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| **Student(s) Name(s)/ ARCOTS Code**: | | | |
| **Date :** | | | |
| **Developmental Domain** | **Progression of Numeracy**  **Strand: Number** | | |
| **Developmental Level & Nutshell Statement** | **Level D:**  **Add and subtract with whole digit numbers up to 1000 using knowledge of place value, properties of operations and relationship between addition and subtraction. Represent and solve word problems involving multiplication and division. Recognise fractions (1/2, 1/3, 1/4, 1/5) as part of a whole.** | | |
| **Evidence for this level?** (What makes you say this? | ARCOTS testing student ZPD was Level D. Analysis of work samples against the progression confirmed this. | | |
| ***What is the student ready to learn?*** | ***What are the expected outcomes and evidence?*** | ***What interventions has the teacher planned?*** | ***What worked? What next?*** |

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| **Learning Intention/s**  (Specific **skill** or concept or part thereof to be learned) | **Evidence** (What the students will be able to do, say, make or write): | **Teaching Strategy** (What the *teacher* says, does, makes or writes) | **Learning Activity**  (Describes what the students are actually going to do) | **Resources** (People, place or things used in the activity to realise the learning strategy) | **Review & Reflection** |
| Students will be able to match the words, symbols and physical representations of one half, one quarter and one third. | Students nominate (in a written or spoken way) these three fractions (1/2, 1/3,1/5) in the two different forms, to utilise them in everyday situations. | ***JUNIOR YEARS***  ***Expositive***  • Teacher will demonstrate various activities as described in the listed learning activities.  • Teacher will encourage children to give real-life examples when fractions are useful.  ***Associative/Investigative***  • Using different group activities, teacher will provide students the opportunity to explore real life examples where a whole is fractioned in halves, quarters and thirds. | ***JUNIOR YEARS***  • Fold a paper strip chocolate bar in half to make demonstrate sharing halves. Use same strategy to partition kinder squares, play dough, pile of counters. Repeat for fourths: halve and halve again. Repeat spreading activity with thirds on square bread slices. Spread a salad with vegemite. Discuss different fractional parts.  • With ‘tiles’ pre-cut into 3 equal pieces, students pick up one piece and together name it as one third. Same exercise for ‘one half’ and ‘one fifth’.  • Students work in pairs and given a number of coins. Each pair is asked to pay half each for selected items that have simple price tags. | • Paper, scissors.  • Chocolate bar.  • ‘Price tags’.  • Pre-cut tiles.  • Set of coins, paper and pen. | **Review Date:**  **Reflection:** |

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|  |  | ***MIDDLE YEARS***  ***Expositive***  • Teacher will demonstrate various activities as described in the listed learning activities.  • Teacher will encourage children to give real-life examples when fractions are useful.  ***Performative/Investigative***  • Teacher will give cards with the words ‘half’, ‘third’ and ‘fifth’ to different pairs of students. Students will be asked to think of situations that explain what one half, one third and one fifth represent.  • Teacher will organise a cooking session with students to follow a recipe in which they need to use 1/2, 1/3 and 1/4 of different ingredients, as cooking is a practical way to assist students to understand fractions in real life situations. | ***MIDDLE YEARS***  • In groups, students will model a situation in which half, third or fifth of the whole is being used. Students can draw, cut, and paste pictures, colour paper, write a story, etc. Students share ideas. Display work on wall and discuss with other pairs of students.  • Students will follow recipes to cook different things in which they need to use 1/2, 1/3 and 1/4 of the ingredients. Students can bring fruit for fruit salad, fruit cut into halves, quarters etc, brings up discussions on which fruit can be cut into equal pieces and which cannot, etc.. | • Set of cards with the words ‘half’, ‘third’ and ‘fifth’.  • Paper, scissors.  • Chocolate bar.  • ‘Price tags’.  • Recipes, fruits, bread, condiments. | **Review Date:**  **Reflection:** |
| ***UPPER YEARS***  ***Associative/Investigative***  • Teacher will:   * Give each student a set of cards described under student activity. * Allocate time for students to make individual decisions. * Organise students into pairs for discussion of decisions. * Debrief with group to identify any remaining misconceptions. | ***UPPER YEARS***  • Students will receive a card set with the symbol, the words and various physical representations of 1/2, 1/3 and 1/4.    • Students will arrange cards into sets representing one half, one third and one quarter. Students need then to explain to a partner why they made their choices.  • Students will make different physical representations of these fractions. | • Set of cards with words, symbols and representation of  1/2, 1/3 and 1/4.  • Pencil, paper, colouring pencils, scissors. | **Review Date:**  **Reflection:** |
| **Rationale:** | Differentiated context, the activities proposed on the first line can be more suitable for junior years’ students. In turn, the activities on the second and third line can be more suitable for middle and upper years’ students, respectively. | | | | |