

# JS Academy Exercises for follow up.

\*do your best to go through these exercises. The solutions are available but try solving it yourself.

## 1. Variables.

*Why pay a fortune teller when you can just program your fortune yourself?*

- ❖ Store the following into variables: number of children, partner's name, geographic location, job title.
- ❖ Output your fortune to the screen like so: "You will be a X in Y, and married to Z with N kids."

*Want to find out how old you'll be? Calculate it!*

- ❖ Store your birth year in a variable.
- ❖ Store a future year in a variable.
- ❖ Calculate your 2 possible ages for that year based on the stored values.  
For example, if you were born in 1988, then in 2026 you'll be either 37 or 38, depending on what month it is in 2026.
- ❖ Output them to the screen like so: "I will be either NN or NN in YYYY", substituting the values.

*Ever wonder how much a "lifetime supply" of your favorite snack is? Wonder no more!*

- ❖ Store your current age into a variable.
- ❖ Store a maximum age into a variable.
- ❖ Store an estimated amount per day (as a number).
- ❖ Calculate how many you would eat total for the rest of your life.
- ❖ Output the result to the screen like so: "You will need NN to last you until the ripe old age of X".

*It's hot out! Let's make a converter based on the steps here.*

- ❖ Store a celsius temperature into a variable.
- ❖ Convert it to fahrenheit and output "NN°C is NN°F".
- ❖ Now store a fahrenheit temperature into a variable.
- ❖ Convert it to celsius and output "NN°F is NN°C."

## 2 Functions

*Why pay a fortune teller when you can just program your fortune yourself?*

- ❖ Write a function named `tellFortune` that:
  - takes 4 arguments: number of children, partner's name, geographic location, job title.

- outputs your fortune to the screen like so: "You will be a X in Y, and married to Z with N kids."
- ❖ Call that function 3 times with 3 different values for the arguments.

You know how old your dog is in human years, but what about dog years? Calculate it!

- ❖ Write a function named `calculateDogAge` that:
  - takes 1 argument: your puppy's age.
  - calculates your dog's age based on the conversion rate of 1 human year to 7 dog years.
  - outputs the result to the screen like so: "Your doggie is NN years old in dog years!"
- ❖ Call the function three times with different sets of values.
- ❖ **Bonus:** Add an additional argument to the function that takes the conversion rate of human to dog years.

### The Geometrizer

Create 2 functions that calculate properties of a circle, using the [definitions](#) here.

Create a function called `calcCircumference`:

- ❖ Pass the radius to the function.
- ❖ Calculate the circumference based on the radius, and output "The circumference is NN".

Create a function called `calcArea`:

- ❖ Pass the radius to the function.
- ❖ Calculate the area based on the radius, and output "The area is NN".

It's hot out! Let's make a converter based on the steps here.

Create a function called `celsiusToFahrenheit`:

- ❖ Store a celsius temperature into a variable.
- ❖ Convert it to fahrenheit and output "NN°C is NN°F".

Create a function called `fahrenheitToCelsius`:

- ❖ Now store a fahrenheit temperature into a variable.
- ❖ Convert it to celsius and output "NN°F is NN°C."

