Lesson Plan

| Grade: Three | Subject: Maths | Term: 1st | Time: 40min |

| Teacher's Name: _____ | Week : 9 | Day: 1 |

| Unit 2: Factors and Multiples | Topic: Factors and Multiples |

Student Learning Outcomes:
- Differentiate between factors and multiples.

Resource Material:
Chalk/Marker, White/Blackboard, Maths Textbook, Worksheet

Warm-up Activities: 5mins

Before beginning the lesson, ask students to say "Tasmiyah".

Ask students about their homework. Ask them: What is meant by factors of a number? What is a multiple of a number? Take their responses and appreciate them for correct answers.

Teaching and Learning Activities: 20 mins

- Tell them that today we are going to learn about the difference between factors and multiples.
- Write $7 \times 4 = 28$ on the board. Tell them that 7 and 4 are the factor of 28 and 28 is the multiples of 7 and 4. Call a student to the front of the class and ask him/her to write the factors of 8 and multiples of 8 on the board. Take their response and then write the factors of 8 that are 1, 2, 4, 8 and the multiples of 8 are: 8, 16, 24, 32, 40, 48, 56, 64,… .
- Now ask them to open page 34 and have them read the factors and multiple difference.
- Tell them that factors of a number are those numbers that can be multiplied together to get the number where as the multiples of the number are obtained by multiplying it by another number.
- Ask students to discuss with each other the difference between factors and multiples and also give examples.

Review: 3mins

Sum up the lesson by explaining to students about the difference between factors and multiples.

Evaluation: 10mins

Ask them to tell any three differences between factors and multiples.

Homework: 2mins

Solve the worksheet.

Name: _____	Subject: Maths	Topic Name: Factors and Multiples

1. Find the factors of the following numbers.

(i) 42   (ii) 12   (iii) 18

2. Find the first 5 multiples of following numbers.

(i)   8 _____

(ii)   5 _____

(iii)   6 _____

Lesson Plan

Grade: Three	Subject: Maths	Term: 1st	Time: 40min

Teacher's Name: _____	Week : 9	Day: 2

Unit 2: Factors and Multiples	Topic: Prime Factorization

Student Learning Outcomes:

- Factorize a number by using prime factors.

Resource Material:

Chalk/Marker, White/Blackboard, Maths Textbook

Warm-up Activities:	5mins

Before beginning the lesson, ask students to say "Tasmiyah".

Ask students about their worksheets. Ask them: What is the difference between factors and multiples? What are prime numbers and composite numbers?
Take their responses and appreciate them for their correct answers.

Teaching and Learning Activities:	20 mins

- Tell students today they are going to learn about prime factorization.
- Tell them process of expressing a number as a product of its factors. So that all the factors are prime numbers, in called prime factorization.
- Tell them that we can find the factors of any numbers by factorization method.
- If the factors are prime, then the factors are called prime factors.
- Tell them that we can find the prime factors of 48. For this, first we break the number 48 into its factors as 4 × 12.
- Now we break 12 and 4 into factors 4 = 2 × 2 , 12 = 4 × 3

2	48
2	24
2	12
2	6
3	3
	1

- As 2 and 2 are prime factors, so we stop here. Tell them 2,2,2,2,3 are prime factors of 48.

Review:	3mins

Sum up the lesson by explaining to students how we can find the prime factors of any number by prime factorization method.

Evaluation:	10mins

To assess the students learning, ask them to solve exercise 2.4 Q1 (i-iv).

Homework:	2mins

Solve Q1 (v-viii) exercise 2.4 in their notebooks.

Lesson Plan

Grade: Three	Subject: Maths	Term: 1st	Time: 40min

Teacher's Name: _____	Week : 9	Day: 3

Unit 2: Factors and Multiples	Topic: Prime Factorization

Student Learning Outcomes:

- Factorize a number by using prime factors.

Resource Material:

Chalk/Marker, White/Blackboard, Textbook

Warm-up Activities:	5mins

Before beginning the lesson, ask students to say "Tasmiyah".

Ask students about their homework. Ask them: What do they know about prime factorization. Take their response and appreciate them.

Teaching and Learning Activities:	20 mins

- Tell students today they are going to practice the factorizing the number.
- Have them open textbook page 35. Ask them to see the solution of example 1.
- Tell student here we have to find the prime factors of 24.
  For this 24, is divided by its smallest prime factor i.e. 2.
- Now instruct students to find the factors of 18 by prime factorization method.
- Roam around the class, check their work and guide them.
- Also discuss factor tree method with student by explaining it through an example.

Review:	3mins

Recall the main concepts of prime factorization.

Evaluation:	10mins

To evaluate students understanding ask them to find factors of 72 by using prime factorization.

Homework:	2mins

Solve Q 2 of exercise 2.4 in their notebooks.

Lesson Plan

| Grade: Three | Subject: Maths | Term: 1st | Time: 40min |

| Teacher's Name: _____ | Week : 9 | Day: 4 |

| Unit 2: Factors and Multiples | Topic: Common Factors |

Student Learning Outcomes:

- Determine common factors of two or more 2-digit numbers.

Resource Material:

Chalk/Marker, White/Blackboard, Maths Textbook

| **Warm-up Activities:** | 5mins |

Before beginning the lesson, ask students to say "Tasmiyah".

Ask students about their homework. Call student and ask him/her find the prime factors of 45 by prime factorization method on the board.

| **Teaching and learning Activities:** | 20 mins |

- Tell students today they are going to know about common factors.
- Tell them about common factors, that when two or more numbers have same factors these factors are called common factors.
- Tell them to find factors of any two numbers, factors of both number are written and then circle the common factors.
- Write numbers 16 and 32 on the board and tell them that today we are going to find the common factors of the numbers 16 and 32. Tell them that first we find the factors of 16 and then we find the factors of 32. Then circle the factors of 16 and 13 that are common in both. Tell them that if the factors of two or more numbers are common then the factors are called common factors. Explain each step by solving it on the board.

| **Review:** | 3mins |

Sum up the lesson by explaining the common factors of two or more numbers by solving examples on the board.

| **Evaluation:** | 10mins |

Ask them to solve Q2 (i-iii) of Exercise 2.5 it in their notebooks. Appreciate them for their correct answers.

| **Homework:** | 2mins |

Solve Q2 (iv-vi) of Exercise 2.5 in their notebooks.

Lesson Plan

| Grade: Three | Subject: Maths | Term: 1st | Time: 40min |

| Teacher's Name: _____ | Week: 9 | Day: 5 |

| Unit 2: Factors and Multiples | Topic Name: Common Factors |

Student Learning Outcomes:
- Determine common factors of two or more 2-digit numbers.

Resource Material:
Chalk/Marker, White/Blackboard, Maths textbook, Numbers and factors of that numbers cards

Warm-up Activities: 5mins
Before beginning the lesson, ask students to say "Tasmiyah".
Write three numbers 6, 8 and 12 on board and call a student to find the factors of these numbers. Then write the common factors of these numbers. Take their responses and appreciate them for their good response.

Teaching and Learning Activities: 20 mins
- Have students open page 36 of their textbooks. Solve examples by explaining each step on the board. Ask them to find the factors of these numbers and then find their common factors. Ask them to solve the given examples in their notebooks.
- Put two baskets on the table. One basket will have numbers up to 2 digits and the other basket will have factors of those numbers.
- Call students one by one and ask them to pick two cards from the first basket and then find out the factors of those numbers in the second basket and to stop searching when they find all the factors of those numbers.
- Then ask them to separate out the common factors of those numbers.
- The remaining students will check if he/she is solving it correctly or not. Repeat this activity till all students have their turns.

Review: 3mins
Sum up the lesson by explaining how we can find common factors of two or more numbers.

Evaluation: 10mins
Ask students to solve Q2 (vii-viii) in their notebooks. Roam around the class, check their work and guide them if required.

Homework: 2mins
Revise the classwork.

Lesson Plan

| Grade: Three | Subject: Maths | Term: 1st | Time: 40min |

| Teacher's Name: _____ | Week : 9 | Day: 6 |

| Unit 1: Factors and Multiples | Topic : Common Multiples |

Student Learning Outcomes:
- Determine common multiples of two or more 2-digit numbers.

Resource Material:

Chalk/Marker, White/Blackboard, Textbook

Warm-up Activities: 5mins

Before beginning the lesson, ask students to say "Tasmiyah".

Write number 4 and 12 on the board call a student and ask him/her to find the factors of that numbers. Appreciate him/her correct answer.

Teaching and Learning Activities: 2 mins

- Tell students today we are going to find the common multiples of two or more numbers.
- Tell them a number that is multiple of two or more numbers is called common multiple.
- Tell students that to find the common multiples, the multiples of both number are found and the common multiples are circle.
- Write the numbers 3 and 6 on the board and call a student to the front of the class and ask him/her to write the first 10 multiples of 3 and 6. Take his/her response and then write the multiples on the board. Now tell them that 6, 12, 18 … are common multiples in 3 and 6. So 4, 8, 12 and 24 are common multiples of 3 and 6.
- Ask them to write 9 and 12 in their notebooks and find their common multiples.

Review: 3mins

Sum up the lesson by explaining to them that a common multiple is a number that is a multiple of two or more numbers.

Evaluation: 10min

Ask them to solve the Q3 (i-iv) of Exercise 2.5. Roam around the class, check their work and guide them if required.

Homework: 2min

Solve Q3 (v-viii) of Exercise 2.5 in their notebooks.