

Milk Man

Info

A milk carton can hold 3.78 liters of milk. Each morning, a dairy farm ships cartons of milk to a local grocery store. Each carton can hold 3.78 liters of milk. Write a program that allows the user to enter the cost of producing one liter of milk, the profit on each carton of milk, and the total amount of milk produced that day. The program then calculates and displays the number of milk cartons needed to hold the milk, the cost of producing the milk and the profit for that day.

Implementation

These are the constants and functions used to calculate the program output.

```
LITERS_PER_CARTON = 3.78
```

```
total_cartons -> liter_produced / LITERS_PER_CARTON
```

```
>> total cartons is rounded to the nearest whole number
```

```
production_costs -> cost_per_liter X liters_produced
```

```
profits -> (total_cartons X profits_per_carton)
```

```
total_profits -> profits - production_costs
```

Input

The following user data is needed to calculate the program output.

- Liters per Carton -> Constant
- Cost per Liter -> Float (\$)
- Profits per Carton -> Float (\$)
- Liters Produced -> Float (Liters)

Example

```
"What is your production cost per liter?" $0.59
```

```
"What are your profits on a carton of milk?" $3.29
```

```
"What was your total milk production?" 131 L
```

Output

The following system data is output by the program.

- Cartons Needed -> Integer (Cartons)
- Production Costs -> Float (\$)
- Total Profits -> Float (\$)

Example

"You would need a total of:" 35 Cartons

"Your production cost for the day would be:" \$77.29

"Your total profits for the day would be:" \$37.86

Test Data

	Cost Per Liter	Profits Per Carton	Liters Produced	Cartons Needed	Production Cost	Daily Profits
Test 1	\$0.39	\$1.33	5	2	\$1.95	\$0.71
Test 2	\$0.43	\$1.76	15	4	\$6.45	\$19.95
Test 3	\$1.33	\$2.50	130	35	\$172.90	- \$85.40