

PlayStation 4(PS4) Compute on GPU

Compute
Asynchronous, fine-grained compute that runs simultaneously with graphics
Fully supported by **PlayStation Shader Language (PSSL)**
Allows features **beyond** DirectX and OpenCL

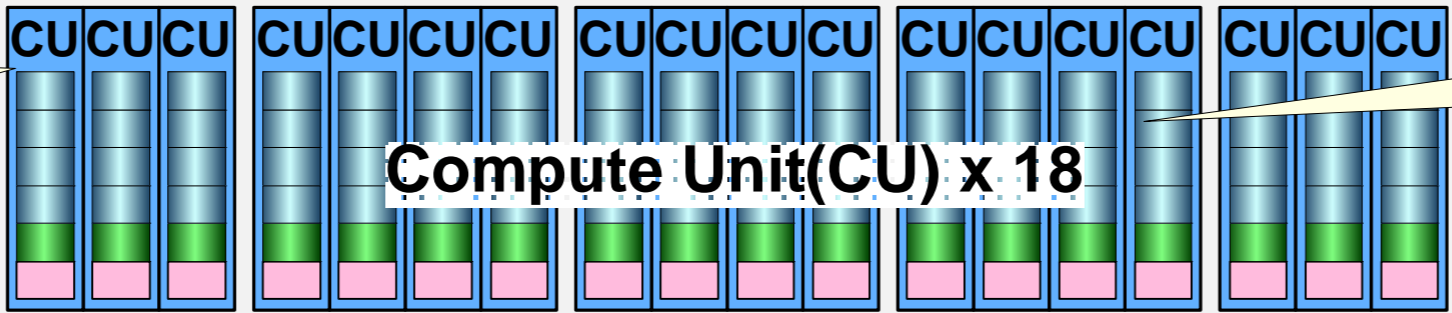
Geometry Engine +Rasterizer

ACEs (Asynchronous Compute Engines)

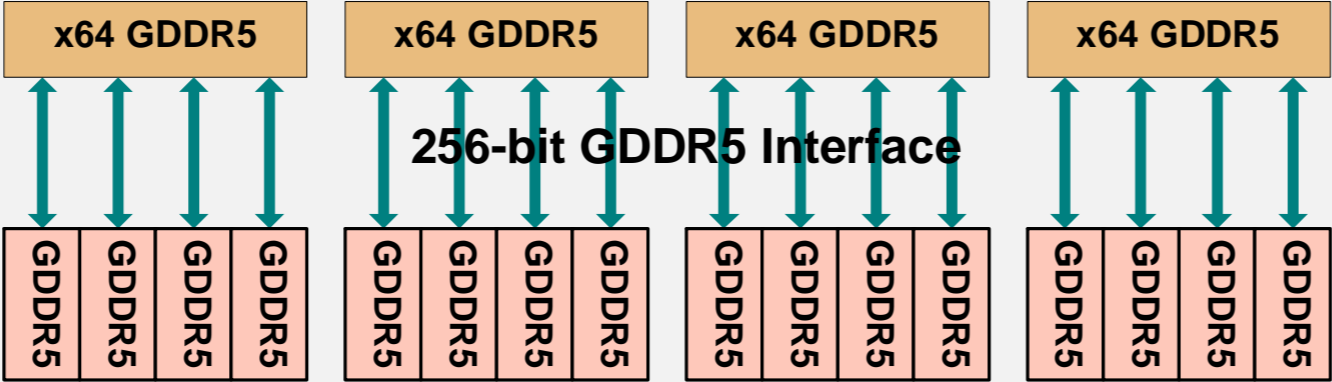
Geometry Engine +Rasterizer

Asynchronous compute architecture
64 task Queues
Carefully balanced to provide maximum graphics power with enough room for compute tasks

18 Compute Units
1152 MADs
1.843TFLOPS(SP)
800MHz



Existing PC graphics hardware requires graphics processing to stop to perform compute tasks
PS4 allows compute tasks to execute in parallel with graphics processing



Full access to unified memory