|  |  |  |  |
| --- | --- | --- | --- |
| **Name:** | **Lee Yan Cheng** | **Lab Group#:** | **B10** |
| **Student Id:** | |  |  |  |  |  |  |  |  |  | | --- | --- | --- | --- | --- | --- | --- | --- | --- | | **A** | **0** | **1** | **9** | **9** | **1** | **4** | **1** | **B** | |  | |

**Task 1 – Page 1 [3 pts]**

|  |  |  |
| --- | --- | --- |
| **Tag** | **Cache Index** | **Offset** |
| **19 bits** | **9 bits** | **4 bits** |

**Task 1 – Page 3** . **[6 pts]**

|  |  |  |
| --- | --- | --- |
| **Block Accessed (in sequence)** | **Cache Miss?** | **Block replaced (if applicable)** |
| 1. AAAA | ~~Hit~~ / **Miss** | **Left** / ~~Right / Not applicable~~ |
| 1. BBBB | ~~Hit~~ / **Miss** | ~~Left~~ / **Right** / ~~Not applicable~~ |
| 1. CCCC | ~~Hit~~ / **Miss** | **Left** / ~~Right / Not applicable~~ |
| 1. BBBB | **Hit** / ~~Miss~~ | ~~Left / Right~~ / **Not applicable** |
| 1. DDDD | ~~Hit~~ / **Miss** | **Left** / ~~Right / Not applicable~~ |

What do you think is the formal name of this policy? (Remove incorrect answers) **[1 pt]**

|  |
| --- |
| First in first out with Second Chance |

Can we use the sample setup (i.e. one flag) for 4-way or more SA cache? **[1 pt]**

|  |
| --- |
| No. Since the NotLeft flag is binary i.e. only has 2 options |

**Task 2**

|  |
| --- |
| NotMe\_Cache\_Simulator.exe **Demo [ 4 pts ]** |