

## SECTION 11: MILESTONE PROJECT - 2 hours 18 minutes, 12 sections

### • 8/12 Milestone Project 2 Overview

#### ○ -> OOP in Python

- -> starting a larger set project
- -> a blackjack game with Python
- -> coding along with the solutions lecture, or attempting the project on your own
- -> debug / testing things out
- -> the workbook as an in between
- -> smaller and more handleable sub-problems

#### ○ -> the game

- -> a simplified version of blackjack
- -> the dealer is the computer and the player is human

#### ▸ -> black jack

- -> there is a deck of 52 cards
- -> a bank roll
- -> player places a bet (whether they think they will win or not)
- -> then the player starts with two cards face up and the dealer two cards one face down one face up
- -> the player can choose to hit or stay
- -> she is leaving out certain parts of the game / rules in order to simplify the project
- -> the aim is to get closer to the total of 21 than the computer
- -> either the computer beats the player or goes over 21 (bust)
- -> **different cases**
  - the player busts (has a score above 21)
  - -> the human beats the computer (the computer has a score above 21)
  - -> the player wins after the computer has its turn
  - -> **it's to do with getting a score above 21 -> adding more and more cards**
  - -> **there is also a bet number**

#### ○ -> special rules

- JQK cards count as 10
- -> aces can count as a 1 or an 11 -> whichever the player wants them to count as (for this you will need an input statement)

#### ○ -> the .ipynb files on the git repo

- -> there is one with the solutions
- -> another with the basic steps
- -> this entire thing is black jack
- -> there is a shell of the different classes which their solution uses
- -> you can also go and use your own blank JN
- -> then there is a while loop at the end
- -> solution notebook and solution code notebook
- -> you can use a txt editor and then run it in the terminal
- -> a lecture (straight to the solutions), starting from scratch or going through the workbook which they give