## Homework: Session 4

Additional resources:

- Lists ★ <a href="https://realpython.com/python-lists-tuples/">https://realpython.com/python-lists-tuples/</a>
- Dictionaries ★ <a href="https://realpython.com/python-dicts/">https://realpython.com/python-dicts/</a>

## Question 1

I have a list of things I need to buy from my supermarket of choice.

```
shopping_list = [
    "oranges",
    "cat food",
    "sponge cake",
    "long-grain rice",
    "cheese board",
]
print(shopping_list[1])
```

I want to know what the first thing I need to buy is. However, when I run the program it shows me a different answer to what I was expecting?

What is the mistake? How do I fix it?

## Question 2

I'm setting up my own market stall to sell chocolates. I need a basic till to check the prices of different chocolates that I sell.

I've started the program and included the chocolates and their prices. Finish the program by asking the user to input an item and then output its price.

```
chocolates = {
    'white': 1.50,
    'milk': 1.20,
    'dark': 1.80,
    'vegan': 2.00,
}
```



## Question 3

Write a program that simulates a lottery. The program should have a list of seven numbers that represent a lottery ticket. It should then generate seven random numbers. After comparing the two sets of numbers, the program should output a prize based on the number of matches:

- £20 for three matching numbers
- £40 for four matching numbers
- £100 for five matching numbers
- £10000 for six matching numbers
- £1000000 for seven matching numbers

