**LESSON DEVELOPMENT TWO**

**CONVERSION OF BASE 10 AND BASE 2**

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| **STAGE/TIME** | **TEACHER’S ACTIVITIES** | **LEARNER'S ACTIVITIES – MIND/HANDS ON** | **LEARNING POINTS** |
| **Step 1****Introduction – Introductory Activities** **(5 minutes)** | Guides pupils to divide 1,2, 3 and 4 by 2 (with or remainder). Tell them that whenever you divide any number by 2, you will have remainder 0 or 1. | 1/2 = 0 R 12/2 = 1 R 03/2 = 1 R 14/2 = 2 R 0 | Linking the Previous knowledge to the new lesson |
| **Step 2** **Development** **(5 minutes)** **Grouping** | 1. Groups the learners into four groups – A, B, C, and D. 2. Guide the learners to choose a leader and secretary for your group. 3. Gives each group learning materials – number charts showing conversion of base 10 to base.  | 1. Belong to a group. 2. Choose their leader and secretary. 3. Received learning materials for their group.  | Learner’s group, leader and secretary confirmed. |
| **Step 3****Development – Groups Activities** **(10 minutes)** | Asks pupils to divide 5 by 2.Again, divide 2 by 2.Then, divide 1 by 2.***Wrap up –* 5 base 10 to base 2 is *101.***Asks them to divide 11 by 2.Divide 5 by 2.Again, divide 2 by 2.Then, divide 1 by 2.***Wrap up – 11 base 10 to base 2 is 1101.*** | 5/2 = 2 R 12/2 = 1 R 01/2 = 0 R 111/2 = 5 R 15/2 = 2 R 12/2 = 1 R 01/2 = 0 R 1 | Conversion of base 10 to base 2 |
| **Step 4****Development – Groups Activities and Presentation** **(15 minutes)** | Conversion the following base 10 to base 2 –1. 15 2. 26.  | Work in progress15/2 = 7 R 17/2 = 3 R 13/2 = 1 R 12/2 = 0 R 115 base 10 =1111 | Pupil’s Activities and Presentation  |
| **Step 5****Development****(5 minutes)**  | To conclude the lesson, the teacher revises the entire lesson and ask the key questions. **SUMMARY** To convert an expression in base two notation to base ten notation, just do the arithmetic. | The learners listen, ask and answer questions.**KEY QUESTIONS** Lets each of the pupils convert the following base 10 to base 2 – 1. 152. 26 | Lesson Evaluation and Conclusion  |

***Reference materials – New Method Mathematics Book***

***Instructional Materials***

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