Name: **Grade:** **Score:**

Worksheet #5

COMPOUND INTEREST- FINDING AMOUNT

Learning goal: Students will be able to understand and to find compound interest in real-life problems.

Instructions: Calculate the Amount in compound interest using the formula.

$$A = P\left(1 + \frac{r}{100}\right)^{n}$$

WORD PROBLEM	CALCULATE & ANSWER
Ramesh deposited ₹5,000 in a savings account that earns 6% interest per annum. He kept the money in the account for 5 years.	
Priya deposited ₹10,000 in a fixed deposit that earns 8% interest per annum. She kept the money in the account for 3 years.	
Kiran invested ₹8,000 in a recurring deposit that earns 7% interest per annum. He kept the money in the account for 4 years.	
Meera deposited ₹6,500 in a savings account that earns 5% interest per annum. She kept the money in the account for 6 years.	
Arjun invested ₹12,000 in a fixed deposit that earns 9% interest per annum. He kept the money in the account for 2 years.	
Sita deposited ₹7,500 in a savings account that earns 4% interest per annum. She kept the money in the account for 3 years.	
Rahul invested ₹15,000 in a recurring deposit that earns 10% interest per annum. He kept the money in the account for 5 years.	
Lakshmi deposited ₹9,000 in a fixed deposit that earns 6% interest per annum. She kept the money in the account for 7 years.	

Name: **Grade:** **Score:**

Worksheet #5 (Answers)

COMPOUND INTEREST- FINDING AMOUNT

Learning goal: Students will be able to understand and to find compound interest in real-life problems.

Instructions: Calculate the Amount in compound interest using the formula.

$$A = P\left(1 + \frac{r}{100}\right)^n$$

WORD PROBLEM	CALCULATE & ANSWER
Ramesh deposited ₹5,000 in a savings account that earns 6% interest per annum. He kept the money in the account for 5 years.	$A = 5000\left(1 + \frac{6}{100}\right)^5 = 5000(1.06)^5$ = 5000 × 1.3382 = **₹6,691**
Priya deposited ₹10,000 in a fixed deposit that earns 8% interest per annum. She kept the money in the account for 3 years.	$A = 10000\left(1 + \frac{8}{100}\right)^3 = 10000(1.08)^3$ = 10000 × 1.2597 = **₹12,597**
Kiran invested ₹8,000 in a recurring deposit that earns 7% interest per annum. He kept the money in the account for 4 years.	$A = 8000\left(1 + \frac{7}{100}\right)^4 = 8000(1.07)^4$ = 8000 × 1.3108 = **₹10,486.4**
Meera deposited ₹6,500 in a savings account that earns 5% interest per annum. She kept the money in the account for 6 years.	$A = 6500\left(1 + \frac{5}{100}\right)^6 = 6500(1.5)^6$ = 6500 × 1.3401 = **₹8,710.65**
Arjun invested ₹12,000 in a fixed deposit that earns 9% interest per annum. He kept the money in the account for 2 years.	$A = 12000\left(1 + \frac{9}{100}\right)^2 = 12000(1.9)^2$ = 12000 × 1.1881 = **₹14,257.2**
Sita deposited ₹7,500 in a savings account that earns 4% interest per annum. She kept the money in the account for 3 years.	$A = 7500\left(1 + \frac{4}{100}\right)^3 = 7500(1.04)^3$ = 7500 × 1.1249 = **₹8,436.75**
Rahul invested ₹15,000 in a recurring deposit that earns 10% interest per annum. He kept the money in the account for 5 years.	$A = 15000\left(1 + \frac{10}{100}\right)^5 = 15000(1.10)^5$ = 15000 × 1.6105 = **₹24,157.5**
Lakshmi deposited ₹9,000 in a fixed deposit that earns 6% interest per annum. She kept the money in the account for 7 years.	$A = 9000\left(1 + \frac{6}{100}\right)^7 = 9000(1.06)^7$ = 9000 × 1.5036 = **₹13,532.4**