# Lesson 8 SPU Data management



# **Playstation 3 Development**

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#### **Abstract**

TODO

#### Keywords

Sony, PS3, PlayStation, Setup, Windows, Target Manager, ELF, PPU, SPU, Programming, ProDG, Visual Studio, Memory alignment

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#### **Preface**

About the Edinburgh Napier University Game Technology Playstation 3 Development Lessons Edinburgh Napier University Game Technology Lab is one of the leading game teaching and research groups in the UK - offering students cutting edge facilities that include Sony's commercial development kits. Furthermore, within the Edinburgh Napier Game Technology group are experienced developers to assist those students aspiring to releasing their own games for PlayStation. Students have constant access to he Sony DevKits and encourage enthusiastic students to design and build their own games and applications during their spare time [1].

**Previous Tutorials** This tutorial assumes you have read the previous tutorials on compiling and deploying applications to the PS3.

## 1. Introduction

**aa** This tutorial assumes you have read the previous tutorial on compiling and deploying applications to the PS3. This tutorial will cover starting a PS3 program from scratch rather than opening a sample project.

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Figure 1. Memory structure -

#### 1.2 Aaa

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## **Listing 1.** Halts on different platforms

```
1 //IA-32 (Intel Architecture, 32-bit)
2 __asm { int 3 }
3 //x86/XBOX/Win32(basically a robust wrapper for int 3)
4 //Only supported in visual studio
5 __debugbreak();
6 // Halts a program running on PPC32 or PPC64 (e.g. PS3).
7 //Also works for ARM and in GCC/XCode
8 __asm volatile( "trap");
```

#### 2. Conclusion

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# **Recommended Reading**

Programming the Cell Processor: For Games, Graphics, and Computation, Matthew Scarpino, ISBN: 978-0136008866 Vector Games Math Processors (Wordware Game Math Library), James Leiterman, ISBN: 978-1556229213 Clean Code: A Handbook of Agile Software Craftsmanship, Robert C. Martin, ISBN: 978-0132350884

#### References

Edinburgh Napier Game Technology Website. www.napier.ac.uk/games/. Accessed: Feb 2014, 2014. 1