# COMP5048 Visual Analytics 2020 Assignment 2: Group Assignment

## **Deadlines:** (submit to Canvas, only one submission per group)

- 1. Presentation (10 marks): week 9, Oct 28, WED 6pm, presentation: week 9-11
- 2. Final report (15 marks): week 12, Nov 19, THU 6pm

Choose <u>one</u> data set below and produce <u>good visualisations</u> to support <u>analytic</u> <u>tasks</u> of the data.

#### Data Sets:

- 1. Popular Websites across the globe (<a href="https://www.kaggle.com/bpali26/popular-websites-across-the-globe">https://www.kaggle.com/bpali26/popular-websites-across-the-globe</a>)
- Weather Madrid
   (<a href="https://www.kaggle.com/juliansimon/weather-madrid-lemd-1997-2015.csv">https://www.kaggle.com/juliansimon/weather-madrid-lemd-1997-2015.csv</a>)
- 3. Association of Tennis Professionals Matches (<a href="https://www.kaggle.com/gmadevs/atp-matches-dataset">https://www.kaggle.com/gmadevs/atp-matches-dataset</a>)
- NBA Basketball Players Stats per Season
   (<u>https://www.kaggle.com/jacobbaruch/basketball-players-stats-per-season-49-leagues</u>)
- 5. Netflix Movies and TV Shows (https://www.kaggle.com/shivamb/netflix-shows)
- Apple Store Mobile Strategy Games (<a href="https://www.kaggle.com/tristan581/17k-apple-app-store-strategy-games">https://www.kaggle.com/tristan581/17k-apple-app-store-strategy-games</a>)
- 7. Board Game Geek Database (<a href="https://www.kaggle.com/seanthemalloy/board-game-geek-database">https://www.kaggle.com/seanthemalloy/board-game-geek-database</a>)
- 8. World University Rankings (<a href="https://www.kaggle.com/mylesoneill/world-university-rankings?select=cwurData">https://www.kaggle.com/mylesoneill/world-university-rankings?select=cwurData</a>)
- 9. GoodReads Choice Awards (https://www.kaggle.com/somnambwl/book-awards)
- 10. Museum of Modern Art Collection in New York City (https://www.kaggle.com/momanyc/museum-collection?select=artists)
- 11.eBay Kleinanzeigen Used Cars Database (https://www.kaggle.com/abiyyuhrusin/ebay-kleinanzeigen-car)

### Specifically:

- 1. <u>Design</u> (i.e., define tasks, determine analysis and visualisation)
- 2. <u>Implement</u> (i.e., data processing, determine tools/implementation to use)
- **3.** *Evaluation* (i.e., evaluate your results with analytic tasks)
- 4. Animation/Demo of your system
- 5. Each student should create at least one visualisation.

You can use whatever software you like or implement your system using existing tools, but you must acknowledge all your sources.

# Form Groups by Sep 20 Sunday 6pm

- We will announce final groups by Week 5 Wed

# Week 9-11: presentation week 9-11, 6-9pm

- We will announce schedule by Week 7
- We will play each video and ask questions if any
- You need to attend Webinar at the week that your group is presenting
- You need to **peer-review** 20 groups (submit on-line): 3 marks

# <u>Presentation</u> should be in the following format (7-10 slides): 5 mins

- 1. Introduction
  - 1.1 Data sets
  - 1.2 Tasks
- 2. Design and Approaches
  - 2.1 Analysis
  - 2.2 Visualisation
- 3. Implementation: tools you use or your system architecture etc
- 4. Evaluation
  - 4.1 Results
  - 4.2 Discussion
- 5. Planning: your plan for week 10-12

## Submission Instructions: We will provide sample ppt slides

- Submit your slides as one PDF file to Canvas
- Submit your video presentation as one mp4 file to Canvas
- Submit animation/demo (if any) as a movie to Canvas

### Marking Rubric: 10 marks

- Quality of design: tasks, analysis and visualisation (2 marks)
- Quality of implementation (2.5 marks)
- Quality of results: visual analysis, storytelling (2.5 marks)
- Quality of oral presentation (2 marks)
- Quality of animation/demo (1 mark)

# Final report should be in the following format (min 10 - max 15 pages):

- 1. Introduction
  - 1.1 Data sets
  - 1.2 Tasks
- 2. Design
  - 2.1 Analysis
  - 2.2 Visualisation
- 3. Implementation
- 4. Evaluation
  - 4.1 Results: Each member presents results with evaluation (1 page)
  - 4.2 Discussion
- 5. Conclusion
- 6. References
- 7. Appendix:
  - 7.1 Weekly group meeting minutes (0.5-1 page per week: week 6-11)
  - 7.2 Weekly personal reflection (0.5-1 page per week: week 6-11)
  - 7.3 Codes: zip file

# <u>Marking Rubric: 15 marks (group: 10 marks + individual: 5 marks)</u> <u>Group marks (10 marks):</u>

- Quality of design: tasks, analysis and visualisation (1 marks)
- Quality of implementation (3 marks)
- Quality of results: visual analysis, storytelling (4 marks)
- Quality of writing (2 marks)

### Individual marks (5 marks):

- Quality of individual visual analysis results and personal reflection

### **Submission Instructions:**

- Submit your final report as one PDF to Canvas
- Submit movies (animation, demo) and source codes to Canvas