Part

1. **Grocery Store Bill**

You’re at a store buying:

* 2 kg of rice (FRW 2 000 per kg)
* 3 liters of milk (FRW 1 200 per liter)
* 1 kg of sugar (FRW 1 500 per kg)

**Goal:** Calculate the **total cost** and add **10 % VAT**.

let ricePrice = 2000;

let milkPrice = 1200;

let sugarPrice = 1500;

let total = (2 \* ricePrice) + (3 \* milkPrice) + (1 \* sugarPrice);

let vat = total \* 0.10;

let totalWithVat = total + vat;

console.log("Total before VAT:", total);

console.log("VAT:", vat);

console.log("Total after VAT:", totalWithVat);

1. **Fuel Cost Calculator**

You drove 120 km. Your car uses 8 liters per 100 km, and fuel costs FRW 1 850 per liter.  
 **Goal:** Find out how much money you spent on fuel.

1. **Employee Salary**

An employee earns ₩ 500 000 per month, gets a **5 % bonus**, and pays **15 % tax**.  
 **Goal:** Calculate the **final salary after tax**.

1. **Mobile Data Usage**

You have a 10 GB plan. You used 7.5 GB this month.  
 **Goal:** Calculate **remaining data** and **percentage used**.

1. **Water Tank Fill Time**

A water tank holds 1 000 liters. A tap pours **20 liters per minute**.  
 **Goal:** Find **how many minutes** to fill the tank.

Part 2

1. **Book Store Purchase**  
   You buy 3 books at FRW 4,500 each and 2 notebooks at FRW 1,200 each. Calculate the total cost with 8% tax.
2. **Car Rental Cost**  
   Rent a car for 5 days at FRW 15,000 per day with a one-time insurance fee of FRW 5,000. Calculate total cost.
3. **Fruit Market**  
   Buy 2.5 kg of apples (FRW 800/kg) and 1.5 kg of oranges (FRW 1,200/kg). Get 10% discount on total. Calculate final price.

**Percentage Calculations**

1. **Exam Score Calculator**  
   A test has 80 questions. You got 68 correct. Calculate your percentage score.
2. **Salary Increase**  
   Your salary is FRW 350,000. You get a 12% raise. Calculate your new salary.
3. **Restaurant Tip**  
   Bill amount is FRW 25,000. Add 15% tip and 18% VAT. Calculate total amount.

**Unit Conversions**

1. **Currency Exchange**  
   You have $150. Exchange rate is 1 USD = 1,200 FRW. Calculate how much FRW you get.
2. **Distance Converter**  
   Convert 5 miles to kilometers (1 mile = 1.6 km).
3. **Weight Converter**  
   Convert 500 grams to kilograms.

**Time and Rate Problems**

1. **Printing Job**  
   A printer prints 45 pages per minute. How many minutes to print 1,350 pages?
2. **Swimming Pool**  
   A pool holds 12,000 liters. A hose fills it at 25 liters per minute. Calculate hours to fill.
3. **Download Time**  
   A 2.5 GB file downloads at 10 Mbps. Calculate download time in minutes.

**Geometry Calculations**

1. **Rectangle Area & Perimeter**  
   Length = 15m, Width = 8m. Calculate area and perimeter.
2. **Circle Calculations**  
   Radius = 7cm. Calculate circumference (2πr) and area (πr²).
3. **Triangle Area**  
   Base = 12cm, Height = 9cm. Calculate area (½ × base × height).