# Exam Synopsis

## 1. Data Structures & functions

In my exam presentation I will:

- Go over the different data structures in Python:
  - List, Tuple, Set, Dictionary
- Go over comprehension for:
  - List, Tuple and Set
- Give examples of List, Tuple and Set comprehension

## 2. Pythonic OOP

In my exam presentation for Pythonic OOP I will showcase:

- Classes
  - Creation and Instatiation
- Encapsulation
  - private, public
  - @properties, why and how to use them
- Data model

## 3. Generators, Decorators & Context Managers

For this I will present:

- Generators, Decorators and  Context Managers:
  - what they are
  - when they are used
  - why they are used

  I will also showcase a use-case where all three can be used together

## 4. Python modules and the python development environment.

For this I will present:

- Pythons built in modules
  - OS, Sys
- Thirdparty modules
  - pip, requests
- Developement environment
  - Docker, VS-code, python interpreter.