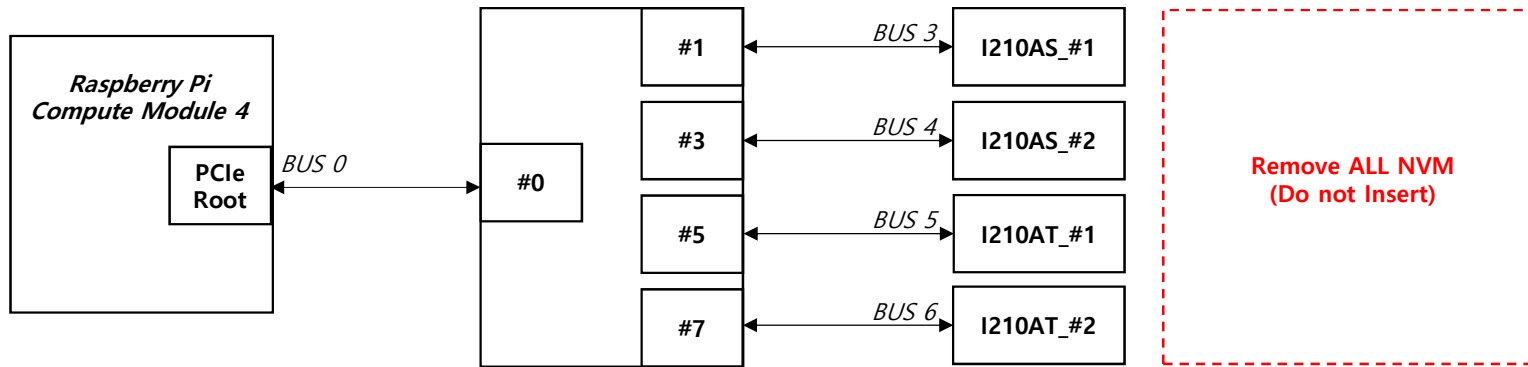


# 1. iNVM



```
<Test #1> ; I210AS_#1&#2, I210AT_#1&#2 Power On
NIC  BUS  DEV  FUN  Silicon  Memory Type Present
===  ===  ===  ===  =====  =====
1    3    0    0    I210     INVM
2    4    0    0    I210     INVM+FLASH
3    5    0    0    I210     INVM
4    6    0    0    I210     INVM

<Test #2> ; I210AS_#2(BUS 4) Power Off
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    3    0    0    I210     INVM
2    5    0    0    I210     INVM+FLASH
3    6    0    0    I210     INVM

<Test #3> ; I210AS_#2(BUS 4), I210AT_#2(BUS 5) Power Off
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    3    0    0    I210     INVM
2    6    0    0    I210     INVM+FLASH

<Test #4> ; I210AS_#2(BUS 4), I210AT_#2(BUS 5), I210AS_#1(BUS 3), Power Off
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    6    0    0    I210     INVM
```

```
<Test #5> I210AS_#1(BUS 3), Power On
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    3    0    0    I210     INVM

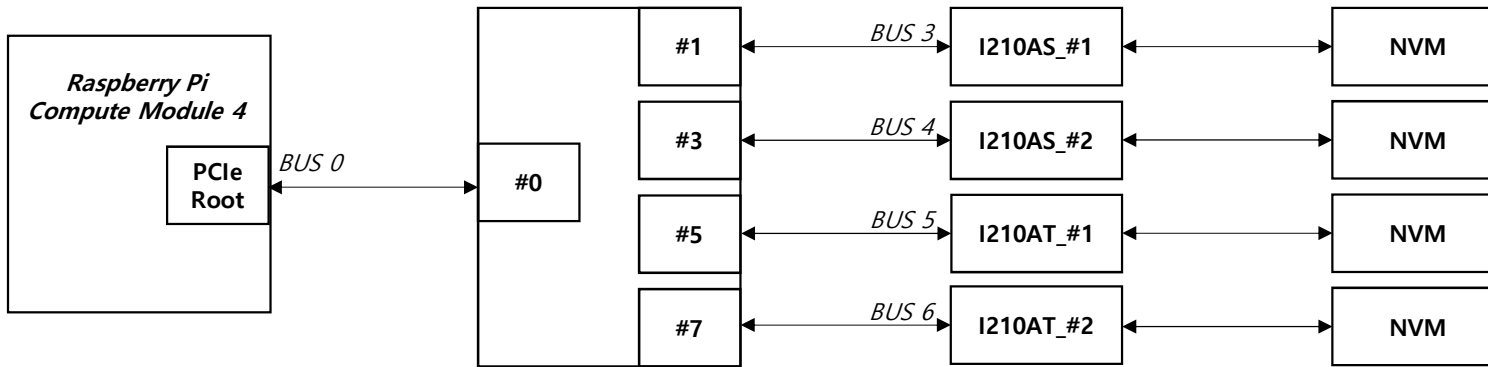
<Test #6> I210AS_#1(BUS 3), I210AT_#2(BUS 6), Power On
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    3    0    0    I210     INVM
2    6    0    0    I210     INVM+FLASH

<Test #7> I210AS_#1(BUS 3), I210AT_#1(BUS 5), Power On
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    4    0    0    I210     INVM
2    5    0    0    I210     INVM+FLASH

<Test #7> I210AT_#1(BUS 5), I210AT_#2(BUS 6), Power On
NIC  BUS  DEV  FUN  Silicon Memory Type Present
===  ===  ===  ===  =====  =====
1    5    0    0    I210     INVM
2    6    0    0    I210     INVM+FLASH
```

"iNVM+FLASH" displayed on the secondary device among recognized devices.

### 3. **Blank NVM** BUS 3 Write / Read



```
pi@raspberrypi:~/New_driver/eepromaccesstool-0.8.0 $ sudo ./EepromAccessTool
```

```
Intel(R) EEPROM Access Tool NVM/OTP Programming Example Tool  Version 0.8.0
Provided under the terms of a CNDA. Do Not Distribute.
Copyright(C) 2017-2020 by Intel(R) Corporation
```

NIC	BUS	DEV	FUN	Silicon	Memory Type Present
1	3	0	0	I210	INVM
2	4	0	0	I210	<b>INVM+FLASH</b>
3	5	0	0	I210	INVM
4	6	0	0	I210	INVM

```
pi@raspberrypi:~/New_driver/eepromaccesstool-0.8.0 $ sudo ./EepromAccessTool -nic=2 -f=Dev_Start_I210_Fiber_NOMNG_8Mb_A2.bin
```

```
Intel(R) EEPROM Access Tool NVM/OTP Programming Example Tool  Version 0.8.0
Provided under the terms of a CNDA. Do Not Distribute.
Copyright(C) 2017-2020 by Intel(R) Corporation
```

```
Using no FW mode
size is 80000
GetHwSemaphoreI210 MaxAttempts failed
Couldn't get a semaphore!
Erasing Full NVM...
GetHwSemaphoreI210 MaxAttempts failed
Couldn't get a semaphore!
GetHwSemaphoreI210 MaxAttempts failed
Couldn't get a semaphore for bit bang!
```

<Power On>

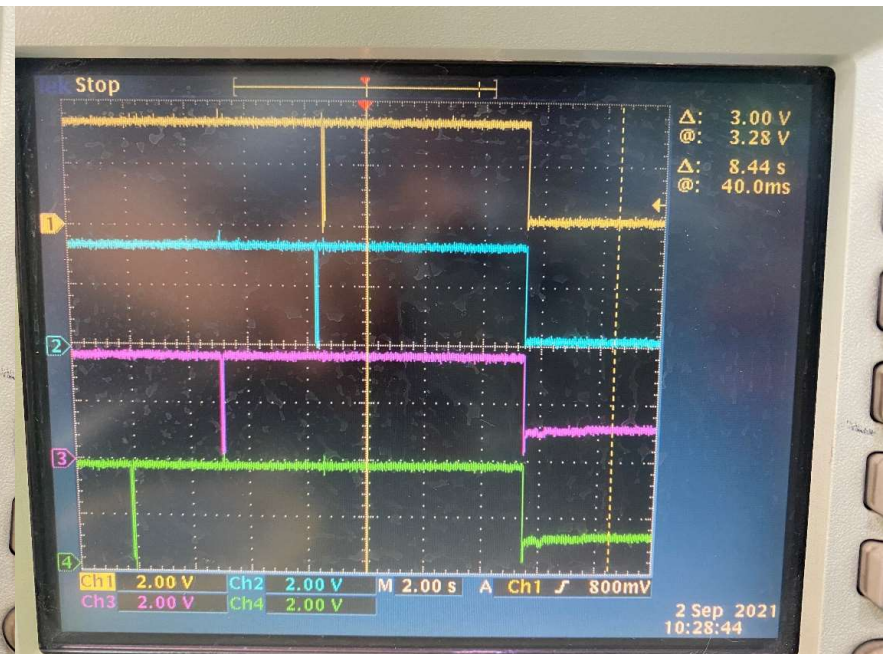
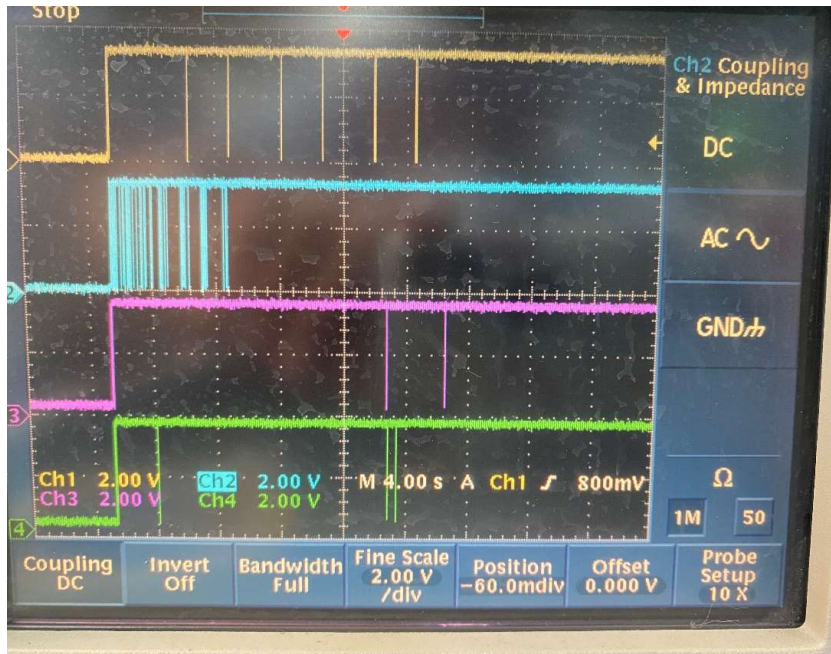
<Power Off>

Bus 3 Chip Select (I210AS\_#1)

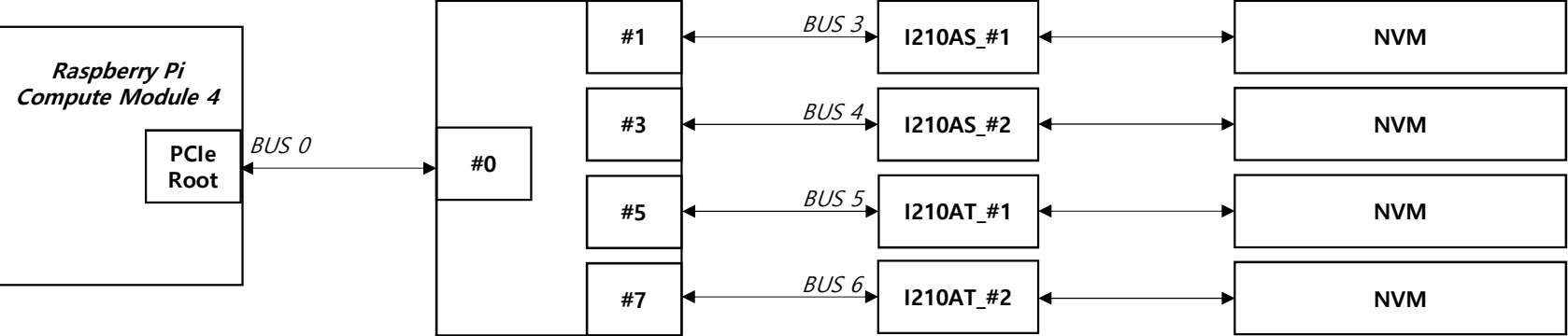
Bus 4 Chip Select (I210AS\_#2)

Bus 5 Chip Select (I210AT\_#1)

Bus 6 Chip Select (I210AT\_#1)



2. Programmed NVM BUS 3 Write / Read



```

pi@raspberrypi:~/New_driver/EEPROMACCESSSTOOL-0.8.0 $ lspci -nn
00:00.0 PCI bridge [0604]: Broadcom Limited Device [14e4:2711] (rev 20)
01:00.0 PCI bridge [0604]: ASMedia Technology Inc. ASM1184e PCIe Switch Port [1b21:1184]
02:01.0 PCI bridge [0604]: ASMedia Technology Inc. ASM1184e PCIe Switch Port [1b21:1184]
02:03.0 PCI bridge [0604]: ASMedia Technology Inc. ASM1184e PCIe Switch Port [1b21:1184]
02:05.0 PCI bridge [0604]: ASMedia Technology Inc. ASM1184e PCIe Switch Port [1b21:1184]
02:07.0 PCI bridge [0604]: ASMedia Technology Inc. ASM1184e PCIe Switch Port [1b21:1184]
03:00.0 Ethernet controller [0200]: Intel Corporation I210 Gigabit Fiber Network Connection [8086:1536] (rev 03)
04:00.0 Ethernet controller [0200]: Intel Corporation I210 Gigabit Fiber Network Connection [8086:1536] (rev 03)
05:00.0 Ethernet controller [0200]: Intel Corporation I210 Gigabit Network Connection [8086:1533] (rev 03)
06:00.0 Ethernet controller [0200]: Intel Corporation I210 Gigabit Network Connection [8086:1533] (rev 03)
    
```

```

pi@raspberrypi:~/New_driver/EEPROMACCESSSTOOL-0.8.0 $ ifconfig
eth1: flags=4099<UP,BROADCAST,MULTICAST> mtu 1500
    ether 1c:fd:08:70:d9:42 txqueuelen 1000 (Ethernet)

eth2: flags=4099<UP,BROADCAST,MULTICAST> mtu 1500
    ether 1c:fd:08:70:d9:3c txqueuelen 1000 (Ethernet)

eth3: flags=4099<UP,BROADCAST,MULTICAST> mtu 1500
    ether 1c:fd:08:73:85:85 txqueuelen 1000 (Ethernet)

eth4: flags=4099<UP,BROADCAST,MULTICAST> mtu 1500
    ether 1c:fd:08:73:85:51 txqueuelen 1000 (Ethernet)
    
```

```
pi@raspberrypi:~/New_driver/eepromaccesstool-0.8.0 $ sudo ./EepromAccessTool
```

```
Intel(R) EEPROM Access Tool NVM/OTP Programming Example Tool  Version 0.8.0  
Provided under the terms of a CNDA. Do Not Distribute.
```

```
Copyright(C) 2017-2020 by Intel(R) Corporation
```

```
NIC    BUS    DEV    FUN    Silicon Memory Type Present
```

```
====    ====    ====    ====    =====
```

```
1  3  0  0  I210  INVM  
2  4  0  0  I210  INVM+FLASH  
3  5  0  0  I210  INVM+FLASH  
4  6  0  0  I210  INVM
```

```
pi@raspberrypi:~/New_driver/eepromaccesstool-0.8.0 $ sudo ./EepromAccessTool -nic=2 -f=Dev_Start_I210_Fiber_NOMNG_8Mb_A2.bin
```

```
Intel(R) EEPROM Access Tool NVM/OTP Programming Example Tool  Version 0.8.0
```

```
Provided under the terms of a CNDA. Do Not Distribute.
```

```
Copyright(C) 2017-2020 by Intel(R) Corporation
```

```
Using FW mode
```

```
size is 80000
```

```
GetHwSemaphoreI210 MaxAttempts failed
```

```
Couldn't get a semaphore!
```

```
Erasing Full NVM...
```

```
GetHwSemaphoreI210 MaxAttempts failed
```

```
Couldn't get a semaphore!
```

```
GetHwSemaphoreI210 MaxAttempts failed
```

```
Couldn't get a semaphore for bit bang!
```

```
~~~~~
```

```
error: No writing method worked.
```

```
Erasing sector to cleanup test write...
```

```
GetHwSemaphoreI210 MaxAttempts failed
```

```
Couldn't get a semaphore!
```

```
GetHwSemaphoreI210 MaxAttempts failed
```

```
Couldn't get a semaphore for bit bang!
```

```
pi@raspberrypi:~/New_driver/eepromaccesstool-0.8.0 $ sudo ./EepromAccessTool -nic=3 -f=Dev_Start_I210_Copper_NOMNG_8Mb_A2.bin
```

```
Intel(R) EEPROM Access Tool NVM/OTP Programming Example Tool  Version 0.8.0
```

```
Provided under the terms of a CNDA. Do Not Distribute.
```

```
Copyright(C) 2017-2020 by Intel(R) Corporation
```

```
Using FW mode
```

```
size is 80000
```

```
Detected FlashId: 0000
```

```
Using generic method
```

```
Erasing Full NVM...
```