols | **The learner;**  Reads, pronounces, spells and uses words  -empty sets  -equal sets  -equivalent sets  -union sets | **Empty sets (Null set)**  -An empty set is a type of set with no members / elements  -The symbol in or  **Examples**  1. Pupils in our class with blue pens  Not empty set  2. A boy with 7 legs  Empty set  P  3.  Set P is an empty set | Inquiry  Guided discovery | Describing types of sets  Drawing sets and symbols | Logical thinking  Critical thinking  Problem solving | Real objects like  -cups  -plates  -bottles | Fountain Primary Maths book4 page 5  A new MK primary Maths book 4 page 2  St. Beneral Maths book 4 page 4 – 5 |  |
|  | 3 | sets | set concept | Types of sets | **The learner;**  Describes the various types of sets  Draws sets and their symbols | **The learner;**  Reads, pronounces, spells and uses words  -equal sets  -non equal sets | **Equal sets**  -Equal sets are sets with the same number of members which are exactly the same.  -Non-equal sets are sets with the same number of elements which are not exactly the same  **Example 1**  **Z W**  t p p t  o o  Set Z and Set W are equal sets  **Example 2**  Given that R = (w,x,y,z), S=(a,b,c,d)  Set R and S are non-equal sets | Guided discovery  Discussion | Drawing sets  Matching equal sets | Critical thinking  Effective communication | Real objects like  -bottles  -pens  -plats  -pencils  -chalk | MK primary maths book 4 page 8  Fountain maths book 4 page 3 – 4 |  |
|  | 4 |  |  |  | **The learner;**  Describes the various types of sets  Draws sets and their symbols | **The learner;**  Reads, pronounces, spells and uses words  -equivalent  -non equivalent | **Equivalents sets**  -Equivalent sets are sets with the same number of members which not be exactly the same  Symbol:  -Non-equivalent sets are sets with different numbers of elements ( )  **Example 1**  A = ( , , , )    B = ( , , , )  Set A and B are equivalent sets  (Set A Set B) | Guided discovery  Inquiry | Describing  Drawing | Problem solving  Effective communication |  | A new MK primary Maths book 4 page 5 – 7  Fountain prmary maths book 4 page 6 – 7 |  |
|  | 5 |  |  |  | **The learner;**  Describes the various types of sets  Draws the sets and their symbols  Lists and finds the number of elements | **The learner;**  Reads, pronounces, spells and uses new words  -intersection sets | **Intersection sets**  These are sets with common members  Symbol:  **Example 1**  K L  1 2 5 7 9  3 4 6 8  i) List K L  K  L = ( 5, 6)  ii) (KL) = 2  **Example 2**    D = ( x, y, z, w) and K =(4, 5, 6, 7)  i) What is DK?  DK =  ii) Find  (DK) = 0 | Guided discovery  Discussion  Inquiry | Describing  Drawing | Problem solving  Effective communication |  | A new MK primary maths book 4 page 9 – 12  St. Bernard maths book 4 page 8 – 11 |  |
| 2 | 1 | Sets | Set concepts | Types of sets | **The learner;**  Describes the union set  Draws sets and their symbols  Counts members of the union set | **The learner;**  Reads, pronounces, spells, writes and uses key words  -union set | **Union sets**  This is a set of all elements that contains two or more given sets. Symbol “ ”  **Example 1**  Given that  T = ( Nabwire, Naginom Okotm Jane)  V=(Aziz, Nankunda, Nirabom Magino)  **What is T V?**  Nabwire Aziz  Okot Magino Nankunda  Jane Kirabo  T  **V = ( Nabwire, Okot, Jane, Magino, Aziz, Nankunda, Kirabo)**  **Find n(TV) = 7**  Note: Common members in union sets are always written or counted once.  **Example 2**  E=(2,3,5,8) and G=(1,4,6,7,9)  **Find EG**  EG =(1,2,3,4,5,6,7,8,9)  **n(EG) = 9 members**  **n(E∩G) E∩G =  n(E∩G) =0** | Inquiry  Guided discovery  Discussion | Listing elements of the union  Drawing venn diagrams | Problem solving  Effective communication | Real objects like  -cups  -pencils  -plates  -pens | A new primary maths book 4 page 13  Fountain primary mathematics book 4 page 8 – 10 |  |
|  | 2 | Sets | Set concepts |  | **The learner;**  Describes a subset  Identifies subsets  Draw subsets | **The learner;**  Reads, pronounces, spells and uses words correctly  -subset | **Sebsets**: This is a set of elements got from a given set  Symbol  **Example 1**  Describe the sets below  P Set Q is a sub set of set P.  Q  (Q P)  **Example 2**  Given that A=(a,e,i,o,u) B=(i,o,u)  Describe set A and B  Set B is a subset of set A  **Draw a venn diagram to show that all girls are pupils.** | Guided discovery  Discussion | Identifying subsets  Drawing subsets | Problem solving |  |  |  |
|  | 3 | Sets | Set concepts | Shading of regions | **The learner;**  Identifies the regions  Draws the venn diagrams  Shades the region | **The learner;**  Reads, pronounces, spells and uses words  -union  intersection | **Shading of regions**  **Example 1**  shade set A on the venn diagram below  **A B**  **Example 2**  **Shade the union of set K and P on the venn diagram below**  **A B**  **Example 3**  **Shade N – M (N only)**  **N M**  **Shade set M**  **N M** | Inquiry  Guided discovery  Discussion | Drawing the venn diagrams  Shading the regions | Logical thinking  Effective communication | Circular objects like  -coins  -bottle tops |  |  |
|  | 4 | Sets | Set concepts | Difference of sets | **The learner;**  Identifies the members of a particular set  Lists the members | **The learner;**  Reads, pronounces, spells and uses words correctly | **Difference of sets**  Study the venn diagram below and answer the questions  Example 1  E F  4  7 8 5  9  6 1 3  What is  i) E – F  E – F ( 6,7)  iI) F– E  F – E ( 3, 4,5)  iii)n(E – F  n(E – F)=2  iv) n(F – E ) = 3 | Brain storming  Guided discovery |  |  |  |  |  |
|  | 5 |  |  | Finding the members of elements in a given set | **The learner;**  Identifies the given sets correctly  Finds the number | **The learner;**  Reads, pronounces, spells and uses words correctly | **Find the number of elements in a given set**  Exampls  If set B = (Vowel letters), how many elements are in set B?  B(a,e,i,o, u)  n(B) = 5  Example 2  K= (all counting num bers up to 10)  Find n(K)  K= ( 1,2,3,4,5,6,7,8,9,10)  Therefore n(K) = 10 | Discussion  Brain storming |  |  |  |  |  |

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| 3 | 1 | Sets | Set concepts | Listing elements from a venn diagram | **The learner;**  Identifies the elements correctly  Lists the elements  draws venn diagrams | **The learner;**  Reads, pronounces, spells and uses words correctly  -elements  -venn diagram | Example  Study the venn diagram below and answer the questions  W Z  d  a  c b e  a) List the elements of set W  W = (a,b,c )  b) List the members of Z  Z (a,b,d,e)  c) |  |  | | |  | | | |  | |  | | |  | | |  | | |
|  | 2 |  |  | Drawing and representing elements on venn diagram | **The learner;**  Identifies the given sets correctly  Represents the elements  Draws venn diagram | **The learner;**  Reads, pronounces, spells and uses words  correctly  -elements  -venn diagrams |  |  |  | | |  | | | | |  | | |  | | |  | | |
|  | 3 | Numeracy | Whole numbers | Finding place values of whole numbers | **The learner;**  Identifies the place values of each digit  Names the place value  Writes the place value of each digit | **The learner;**  Reads, pronounces, spells and uses words correctly  -place value  -digit  -number |  |  |  | | |  | | | | |  | | |  | | |  | | |
|  | 4 | Numeracy | Whole numbers | Finding values of whole numbers | **The learner;**  Identifies the place values  Names the place values  Writes the values | **The learner;**  Reads, pronounces, spells, writes and uses words  -place value  -value  -digit  -number |  |  |  | | |  | | | | |  | | |  | | |  | | |
|  | 5 |  |  | More about values of numbers | **The learner;**  Identifies the place values of each digit  Names the place values  Finds the sum, difference, product of the values | **The learner;**  Reads, pronounces, spells |  |  |  | | |  | | | | |  | | |  | | |  | | |
| 4 | 1 | Numeracy | Whole numbers | Writing numbers in expanded form | **The learner;**  Identifies place values of digits  Writes the given number in expanded form | **The learner;**  Reads, pronounces, spells and uses words  -expand  -Lange  vale  place value |  |  |  | | |  | | |  | | | |  | | |  | | |  | | |
|  | 2 |  |  | Finding expanded numbers | **The learner;**  Identifies the given number  Writes as a single number | **The learner;**  Reads, pronounces, spells and uses words  -expand  -value  -place value  -single  -Lange |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 3 | Numeracy | Whole numbers | Writing figures in words | **The learner;**  Identifies the figure correctly | **The learner;**  Reads, pronounces, spells and uses words  -figures  -numbers |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 4 |  |  | Writing numbers in figures | **The learner;**  Identifies the written statement  Interprets the statement  Writes numbers in figures | **The learner;**  Reads, pronounces, spells and uses words  -figures  -numbers |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 5 |  |  | Rounding off whole numbers to the nearest tens | **The learner;**  Identifies the required place values  Rounds off numbers correctly | **The learner;**  Reads, pronounces, spells and uses words  -R.P.V  -round off  -tens |  |  |  | | | | |  | | |  | | |  | | |  | | |
| 5 | 1 | Numeracy | Whole numbers | Rounding off whole numbers to the nearest hundreds | **The learner;**  Identifies the required place value  Rounds off the number correctly | **The learner;**  Reads, pronounces, spells and uses words  -hundreds  -RPV  -round off |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 2 |  |  | Rounding off whole numbers to the nearest thousands | **The learner;**  Identifies the required place values  Rounds off the numbers correctly | **The learner;**  Reads, pronounces, spells and uses words  -thousands  -RPV  -round off |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 3 |  |  | Changing Hindu Arabic numerals to Roman numerals | **The learner;**  Identifies the Hindu Arabic numerals  Writes the Roman numerals | **The learner;**  Reads, pronounces, spells and writes Roman numerals |  |  |  | | | |  | | | |  | | |  | | |  | | |
|  | 4 |  |  | Converting Roman numerals to Hindu Arabic numerals | **The learner;**  Identifies the Roman numbers correctly  Writes the Hindu Arabic numeral correctly | **The learner;**  Reads, pronounces, spells and writes Arabic numerals |  |  |  | | | |  | | | |  | | |  | | |  | | |
|  | 5 | Numeracy | Operation on whole numbers | Addition of whole numbers | **The learner;**  Identifies the place values correctly  Adds whole numbers up to 5 digits | **The learner;**  Reads, pronounces, spells and uses words  -add  -sum  -plus  -regrouping  -altogether |  |  |  | | | |  | | | |  | | |  | | |  | | |
| 6 | 1 |  |  | Word application involving addition | **The learner;**  Interprets the questions correctly  Solves problems involving addition | **The learner;**  Reads, pronounces, spells and uses words  -add  -plus  -regrouping  -altogether |  |  |  | | | |  | | | |  | | |  | | |  | | |
|  | 2 |  |  | Subtraction of whole numbers | **The learner;**  Identifies the place values correctly  subtracts whole numbers correctly | **The learner;**  Reads, pronounces, spells and uses words  **-**subtract  -minus  -take away  -remove  -regrouping  -difference |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 3 | Numeracy | Operation on whole numbers | Word application involving subtraction | **The learner;**  Interprets the questions properly  Solves problems involving subtraction | **The learner;**  Reads, pronounces, spells and uses words  -subtract  -minus  -take away  -remove  -regrouping  -difference |  |  |  | | | | |  | | |  | | |  | | |  | | |
|  | 4 |  |  | Multiplication of whole numbers | **The learner;**  Recites the multiplication tables  Solves problems involving multiplications  Multiplies numbers | **The learner;**  Reads, pronounces, spells and uses words correctly  -multiply  -times  -product |  |  |  | |  | | | | | |  | | |  | | |  | | |
|  | 5 |  |  | Word application involving multiplication | **The learner;**  Interprets the statements correctly  Solves problem involving multiplication | **The learner;**  Reads, pronounces, spells and uses words  -multiply  -times  -product |  |  |  | |  | | | | | |  | | |  | | |  | | |
| 7 | 1 | Numeracy | Operation on whole numbers | Division of whole numbers | **The learner;**  Identifies the operation symbol.  Divides numbers correctly | **The learner;**  Reads, pronounces, spells and uses words  correctly  -divide  -share  -quotient |  |  |  | |  | | | | | |  | | |  | | |  | | |
|  | 2 |  |  | Word application involving division | **The learner;**  Interprets the statements correctly  Divides numbers correctly  Solves problems involving division | **The learner;**  Reads, pronounces, spells and uses words  -divide  -share  -quotient |  |  |  | |  | | | | | |  | | |  | | |  | | |
|  | 3 |  | Patterns and sequences | Types of numbers | **The learner;**  Identifies the number system  Describes each number system  Gives the examples | **The learner;**  Reads, pronounces, spells and uses words  -even  -odd  -whole  -counting |  |  |  | |  | | | | | |  | | |  | | |  | | |
|  | 4 | Numeracy | Patterns and sequences | Number sequences (missing numbers) | **The learner;**  Identifies the number system  Fills in the patterns correctly | **The learner;**  Reads, pronounces, spells and uses words |  |  |  |  | | | | | | |  | | |  | | |  | | |
|  | 5 |  |  | Multiples of numbers | **The learner;**  Finds the multiples  Writes the multiples | **The learner;**  Reads, pronounces, spells and uses words  -multiples |  |  |  |  | | | | | | |  | | |  | | |  | | |
| 8 | 1 | Numeracy | Patterns and sequence | More about multiples of numbers | **The learner;**  Finds the multiples  Lists the multiples | **The learner;**  Reads, pronounces, spells and uses words  -multiples |  |  |  |  | | | | | | |  | | |  | | |  | | |
|  | 2 |  |  | Common multiples | **The learner;**  Lists the multiples  Identifies the common multiples | **The learner;**  Reads, pronounces, spells and uses words  correctly |  |  |  |  | | | | | | |  | | |  | | |  | | |
|  | 3 |  |  | Finding the lowest common multiples (LCM) | **The learner;**  States LCM in full  Finds the LCM of given numbers | **The learner;**  Reads, pronounces, some of the key words |  |  |  |  | | | | | | |  | | |  | | |  | | |
|  | 4 |  |  | Factors of numbers | **The learner;**  Descries a factor  Finds factors of numbers | **The learner;**  Reads, pronounces, spells key words  -factor |  |  |  |  | | | | | | |  | | |  | | |  | | |
|  | 5 |  |  | More about finding factors | **The learner;**  Describes a factor  Finds factors of numbers | **The learner;**  Reads, pronounces, spells and uses words correctly |  |  |  |  | | | | | | |  | | |  | | |  | | |
| 9 | 1 | Numeracy | Patterns and sequences | Finding the Greatest Coommon Factor (GCF) or (HCF) | **The learner;**  Describhes the GCF  Finds the Common factors  Writes the GCF | **The learner;**  Reads, pronounces key words  -GCF / HCF |  |  |  |  | | | | | | |  | | |  | | |  | | |