

# COMP350: Algorithms & Optimisation

## 2: PS4 Dev Kit & Profilers

# Learning outcomes

By the end of today's session, you will be able to:

- ▶ **Develop** games for the PS4
- ▶ **Understand** the usage of a profiler
- ▶ **Profile** your own code base

# Profilers



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  - ▶ GPU - Deferred Lighting, Transparent, Post Processing

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- ▶ You should consider Profiling a development build as the Editor adds significant overhead

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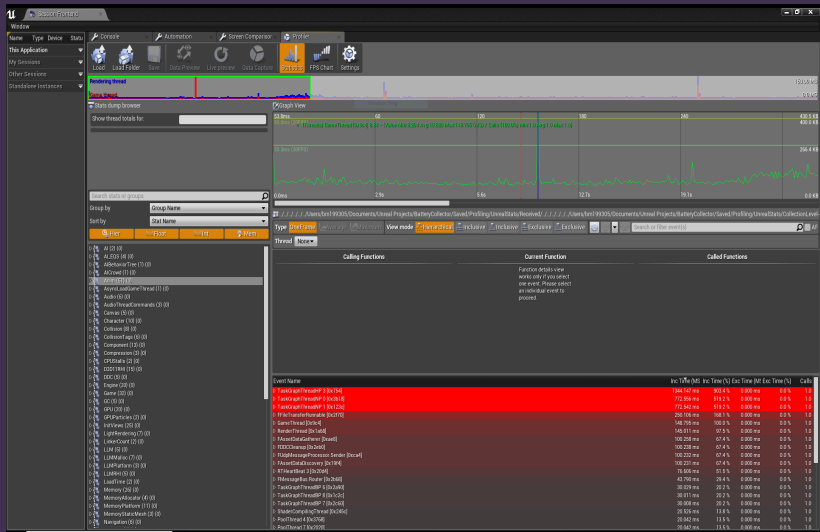
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- ▶ Allows us to profile all major systems including CPU (code) and GPU

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  - ▶ **SkinnedMeshComp Tick** & **TickWidgets** can also be bottleneck



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- ▶ To run the profiler, select **Debug > Performance Profiler** and then click on **Performance Wizard**

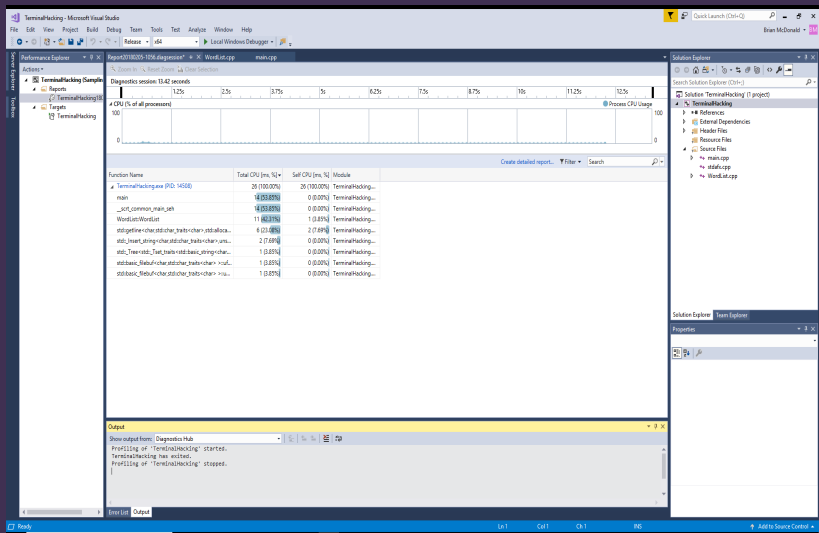
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- ▶ To run the profiler, select **Debug > Performance Profiler** and then click on **Performance Wizard**
- ▶ The profiler will run and start collecting data
- ▶ Close the application to start analysing the data

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- ▶ You will not be able to do much about the \*.dll calls, you should look at your own functions in here

# Exercises



# Profiler Exercise

1. Select a project (sample, past project, etc ,etc)
  2. Open up the project and profiler
  3. Run the profiler to see if you can find bottlenecks
  4. Record all sources you have used
- ▶ You may have to do some research on the profiler
  - ▶ The previous slides contain some links but you may need to find additional sources

# Coffee Break



# Developing for the PS4

