

# The Design Recipe

**Directions :** Write a function `moving` that takes in the days and number of miles driven and returns the cost of renting a truck. The truck is \$55 per day and each driven mile is 15¢.

## Contract and Purpose Statement

Every contract has three parts...

# moving:: Number, Number -> Number  
function name domain range

# Takes in a number of days and multiplies it by \$45, then takes in a number of miles and multiplies it by \$0.15, then adds the two products and returns the cost of moving

## Examples

what does the function do?

Write some examples, then circle and label what changes...

**examples:**

moving ( 1, 600 ) is ( 1 \* 55 ) + ( 600 \* 0.15 )  
function name input(s) what the function produces

moving ( 3, 1500 ) is ( 3 \* 55 ) + ( 1500 \* 0.15 )  
function name input(s) what the function produces

**end**

## Definition

Write the definition, giving variable names to all your input values...

**fun** moving( days, miles ):  
function name variable(s)

( days \* 55 ) + ( miles \* 0.15 )  
what the function does with those variable(s)

**end**

**Directions :** Write a function `lawn-area` that takes in the length and width of a rectangular lawn and returns its area.

## Contract and Purpose Statement

Every contract has three parts...

# lawn-area:: Number, Number -> Number  
function name domain range

# Takes in 2 numbers, length and width, and multiplies them and returns that value

what does the function do?

## Examples

Write some examples, then circle and label what changes...

**examples:**

lawn-area ( 10, 20 ) is 10 \* 20  
function name input(s) what the function produces

lawn-area ( 100, 300 ) is 100 \* 300  
function name input(s) what the function produces

**end**

## Definition

Write the definition, giving variable names to all your input values...

**fun** lawn-area( length, width ):  
function name variable(s)

length \* width  
what the function does with those variable(s)

**end**